

February 2018 | Final Environmental Impact Report  
State Clearinghouse No. 2015101047

# CITY OF HOPE CAMPUS PLAN

City of Duarte

*Prepared for:*

**City of Duarte**

Contact: Jason Golding, Planning Division Manager  
1600 Huntington Drive  
Duarte, California 91010  
626.357.7931 x231  
goldingj@accessduarte.com

*Prepared by:*

**PlaceWorks**

Contact: Nicole Morse, Esq., Associate Principal  
3 MacArthur Place, Suite 1100  
Santa Ana, California 92707  
714.966.9220  
info@placeworks.com  
www.placeworks.com





Table of Contents

Section	Page
<b>1. INTRODUCTION.....</b>	<b>1-1</b>
1.1 INTRODUCTION .....	1-1
1.2 FORMAT OF THE FEIR.....	1-1
1.3 CEQA REQUIREMENTS REGARDING COMMENTS AND RESPONSES .....	1-2
<b>2. RESPONSE TO COMMENTS .....</b>	<b>2-1</b>
<b>3. REVISIONS TO THE DRAFT EIR .....</b>	<b>3-1</b>
3.1 INTRODUCTION .....	3-1
3.2 DEIR REVISIONS IN RESPONSE TO WRITTEN COMMENTS.....	3-1
3.3 ADDITIONAL DEIR REVISIONS .....	3-12

APPENDICES

Appendix A.	Metro Attachments
Appendix B.	Updated Air Quality Modeling Data and SCAQMD Correspondence
Appendix C.	City of Hope Specific Plan Errata Sheet
Appendix D.	EIR Tables 1-3, 5.6-7, 5.10-9, 5.10-10, and 5.10-11

## Table of Contents

### LIST OF FIGURES

<b>Figure</b>		<b>Page</b>
Figure 3-2	Local Vicinity.....	3-3
Figure 4	Area Bicycle Facilities.....	3-25

### LIST OF TABLES

<b>Table</b>		<b>Page</b>
Table 4-5	Summary of Related Projects.....	2-5
Table 5.12-1	Fire Stations .....	2-13
Table 5.2-13	Maximum Daily Regional Construction Emissions by Development Phase.....	2-42
Table 5.2-14	Phase 1: Net Maximum Daily Operation-Phase Emissions .....	2-45
Table 5.2-15	Phase 2: Net Maximum Daily Operation-Phase Emissions .....	2-46
Table 5.2-16	Phase 3: Net Maximum Daily Operation-Phase Emissions .....	2-47
Table 4-5	Summary of Related Projects.....	3-1
Table 5.2-13	Maximum Daily Regional Construction Emissions by Development Phase.....	3-5
Table 5.2-14	Phase 1: Net Maximum Daily Operation-Phase Emissions .....	3-8
Table 5.2-15	Phase 2: Net Maximum Daily Operation-Phase Emissions .....	3-9
Table 5.2-16	Phase 3: Net Maximum Daily Operation-Phase Emissions .....	3-10
Table 5.12-1	Fire Stations .....	3-11
Table 5.2-4	Existing City of Hope Daily Emissions Inventory.....	3-14
Table 5.2-17	Phase 4 (Full Buildout): Net Maximum Daily Operation-Phase Emissions .....	3-15
Table 5.2-20	Maximum Daily On-Site Localized Operational Phase Emissions at Full Buildout .....	3-17



# 1. Introduction

---

## 1.1 INTRODUCTION

This Final Environmental Impact Report (FEIR) has been prepared in accordance with the California Environmental Quality Act (CEQA) as amended (Public Resources Code §§ 21000 et seq.) and CEQA Guidelines (California Code of Regulations §§ 15000 et seq.).

According to the CEQA Guidelines, Section 15132, the FEIR shall consist of:

- (a) The Draft Environmental Impact Report (DEIR) or a revision of the Draft;
- (b) Comments and recommendations received on the DEIR either verbatim or in summary;
- (c) A list of persons, organizations, and public agencies comments on the DEIR;
- (d) The responses of the Lead Agency to significant environmental points raised in the review and consultation process; and
- (e) Any other information added by the Lead Agency.

This document contains responses to comments received on the DEIR for the City of Hope Campus Plan during the public review period, which began November 15, 2017, and closed January 4, 2018; and comments received at Planning Commission on January 16, 2018. This document has been prepared in accordance with CEQA and the CEQA Guidelines and represents the independent judgment of the Lead Agency. This document and the circulated DEIR comprise the FEIR, in accordance with CEQA Guidelines, Section 15132.

## 1.2 FORMAT OF THE FEIR

This document is organized as follows:

***Section 1, Introduction.*** This section describes CEQA requirements and content of this FEIR.

***Section 2, Response to Comments.*** This section provides a list of agencies and interested persons commenting on the DEIR; copies of comment letters received during the public review period, and individual responses to written comments. This section also includes responses to written responses received at a public meeting held by the City of Duarte on December 6, 2017 regarding the DEIR. To facilitate review of the responses, each comment letter has been reproduced and assigned a number (A-1 through A-9 for letters received from agencies and organizations, and R-1 for the letter received by a resident). Individual comments have been numbered for each letter and the letter is followed by responses with references to the corresponding comment number.

## 1. Introduction

***Section 3. Revisions to the Draft EIR.*** This section contains revisions to the DEIR text and figures as a result of the comments received by agencies and interested persons as described in Section 2, and/or errors and omissions discovered subsequent to release of the DEIR for public review.

The responses to comments contain material and revisions that will be added to the text of the FEIR. City of Duarte staff has reviewed this material and determined that none of this material constitutes the type of significant new information that requires recirculation of the DEIR for further public comment under CEQA Guidelines Section 15088.5. None of this new material indicates that the project will result in a significant new environmental impact not previously disclosed in the DEIR. Additionally, none of this material indicates that there would be a substantial increase in the severity of a previously identified environmental impact that will not be mitigated, or that there would be any of the other circumstances requiring recirculation described in Section 15088.5.

### 1.3 CEQA REQUIREMENTS REGARDING COMMENTS AND RESPONSES

CEQA Guidelines Section 15204 (a) outlines parameters for submitting comments, and reminds persons and public agencies that the focus of review and comment of DEIRs should be “on the sufficiency of the document in identifying and analyzing possible impacts on the environment and ways in which significant effects of the project might be avoided or mitigated. Comments are most helpful when they suggest additional specific alternatives or mitigation measures that would provide better ways to avoid or mitigate the significant environmental effects. At the same time, reviewers should be aware that the adequacy of an EIR is determined in terms of what is reasonably feasible. ...CEQA does not require a lead agency to conduct every test or perform all research, study, and experimentation recommended or demanded by commenters. When responding to comments, lead agencies need only respond to significant environmental issues and do not need to provide all information requested by reviewers, as long as a good faith effort at full disclosure is made in the EIR.”

CEQA Guidelines Section 15204 (c) further advises, “Reviewers should explain the basis for their comments, and should submit data or references offering facts, reasonable assumptions based on facts, or expert opinion supported by facts in support of the comments. Pursuant to Section 15064, an effect shall not be considered significant in the absence of substantial evidence.” Section 15204 (d) also states, “Each responsible agency and trustee agency shall focus its comments on environmental information germane to that agency’s statutory responsibility.” Section 15204 (e) states, “This section shall not be used to restrict the ability of reviewers to comment on the general adequacy of a document or of the lead agency to reject comments not focused as recommended by this section.”

In accordance with CEQA, Public Resources Code Section 21092.5, copies of the written responses to public agencies will be forwarded to those agencies at least 10 days prior to certifying the environmental impact report. The responses will be forwarded with copies of this FEIR, as permitted by CEQA, and will conform to the legal standards established for response to comments on DEIRs.

## 2. Response to Comments

---

Section 15088 of the CEQA Guidelines requires the Lead Agency (City of Duarte) to evaluate comments on environmental issues received from public agencies and interested parties who reviewed the DEIR and prepare written responses.

This section provides all written responses received on the DEIR and the City's Duarte's responses to each comment.

Comment letters and specific comments are given letters and numbers for reference purposes. Where sections of the DEIR are excerpted in this document, the sections are shown indented. Changes to the DEIR text are shown in underlined text for additions and ~~strikeout~~ for deletions.

The following is a list of agencies and persons that submitted comments on the DEIR during the public review period.

Number Reference	Commenting Person/Agency	Date of Comment	Page No.
<b>Agencies &amp; Organizations</b>			
A1	City of Irwindale Community Development Department	January 4, 2018	2-3
A2	County of Los Angeles Fire Department	December 19, 2017	2-9
A3	County Sanitation Districts of Los Angeles County	January 3, 2018	2-15
A4	Gabrieleño Band of Mission Indians – Kizh Nation	November 16, 2017	2-21
A5	Laborers International Union of North American (via Lozeau Drury, LLP)	January 3, 2018	2-25
A6	Los Angeles County Metropolitan Transportation Authority (Metro)	January 4, 2018	2-29
A7	South Coast Air Quality Management District	January 4, 2018	2-37
A8	Caltrans District 7	December 28, 2017	2-51
A9	California Governor's Office of Planning and Research	January 5, 2018	2-61
<b>Residents</b>			
R1	Steve Hernandez	December 6, 2017	2-69
<b>Planning Commission</b>			
PC1	Planning Commissioner Farra	January 16, 2018	2-73

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

LETTER A1 – City of Irwindale Community Development Department (2 pages)



City of Irwindale  
Community Development Department  
5050 N. Irwindale Avenue • Irwindale, California 91706  
Voice: 626-430-2208 • Facsimile: 626-962-2018

January 4, 2018

Mr. Jason Golding  
Planning Division Manager  
City of Duarte  
1600 Huntington Drive  
Duarte, CA 91010

**Subject: City of Hope Specific Plan Draft Environmental Impact Report – Comments from City of Irwindale**

Dear Mr. Golding,

Thank you for the opportunity to review the proposed Draft Environmental Impact Report (DEIR) for the City of Hope Specific Plan. We have reviewed the DEIR and have the following comments/questions:

- |  |      |
|--|------|
| 1. Page 3-13 Specific Plan Buildout: Regarding the two factors that control future development projects, please describe in further detail the connection between buildout of physical development and average daily population as it relates to the environmental analysis. | A1-1 |
| 2. Page 3-15, Table 3-3 Proposed Population Buildout: How will this be monitored?  | A1-2 |
| 3. Page 3-25, Development Agreement: If a Development Agreement is anticipated, it should be discussed prior to or in coordination with entitlement of the Specific Plan. What items are anticipated to be included in the Development Agreement with the City of Irwindale? | A1-3 |
| 4. Page 4-22, Table 4-5 Summary of Related Projects: Revise No. 8, 2200 Arrow Highway Buildout Statistics to 265,228 SF Material Recovery Facility/Transfer Station/ Convenience Store with Fueling Station  | A1-4 |
| 5. Page 5.1-12&13, Operational Impacts: Were grading impacts analyzed for subterranean or semi-subterranean parking structures?  | A1-5 |

## 2. Response to Comments

### City of Hope Specific Plan Draft EIR comments

- |  |      |
|--|------|
| 6. Page 5.1-14 Aesthetics: Consider adding a statement or clarifying that any reorientation and reorganization of buildings would be analyzed at the proposed site plan level for consistency with the Final EIR.  | A1-6 |
| 7. Page 5.1-16 Table 5.1-1 Maximum Allowed Building Height: Was the environmental analysis based on the maximum building heights listed in the table? If so, consider adding a clarifying statement to that effect.  | A1-7 |
| 8. Page 5.2-15 Sensitive Receptors: The last paragraph ending with the sentence "...existing sensitive receptors on-site consist of City of Hope patients." seems incomplete. Consider adding a summary statement.   | A1-8 |
| 9. Page 5.6-33 City of Irwindale Energy Action Plan: Please provide clarification of the last sentence, "Therefore, overall, the proposed project would generally not be inconsistent with the City of Irwindale's EAP". Is it consistent or not? Also, there is a minor typo "or" should be "of". | A1-9 |

If you have any question regarding these comments, please contact me at 626-430-2209 or at [msimpson@irwindaleca.gov](mailto:msimpson@irwindaleca.gov).

Thank you,

Marilyn Simpson, AICP  
Principal Planner

C: William Tam, Development Services Director/City Engineer  
Adrian Guerra, Assistant City Attorney  
Case File

## 2. Response to Comments

**A1. Response to Comments from City of Irwindale Community Development Department, dated January 4, 2018.**

- A1-1 The project buildout is calculated to measure the project's environmental impacts compared to baseline conditions (on the ground land uses at the time of the Notice of Preparation was published). Full buildout of the City of Hope Campus Plan was measured in both building square footage and average daily population. The environmental analysis uses both of these buildout calculations to determine project impacts. For example, buildout square footage is used to determine construction impacts related to air quality (see DEIR page 5.2-21–5.2-28). Total population was used as the basis for calculating vehicle trips and determining transportation impacts (see DEIR page 5.14-27–5.14-28). The approach for determining project impacts for each impact area is detailed throughout Chapter 5, *Environmental Analysis*, of the DEIR. Project buildout (square footage and population) cannot be exceeded without conducting further CEQA analysis and amending the Specific Plan.
- A1-2 Project buildout was developed based upon the project description and development summary provided in the Specific Plan (see Tables 1, Buildout Summary, and 3, Illustrative Development Scenario by Potential Phase, of the City of Hope Specific Plan). As stated in Section 7.1 of the Specific Plan, the environmental analysis is based on a limitation on the maximum floor area of the Campus (2,639,350 square feet) and average daily population (9,393 persons) and these two development controls shall not be exceeded without additional environmental analysis an amendment of the Specific Plan. In addition, Section 7.3.2 of the Specific Plan requires annual reporting of the average daily population on campus by City of Hope and a verification of population by the City of Duarte's third party consultant every five years.
- A1-3 CEQA requires potential discretionary actions associated with the proposed project to be analyzed in the EIR. Items to be included in the development agreement with the City of Irwindale have not been determined. The City of Hope Campus Plan EIR would provide the environmental analysis necessary to approve a development agreement to the extent that the agreement contemplates improvements assumed in the Specific Plan and EIR. Improvements outside of the scope of the EIR would require further environmental review.
- A1-4 Pursuant to the commenter's request, Table 4-5 of the DEIR has been revised.

**Table 4-5 Summary of Related Projects**

No.	Project Location	Jurisdiction	Buildout Statistics	Daily Trips
1	Northeast Corner - Huntington Drive & Buena Vista Street	Duarte	<ul style="list-style-type: none"> <li>1.80 KSF drive-thru coffee shop</li> <li>2.60 KSF retail</li> </ul>	1,584
2	Metro Gold Line Duarte Station Parking Facility Project	Duarte	<ul style="list-style-type: none"> <li>Transit parking</li> </ul>	893
3	Southeast Corner - Huntington Drive &	Duarte	<ul style="list-style-type: none"> <li>19.93 KSF supermarket</li> </ul>	2,038

## 2. Response to Comments

**Table 4-5 Summary of Related Projects**

No.	Project Location	Jurisdiction	Buildout Statistics	Daily Trips
	Buena Vista Street			
4	800 Block of Buena Vista Street	Duarte	<ul style="list-style-type: none"> <li>191-bed assisted living facility</li> </ul>	411
5	Northwest Corner - Highland Avenue & Duarte Road	Duarte	<ul style="list-style-type: none"> <li>475 DU apartment</li> <li>400 KSF office</li> <li>250-room hotel</li> <li>12 KSF retail</li> </ul>	7,259
6	1200 Block Huntington Drive	Duarte	<ul style="list-style-type: none"> <li>800 DU residential</li> <li>703 KSF commercial</li> <li>450-room lodging</li> </ul>	3,150
7	1634 Third Street & 1101 Oak Avenue	Duarte	<ul style="list-style-type: none"> <li>18 DU townhouse</li> <li>Park</li> </ul>	106
8	2200 Arrow Hwy	Irwindale	<ul style="list-style-type: none"> <li>265,228 KSF Material Recovery Facility/Transfer Station/Convenience Store with Fueling Station General light industrial</li> </ul>	8,333
9	Arrow Hwy & Live Oak Lane	Irwindale	<ul style="list-style-type: none"> <li>17-acre athletic club</li> </ul>	710
10	Live Oak Lane	Irwindale	<ul style="list-style-type: none"> <li>29 KSF retail</li> </ul>	1,202
11	500 Speedway Drive	Irwindale	<ul style="list-style-type: none"> <li>700 KSF Factory Outlet Center</li> </ul>	17,788
12	Station Square Transit Village	Monrovia	<ul style="list-style-type: none"> <li>23 KSF retail</li> <li>450 KSF office</li> <li>700 DU residential</li> </ul>	4,513
13	Miguel Miranda Avenue & Meridian Street (LACo. Flood Quarry #3 project)	Irwindale Azusa	n/a	1,610

Source: Fehr & Peers 2017; Table 6, Appendix J1 of this DEIR.  
Notes: DU = dwelling unit; KSF = thousand square feet; n/a = not applicable

A1-5 Grading impacts are analyzed under the heading “Construction Impacts” starting on Page 5.1-11. The analysis is based on the development anticipated in the Specific Plan, the Illustrative Phasing Plan, and subterranean or semi-subterranean parking structures.

A1-6 As stated on Page 5.1-4 of Section 5.1, *Aesthetics*, of the DEIR, the land use plan and illustrative site plan prepared for the proposed Campus Plan are conceptual in nature and do not represent the final design and orientation of buildings and public spaces on the project site. Accordingly, minor revisions to the orientation and design of future buildings would not represent an inconsistency with the analysis in the DEIR. Therefore, no revisions to the DEIR are necessary. However, please note that all development projects will be subject to Development Plan and Design Review, which will analyze the site specific development for consistency with the Specific Plan.

A1-7 The commenter is correct that the maximum allowable building heights listed in Table 5.1-1 in the DEIR were utilized for the analysis found under Impact 5.1-2. The reference to Table 5.1-1 and corresponding analysis is provided in the paragraph above this table to address the proposed project’s potential environmental impacts related to shade and shadows.



## 2. Response to Comments

- A1-8 The referenced sentence is only meant to identify the on- and off-site receptors (i.e., groups of people) most sensitive to poor air quality. Additional information and analysis related to impacts on sensitive receptors is found under Impacts 5.2-4 through 5.2-6 in Section 5.2, *Air Quality*, of the DEIR. For example, a construction health risk assessment (HRA) was prepared and included in the DEIR to calculate potential impacts on sensitive receptors under Impact 5.2-5. This HRA does not expressly assess impacts to on-site City of Hope patients because the highest potential risk (i.e., the worst case scenario) is associated with long-term exposure to construction emissions. Given the assumptions in the OEHHA methodology for the length of exposure for residential receptors, the length of exposure of City of Hope patients would be much shorter than for a residential receptor. Even for the worst case scenario of exposure to a residential receptor (i.e., the “residential maximum exposed receptor”), Impact 5.2-5 would be reduced to a less than significant level after the imposition of Mitigation Measure AQ-2. Accordingly, impacts to on-site City of Hope patients would also be less than significant.
- A1-9 As shown in Table 5.6-9 in the DEIR, no inconsistency between the proposed project and the City of Irwindale Energy Action Plan was identified. Accordingly, the indicated sentence has been modified as follows to be more clear:

### *City of Irwindale Energy Action Plan*


Portions of the project site within the City of Irwindale would be subject to Irwindale’s EAP. Table 5.6-9, *Consistency with the City of Irwindale Energy Action Plan*, evaluates the proposed project’s consistency with the goals and policies in the City’s EAP. Implementation of the City of Hope Campus Plan would replace some of the existing facility buildings with newer, more energy-efficient buildings that would comply with the current and future Building Energy Efficiency Standards. Additionally, the Specific Plan design guidelines include measures that encourage and promote incorporation and inclusion of design features that would contribute to increasing energy efficiency, reducing energy demand, and conserving water. Therefore, overall, the proposed project would generally ~~not be inconsistent~~ with the City of Irwindale’s EAP.

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

LETTER A2 – County of Los Angeles Fire Department (3 pages)

	<b>COUNTY OF LOS ANGELES</b> FIRE DEPARTMENT 1320 NORTH EASTERN AVENUE LOS ANGELES, CALIFORNIA 90063-3294	<b>RECEIVED</b>  DEC 26 2017  CITY OF DUARTE COMMUNITY DEVELOPMENT
<p>DARYL L. OSBY FIRE CHIEF FORESTER &amp; FIRE WARDEN</p>		
<p>December 19, 2017</p>		
<p>Jason Golding, Planning Division Manager City of Duarte Planning Department 1600 Huntington Drive Duarte, CA 91010</p>		
<p>Dear Mr. Golding:</p>		
<p><b>NOTICE OF AVAILABILITY OF A DRAFT ENVIRONMENTAL IMPACT REPORT, "CITY OF HOPE CAMPUS PLAN," IS PROPOSING ADDITIONS TO THE EXISTING OUTPATIENT (CLINIC), INPATIENT (HOSPITAL), RESEARCH, OFFICE, INDUSTRIAL, WAREHOUSE, AND HOSPITALITY USES, NEW PARKING STRUCTURES AND SURFACE LOTS ARE ALSO PROPOSED, AS WELL AS INTERNAL ROADWAYS AND OPEN SPACE IMPROVEMENTS, BUENA VISTA STREET AND DUARTE ROAD, DUARTE, FFER 201700152</b></p>		
<p>The Notice of Availability of a Draft Environmental Impact Report has been reviewed by the Planning Division, Land Development Unit, Forestry Division, and Health Hazardous Materials Division of the County of Los Angeles Fire Department.</p>		
<p>The following are their comments:</p>		
<p><b><u>PLANNING DIVISION:</u></b></p>		
<p>Under 5.15 PUBLIC SERVICES, Table 5. 12-1 Fire Stations, the apparatus for Fire Station 44 should be corrected to state that the station is staffed with one engine company and one assessment engine company which is an engine company with some limited paramedic capabilities.</p>		
<p>SERVING THE UNINCORPORATED AREAS OF LOS ANGELES COUNTY AND THE CITIES OF:</p>		
AGOURA HILLS ARTESIA AZUSA BALDWIN PARK BELL BELL GARDENS BELLFLOWER	BRADBURY CALABASAS CARSON CERRITOS CLAREMONT COMMERCE COVINA	CUDAHY DIAMOND BAR DUARTE EL MONTE GARDENA GLENDALE HAWAIIAN GARDENS
HAWTHORNE HIDDEN HILLS HUNTINGTON PARK INDUSTRY INGLEWOOD IRVINDALE LA CANADA-FLINTRIDGE	LA HABRA LA MIRADA LA PUENTE LAKEWOOD LANCASTER LAWNDALE LOMITA	LYNWOOD MALIBU MAYWOOD NORWALK PALMDALE PALOS VERDES ESTATES PARAMOUNT
PICO RIVERA POMONA RANCHO PALOS VERDES ROLLING HILLS ROLLING HILLS ESTATES ROSEMead SAN DIMAS SANTA CLARITA	SIGNAL HILL SOUTH EL MONTE SOUTH GATE TEMPLE CITY WALNUT WEST HOLLYWOOD WESTLAKE VILLAGE WHITTIER	

## 2. Response to Comments

Jason Golding, Planning Division Manager  
December 19, 2017  
Page 2

### **LAND DEVELOPMENT UNIT:**

1. The proposed development may necessitate multiple ingress/egress access for the circulation of traffic and emergency response issues.
2. The development of this project must comply with all applicable code and ordinance requirements for construction, access, water mains, fire flows, and fire hydrants.
3. This property is located within the area described by the Forester and Fire Warden as a Fire Zone 4, Very High Fire Hazard Severity Zone. All applicable fire code and ordinance requirements for construction, access, water mains, fire hydrants, fire flows, brush clearance, and fuel modification plans must be met.
4. Every building constructed shall be accessible to Fire Department apparatus by way of access roadways with an all-weather surface of not less than the prescribed width. The roadway shall be extended to within 150 feet of all portions of the exterior walls when measured by an unobstructed route around the exterior of the building.
5. Fire Department requirements for access, fire flows, and hydrants are addressed during the building permit stage.
6. An Approved Automatic Sprinkler System in new buildings and structures shall be described as shown in Sections 903.2.1 through 203.2.12 of the Los Angeles County Fire Code.

A2-2

The County of Los Angeles Fire Department's Land Development Unit appreciates the opportunity to comment on this project.

The statutory responsibilities of the County of Los Angeles Fire Department's Land Development Unit are the review of, and comment on, all projects within the unincorporated areas of the County of Los Angeles. Our emphasis is on the availability of sufficient water supplies for firefighting operations and local/regional access issues. However, we review all projects for issues that may have a significant impact on the County of Los Angeles Fire Department. We are responsible for the review of all projects within contract cities (cities that contract with the County of Los Angeles Fire Department for fire protection services). We are responsible for all County facilities located within non-contract cities.

## 2. Response to Comments

Jason Golding, Planning Division Manager  
December 19, 2017  
Page 3

The County of Los Angeles Fire Department's Land Development Unit may also comment on conditions that may be imposed on a project by the Fire Prevention Division which may create a potentially significant impact to the environment.

A2-2  
Cont'd

Should any questions arise regarding subdivision, water systems, or access, please contact the County of Los Angeles Fire Department Land Development Unit's Inspector Claudia Soiza at (323) 890-4243 or [Claudia.Soiza@fire.lacounty.gov](mailto:Claudia.Soiza@fire.lacounty.gov).

### **FORESTRY DIVISION – OTHER ENVIRONMENTAL CONCERNS:**

The statutory responsibilities of the County of Los Angeles Fire Department's Forestry Division include erosion control, watershed management, rare and endangered species, vegetation, fuel modification for Very High Fire Hazard Severity Zones or Fire Zone 4, archeological and cultural resources, and the County Oak Tree Ordinance.

A2-3

The County of Los Angeles Fire Department's Forestry Division has no further comments regarding this project.

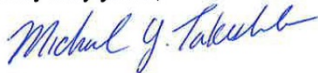
### **HEALTH HAZARDOUS MATERIALS DIVISION:**

The Health Hazardous Materials Division of the Los Angeles County Fire Department has no comments or requirements for the project at this time.

A2-4

If you have any additional questions, please contact this office at (323) 890-4330.

Very truly yours,



MICHAEL Y. TAKESHITA, ACTING CHIEF, FORESTRY DIVISION  
PREVENTION SERVICES BUREAU

MYT:ac

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

**A2. Response to Comments County of Los Angeles Fire Department, dated December 19, 2017.**

A2-1 Table 5.12-1 has been revised as follows to reflect the commenter's clarification.

**Table 5.12-1 Fire Stations**

Station Address Distance from Project Site	Apparatus	Daily Staffing
Station 44 (1105 Highland Avenue, Duarte) 1.2 miles from the City of Hope campus	<del>1 engine company, 1 assessment engine company, 2 fire engines, one 1 patrol vehicle</del>	7
Station 48 (15546 Arrow Highway, Irwindale) 4.2 miles from the City of Hope campus	1 fire engine	4
Station 169 (5112 Peck Road, El Monte) 4.0 miles from the City of Hope Campus	1 fire engine	3
Source: Johnson 2016		

A2-2 The proposed project is required to meet the requirements of the Los Angeles County Fire Code, including requirements related to emergency access, water mains, fire flows, fire hydrants, building design to accommodate fire department apparatus, and sprinkler systems. Compliance would be confirmed through the building permit process.

The project site features multiple points of ingress/egress access under both existing conditions and buildout of the proposed project. No revisions to the proposed project or DEIR analysis related to site access are necessary.

Regulatory requirements applicable to the proposed project are discussed throughout the DEIR. The City acknowledges the requirements and Los Angeles County Fire Department development review responsibilities mentioned by the commenter. No revisions to the DEIR are necessary.

The commenter is correct in that the Santa Fe Flood Control Basin, which is adjacent to the southern and eastern site boundaries, is mapped as a Very High Fire Hazard Severity Zone (VHFHSZ) by the California Department of Forestry and Fire Prevention. However, the project site is already urbanized and the proposed project would not encroach into the VHFHSZ; infill development on the existing developed campus would not result in greater impacts related to wildfire hazards. As stated in Section 5.7, *Hazards and Hazardous Materials*, and Section 5.12, *Public Services*, of the DEIR, development in accordance with the proposed Campus Plan would be required to comply with all applicable fire code and ordinances for construction, access, water mains, fire flows, and fire hydrants.

A2-3 The County of Los Angeles Fire Department's Forestry Division has no further comments regarding the project. No response necessary.

## 2. Response to Comments

A2-4      The County of Los Angeles Fire Department's Health Hazardous Materials Division has no comments at this time. No response necessary.



## 2. Response to Comments

LETTER A3– County Sanitation Districts of Los Angeles County (3 pages)



1955 Workman Mill Road, Whittier, CA 90601-1400  
Mailing Address: P.O. Box 4998, Whittier, CA 90607-4998  
Telephone: (562) 699-7411, FAX: (562) 699-5422  
www.lacsd.org

### COUNTY SANITATION DISTRICTS OF LOS ANGELES COUNTY

GRACE ROBINSON HYDE  
Chief Engineer and General Manager

January 3, 2018

Ref. Doc. No.: 4351887

Mr. Jason Golding  
Planning Division Manager  
City of Duarte  
1600 Huntington Drive  
Duarte, CA 91010

Dear Mr. Golding:

#### DEIR Response to the City of Hope Campus Plan

The Sanitation Districts of Los Angeles County (Districts) received a Draft Environmental Impact Report (DEIR) for the subject project on November 15, 2017. The proposed project is located within the jurisdictional boundaries of District No. 22. Previous comments submitted by the Districts in correspondence dated November 16, 2015 (copy enclosed) still apply the subject project with the following updated information:

1. The San Jose Creek Water Reclamation Plant currently processes an average flow of 64.6 million gallons per day. Adjust accordingly throughout the document.
2. All other information concerning Districts' facilities and sewerage service contained in the document is current.

If you have any questions, please contact the undersigned at (562) 908-4288, extension 2717.

Very truly yours,

Adriana Raza  
Customer Service Specialist  
Facilities Planning Department

AR:ar

Enclosure

cc: L. Smith  
A. Schmidt  
M. Tatalovich

DOC: #4406320.D22

A3-1

## 2. Response to Comments



### COUNTY SANITATION DISTRICTS OF LOS ANGELES COUNTY

1955 Workman Mill Road, Whittier, CA 90601-1400  
Mailing Address: P.O. Box 4998, Whittier, CA 90607-4998  
Telephone: (562) 699-7411, FAX: (562) 699-5422  
www.lacsd.org

GRACE ROBINSON HYDE  
Chief Engineer and General Manager

November 16, 2015

Ref File No.: 3485831

Mr. Jason Golding  
Senior Planner  
Planning Division  
City of Duarte  
1600 Huntington Drive  
Duarte, CA 91010-2592

Dear Mr. Golding:

#### Comment Letter for City of Hope Campus Plan

The County Sanitation Districts of Los Angeles County (Districts) received a Notice of Preparation of a Draft Environmental Impact Report for the subject project on October 16, 2015. The proposed development is located within the jurisdictional boundaries of District No. 22. We offer the following comments regarding sewerage service:

A3-2

1. The proposed project expansion may require an amendment to a Districts' permit for Industrial Wastewater Discharge. Project developers should contact the Districts' Industrial Waste Section at (562) 908-4288, extension 2900, in order to reach a determination on this matter. If this update is necessary, project developers will be required to forward copies of final plans and supporting information for the proposed project to the Districts for review and approval before beginning project construction.
2. The wastewater flow originating from the proposed project site is discharging directly to the Districts' Joint Outfall B Unit 8G Trunk Sewer, located in Galen Street at Buena Vista Street. This 15-inch diameter trunk sewer has a design capacity of 3.5 million gallons per day (mgd) and conveyed a peak flow of 0.9 mgd when last measured in 2014. Modifications to the existing sewer connection will require submittal of Sewer Plans for review and approval by the Districts. For additional information, please contact the Districts' Engineering Counter at (562) 908-4288, extension 1205.
3. The wastewater generated by the proposed project will be treated at the San Jose Creek Water Reclamation Plant (WRP) located adjacent to the City of Industry, which has a design capacity of 100 mgd and currently processes an average flow of 69.4 mgd. All biosolids and wastewater flows that exceed the capacity of the San Jose Creek WRP are diverted to and treated at the Joint Water Pollution Control Plant in the City of Carson.

A3-3

A3-4

DOC: #3515451.D22

Recycled Paper 

## 2. Response to Comments

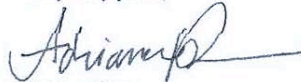
Mr. Jason Golding

-2-

November 16, 2015

4. In order to estimate the volume of wastewater the project will generate, go to [www.lacsd.org](http://www.lacsd.org), Wastewater & Sewer Systems, click on Will Serve Program, and click on the [Table 1. Loadings for Each Class of Land Use](#) link for a copy of the Districts' average wastewater generation factors. A3-5
5. The Districts are empowered by the California Health and Safety Code to charge a fee for the privilege of connecting (directly or indirectly) to the Districts' Sewerage System or for increasing the strength or quantity of wastewater discharged from connected facilities. This connection fee is a capital facilities fee that is imposed in an amount sufficient to construct an incremental expansion of the Sewerage System to accommodate the proposed project. Payment of a connection fee will be required before a permit to connect to the sewer is issued. For more information and a copy of the Connection Fee Information Sheet, go to [www.lacsd.org](http://www.lacsd.org), Wastewater & Sewer Systems, click on Will Serve Program, and search for the appropriate link. In determining the impact to the Sewerage System and applicable connection fees, the Districts' Chief Engineer will determine the user category (e.g. Condominium, Single Family home, etc.) that best represents the actual or anticipated use of the parcel or facilities on the parcel. For more specific information regarding the connection fee application procedure and fees, please contact the Connection Fee Counter at (562) 908-4288, extension 2727. A3-6
6. In order for the Districts to conform to the requirements of the Federal Clean Air Act (CAA), the design capacities of the Districts' wastewater treatment facilities are based on the regional growth forecast adopted by the Southern California Association of Governments (SCAG). Specific policies included in the development of the SCAG regional growth forecast are incorporated into clean air plans, which are prepared by the South Coast and Antelope Valley Air Quality Management Districts in order to improve air quality in the South Coast and Mojave Desert Air Basins as mandated by the CCA. All expansions of Districts' facilities must be sized and service phased in a manner that will be consistent with the SCAG regional growth forecast for the counties of Los Angeles, Orange, San Bernardino, Riverside, Ventura, and Imperial. The available capacity of the Districts' treatment facilities will, therefore, be limited to levels associated with the approved growth identified by SCAG. As such, this letter does not constitute a guarantee of wastewater service, but is to advise you that the Districts intend to provide this service up to the levels that are legally permitted and to inform you of the currently existing capacity and any proposed expansion of the Districts' facilities. A3-7
- If you have any questions, please contact the undersigned at (562) 908-4288, extension 2717.

Very truly yours,



Adriana Raza  
Customer Service Specialist  
Facilities Planning Department

AR:ar

cc: L. Smith  
M. Sullivan  
M. Tatafovich

DOC: #3515451.D22

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

### A3. Response to Comments from County Sanitation Districts of Los Angeles County, dated January 3, 2018.

A3-1 Page 5.16-3 of the DEIR has been updated as follows to reflect information provided by the commenter.

#### *Wastewater Treatment*

The wastewater generated by the project site is conveyed through the aforementioned trunk sewer pipelines and treated at the San Jose Creek Water Reclamation Plant (SJCWRP) located at 1965 Workman Mill Road in unincorporated Los Angeles County adjacent to the City of Industry. The design capacity of the SJCWRP is 100 million gallons per day (mgd) and the facility currently processes an average flow of 64.669.4 mgd, resulting in a remaining capacity of about 35.430.6 mgd.

Furthermore, Page 5.16-7 has been updated as follows.

#### **Wastewater Treatment**

As discussed under Subsection 5.16.1.1, above, the wastewater generated by the project site is treated at the SJCWRP, which has a design capacity of 100 mgd and currently processes an average flow of 64.669.4 mgd. Approximately 42 million gallons per day of reclaimed water (tertiary treatment) is reused for groundwater recharge, irrigation of parks, schools, and greenbelts with the remainder discharged to the San Gabriel River. SJCWRP has a remaining capacity of about 35.430.6 mgd. The projected average peak daily wastewater flow generated by buildout of the proposed Campus Plan—823,908 gpd—would only represent 0.8 percent of the facility’s design capacity and 2.32.7 percent of its remaining capacity. When compared to the SJCWRP’s overall treatment capacity, buildout of the proposed Campus Plan would not have a significant impact on the SJCWRP’s ability to treat wastewater in the area. Impacts related to wastewater treatment would be less than significant.

A3-2 The need for amendments to existing wastewater discharge permits does not represent an impact of the proposed project on the physical environment. No revisions to the DEIR are necessary.

A3-3 The proposed project’s impact on the trunk sewer located in Galen Street is discussed on Page 5.16-7 of Section 5.16, *Utilities and Service Systems*, of the DEIR. The average daily increase in wastewater flow estimated for the proposed project is 8.3 percent of the design capacity and 11.1 percent of its remaining flow capacity. Therefore, project flows are well within the design capacity of the existing sewer system. As stated in the comment, the project applicant will be required to comply with review procedures conducted by the County Sanitation Districts of Los Angeles County.


## 2. Response to Comments

- A3-4      Comment noted. Per Comment A3-1 (see above), this information in the DEIR has been updated with more recent data. No additional revisions to the DEIR are required.
- A3-5      County Sanitation Districts of Los Angeles County's wastewater generation factors were used as requested by the District. As stated on Page 5.16-1 of the DEIR, wastewater generation factors on the County Sanitation Districts of Los Angeles County's website were utilized to estimate volumes of wastewater generated by the proposed project.
- A3-6      Comment noted; no revisions to the DEIR are required.
- A3-7      Comment noted; no revisions to the DEIR are required.



## 2. Response to Comments

### LETTER A4 – Gabrieleño Band of Mission Indians – Kizh Nation (1 page)



**GABRIELEÑO BAND OF MISSION INDIANS – KIZH NATION**  
Historically known as The San Gabriel Band of Mission Indians  
recognized by the State of California as the aboriginal tribe of the Los Angeles basin

City of Duarte  
1600 Huntington Drive  
Duarte, CA 91010

November 16, 2017

Re: AB52 Consultation request for the City of Hope Campus Plan


Dear Jason Golding,

Please find this letter as a written request for consultation regarding the above-mentioned project pursuant to Public Resources Code § 21080.3.1, sub d. (d). Your project lies within our ancestral tribal territory, meaning belonging to or inherited from, which is a higher degree of kinship than traditional or cultural affiliation. Your project is located within a sensitive area and may cause a substantial adverse change in the significance of our tribal cultural resources. Most often, a records search for our tribal cultural resources will result in a “no records found” for the project area. The Native American Heritage Commission (NAHC), ethnographers, historians, and professional archaeologists can only provide limited information that has been previously documented about California Native Tribes. This is the reason the NAHC will always refer the lead agency to the respective Native American Tribe of the area because the NAHC is only aware of general information and are not the experts on each California Tribe. Our Elder Committee & tribal historians are the experts for our Tribe and are able to provide a more complete history (both written and oral) regarding the location of historic villages, trade routes, cemeteries and sacred/religious sites in the project area. Therefore, to avoid adverse effects to our tribal cultural resources, we would like to consult with you and your staff to provide you with a more complete understanding of the prehistoric use(s) of the project area and the potential risks for causing a substantial adverse change to the significance of our tribal cultural resources.

Consultation appointments are available on Wednesdays and Thursdays at our offices at 910 N. Citrus Ave. Covina, CA 91722 or over the phone. Please call toll free 1-844-390-0787 or email [gabrielenoindians@yahoo.com](mailto:gabrielenoindians@yahoo.com) to schedule an appointment.

\*\* Prior to the first consultation with our Tribe, we ask all those individuals participating in the consultation to view a video produced and provided by CalEPA and the NAHC for sensitivity and understanding of AB52. You can view their videos at: <http://calepa.ca.gov/Tribal/Training/> or <http://nahc.ca.gov/2015/12/ab-52-tribal-training/>

With Respect,

  
Andrew Salas, Chairman

Andrew Salas, Chairman  
Albert Perez, treasurer |  
PO Box 393, Covina, CA 91723

Nadine Salas, Vice-Chairman  
Martha Gonzalez Lemos, treasurer |  
[www.gabrielenoindians.org](http://www.gabrielenoindians.org)

Christina Swindall Martinez, secretary  
Richard Gradias, Chairman of the Council of Elders  
[gabrielenoindians@yahoo.com](mailto:gabrielenoindians@yahoo.com)

A4-1

## 2. Response to Comments

*This page intentionally left blank.*



## 2. Response to Comments

### A4. Response to Comments from Gabrieleño Band of Mission Indians – Kizh Nation, dated November 16, 2017.

A4-1 The commenter requests consultation with the City regarding the proposed project. However, as discussed in Section 5.15, *Tribal Cultural Resources*, of the DEIR, correspondence was exchanged between the City and the commenter regarding the proposed project in 2016. The commenter outlined concerns related to the City's location on top of a Gabrieleño Prehistoric Village. The City of Duarte sent a follow up letter on September 22, 2016, providing the tribe with cultural resources results and requesting additional documentation related to the cultural significance attributed to the project site and surrounding area (see Appendix E1 in the DEIR). The City requested an in-person or telephone consultation to go over this additional data to confirm the need for a Native American monitor to be present during all ground disturbances. Prior to completion and public distribution of the DEIR, no response was received from the tribe and the consultation period closed. In accordance with Public Resources Code Section 21080.3.2(b)(2), consultation is concluded when a party, acting in good faith and after reasonable effort, concludes that a mutual agreement cannot be reached.

Nevertheless, impacts related to tribal cultural resources were determined to be potentially significant and Mitigation Measure CUL-2 was identified to mitigate such potential impacts. With mitigation, impacts related to tribal cultural resources were determined to be less than significant. For more information see Section 5.15, *Tribal Cultural Resources*, in the DEIR.

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

LETTER A5 – Laborers International Union of North America, Local Union #300 (1 page)



T 510.836.4200  
F 510.836.4205

410 12th Street, Suite 250  
Oakland, Ca 94607

www.lozeaudrury.com  
richard@lozeaudrury.com

January 3, 2018

*Via Email*

Jason Golding, Planning Div. Manager  
City of Duarte  
1600 Huntington Drive  
Duarte, CA 91010  
[goldingj@accessduarte.com](mailto:goldingj@accessduarte.com)

**Re: City of Hope Campus Plan Draft Environmental Impact Report (SCH No. 2015101047)**

Dear Mr. Golding:

I am writing on behalf of Laborers International Union of North America, Local Union No. 300 and its members living in Los Angeles County (collectively "LIUNA" or "Commenters") regarding the Draft Environmental Impact Report ("DEIR") prepared for the City of Hope Campus Plan, State Clearinghouse No. 2015101047 ("Project").

A5-1

After reviewing the DEIR, we conclude that the DEIR fails as an informational document and fails to impose all feasible mitigation measures to reduce the Project's impacts. Commenters request that the City of Duarte Planning Commission, City Council, and your staffs address these shortcomings in a revised draft environmental impact report ("RDEIR") and recirculate the RDEIR prior to considering approvals for the Project. We reserve the right to supplement these comments during review of the Final EIR for the Project and at public hearings concerning the Project. *Galante Vineyards v. Monterey Peninsula Water Management Dist.*, 60 Cal. App. 4th 1109, 1121 (1997).

Sincerely,

A handwritten signature in blue ink, appearing to read 'Richard Drury', is placed above the printed name.

Richard Drury

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

**A5. Response to Comments from Laborers International Union of North America, dated January 3, 2018.**

A5-1 The commenter does not identify a reason for LIUNA's assertion that the DEIR "fails as an informational document" or "fails to impose all feasible mitigation measures." The commenter does not identify any environmental topic for which more information is necessary, nor does the commenter identify any specific issue with the DEIR's analysis or conclusions. The commenter has submitted no evidence supporting its allegations. No response is necessary and no revisions to the DEIR are required.

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

LETTER A6 – Los Angeles County Metropolitan Transportation Authority (5 pages; see also Appendix A)



**Metro**

Los Angeles County  
Metropolitan Transportation Authority

One Gateway Plaza  
Los Angeles, CA 90012-2952

213.922.2000 Tel  
metro.net

January 4, 2018

Jason Golding  
Planning Division  
City of Duarte  
1600 Huntington Drive  
Duarte, CA 91010

**RE: Comment Letter – City of Hope Campus Plan – Notice of Availability of a Draft Environmental Impact Report**

Dear Mr. Golding:

Thank you for the opportunity to comment on the Notice of Availability of a Draft Environmental Impact Report for the City of Hope Campus Plan located in the City of Duarte. This letter conveys recommendations from the Los Angeles County Metropolitan Transportation Authority (Metro) concerning issues that are germane to our agency's statutory responsibility in relation to our facilities and services that may be affected by the proposed project.

Metro is committed to working with stakeholders across the County to support the development of transit oriented communities (TOCs). TOCs are built by considering transit within a broader community and creating vibrant, compact, walkable, and bikeable places centered around transit stations and hubs with the goal of encouraging the use of transit and other alternatives to driving. Metro looks forward to collaborating with local municipalities, developers, and other stakeholders in their land use planning and development efforts, and to find partnerships that support TOCs across Los Angeles County.

### **Project Description**

The project, through a comprehensive Specific Plan, proposes to provide direction for enhancement and development over a 20-year period of an approximately 116-acre area that contains its existing campus. City of Hope is proposing additions to the existing outpatient (clinic), inpatient (hospital), research, office, industrial, warehouse, and hospitality uses. New parking structures and surface lots are also proposed as well as internal roadways and open space improvements. In addition, the project proposes to consolidate modular buildings that are currently dispersed throughout the campus, demolish outdated buildings, and construct new floor area within larger development sites that provide flexibility for future buildout of the campus. The maximum development capacity allowed by the Specific Plan consists of approximately 1,426,000 square feet of new development which would result in up to approximately 2,639,350 gross square feet of development on the City of Hope campus.

### **Metro Comments**

A6-1

## 2. Response to Comments

City of Hope Campus Plan  
Notice of Availability of a Draft Environmental Impact Report – Metro Comments  
January 4, 2018

### *Gold Line Adjacency*

It is noted that the northern boundary of project site is adjacent the Metro Gold Line light rail right-of-way (ROW). Additionally, the proposed project is in close proximity to the Duarte/City of Hope Station. The following concerns related to the project's proximity to the ROW should be addressed:

1. The Project sponsor is advised that the Metro Gold Line light rail currently operates weekday peak service as often as every five minutes in both directions and that trains may operate, in and out of revenue service, 24 hours a day, seven days a week, in the ROW proximate to the proposed project.
2. Considering the proximity of the proposed project to the railroad ROW, the Metro Gold Line will produce noise, vibration and visual impacts. A recorded Noise Easement Deed in favor of Metro is required, a form of which is attached. The easement recorded in the Deed will extend to successors and tenants as well. In addition, any noise mitigation required for the project must be borne by the developers of the project and not Metro.
3. The Project sponsor should notify Metro of any changes to the construction/building plans that may impact the use of the ROW. Construction and/or excavation work in proximity to Metro ROW with potential to damage the tracks and related infrastructure may be subject to additional OSHA safety requirements.
4. There shall be no encroachment onto the railroad ROW. If access is necessary for the applicant or its contractor to enter the ROW during construction, a temporary right-of entry agreement must be obtained from Metro. Contact John Potts, Deputy Executive Officer of Real Estate, at 213-922-2435 for right-of-entry permits. A6-2
5. Where the property is immediately adjacent to Metro ROW, all structures, walls, and fences as part of the development should be set back five (5) feet from Metro property line to allow adequate space for property maintenance. Property owners will not be permitted to access Metro property to maintain private development.
6. The Project sponsor should be advised that construction activities will not be allowed to impact Metro property and equipment. Metro Engineering must review construction plans and operations, including any crane placement and radius, prior to any permits being issued. Permits for special operations including the use of a pile driver or any other equipment that could come into close proximity to the OCS or support structure must be obtained at least two weeks prior to the start of construction.
7. During construction, a protection barrier of acceptable material shall be constructed to cover the full height of the building to prevent objects, material, or debris from falling onto the Metro ROW or contacting the electrified OCS and support structures.
8. OCS wire overhead should be treated like any high voltage electrical utility wire on any construction site. Proper signage should be posted for equipment working in and around the wires.



## 2. Response to Comments

City of Hope Campus Plan  
Notice of Availability of a Draft Environmental Impact Report – Metro Comments  
January 4, 2018

9. Metro staff shall be permitted to monitor construction activity to ascertain any impact to the ROW.
10. The Project sponsor should be advised that Metro may request reimbursement for costs incurred as a result of project construction/operation issues that cause delay or harm to Metro service delivery or infrastructure.

A6-2  
Cont'd

### *Bus Stop Adjacency*

Metro Bus Lines 264 and 267 operate on Duarte Road, adjacent to the proposed Project. One Metro bus stop on the corner of Duarte Road and Hope Drive is directly adjacent to the proposed Project. The following comments relate to bus operations and the bus stop:

1. Although the Project is not expected to result in any long-term impacts on transit, the developer should be aware of the bus facilities and services that are present. The existing Metro bus stop must be maintained as part of the final Project.
2. During construction, the stop must be maintained or relocated consistent with the needs of Metro Bus operations. Please contact Metro Bus Operations Control Special Events Coordinator at 213-922-4632 and Metro's Stops and Zones Department at 213-922-5190 at least 30 days in advance of initiating construction activities. Other municipal buses may also be impacted and should be included in construction outreach efforts.
3. Metro encourages the installation of bus shelters with benches, way finding signage, enhanced crosswalks and ramps compliant with the Americans with Disabilities Act (ADA), as well as pedestrian lighting and shade trees in paths of travel to access transit stops and other amenities that improve safety and comfort for transit riders. The City should consider requesting the installation of such amenities as part of the development of the site.
4. Driveways accessing parking and loading at the Project site should be located away from transit stops, and be designed and configured to avoid potential conflicts with on-street transit services and pedestrian traffic to the greatest degree possible. Vehicular driveways should not be located in or directly adjacent to areas that are likely to be used as waiting areas for transit.
5. Final design of the bus stop and surrounding sidewalk area must be ADA-compliant and allow passengers with disabilities a clear path of travel to the bus stop from the proposed development.

A6-3

### *Transit Orientation*

Considering the proximity to the Duarte/City of Hope Station, Metro would like to identify the potential synergies associated with transit-oriented development:

1. Metro supports development of commercial and residential properties near transit stations and understands that increasing development near stations represents a mutually beneficial opportunity to increase ridership and enhance transportation options for the users of developments. Metro encourages the City and Project sponsor to be mindful of the Project's proximity to the Duarte/City of Hope Station, including orienting pedestrian pathways toward the station.

A6-4

## 2. Response to Comments

City of Hope Campus Plan  
Notice of Availability of a Draft Environmental Impact Report – Metro Comments  
January 4, 2018

2. Metro would like to inform the Project sponsor of Metro's employer transit pass programs including the Annual Transit Access Pass (A-TAP) and Business Transit Access Pass (B-TAP) programs which offer efficiencies and group rates that businesses can offer employees as an incentive to utilize public transit. For more information on these programs, contact Devon Deming at 213-922-7957 or [DemingD@metro.net](mailto:DemingD@metro.net).
3. Metro encourages the incorporation of transit-oriented, pedestrian-oriented parking provision strategies such as the reduction or removal of minimum parking requirements for specific areas and the exploration of shared parking opportunities or parking benefit districts. These strategies could be pursued to encourage more transit-oriented development and reduce automobile-orientation in design and travel demand.
4. With an anticipated increase in traffic, Metro encourages an analysis of impacts on non-motorized transportation modes and consideration of improved non-motorized access to the station including pedestrian connections and bike lanes/paths. Appropriate analyses could include multi-modal LOS calculations, pedestrian audits, etc.
5. The Project should address first-last mile connections to transit, encouraging development that is transit accessible with bicycle and pedestrian-oriented street design connecting stations with housing and employment concentrations. For reference, please view the First Last Mile Strategic Plan, authored by Metro and the Southern California Association of Governments (SCAG), available on-line at: [http://media.metro.net/docs/sustainability\\_path\\_design\\_guidelines.pdf](http://media.metro.net/docs/sustainability_path_design_guidelines.pdf)
6. Metro encourages the installation of wide sidewalks, pedestrian lighting, a continuous canopy of shade trees, enhanced crosswalks with ADA-compliant curb ramps, and other amenities along the all of the site's public right-of-way frontages to improve pedestrian safety and comfort to access the nearby bus stops. The City should consider requesting the installation of such amenities as part of the development of the site.
7. Any planned wayfinding that also includes Metro content/information must conform to Metro Signage Standards. Please contact Lance Glover, Senior Manager with Metro Signage & Environmental Graphic Design, with any questions at [GloverL@metro.net](mailto:GloverL@metro.net) or 213.922.2360 for the latest version of these standards. Metro reserves the right to review and approve any use of its information on such signage.

A6-4  
Cont'd

### *Congestion Management Program*

Beyond impacts to Metro facilities and operations, Metro must also notify the applicant of state requirements. A Transportation Impact Analysis (TIA), with roadway and transit components, is required under the State of California Congestion Management Program (CMP) statute. The CMP TIA Guidelines are published in the "2010 Congestion Management Program for Los Angeles County," Appendix D (attached). The geographic area examined in the TIA must include the following, at a minimum:

A6-5

## 2. Response to Comments

City of Hope Campus Plan  
Notice of Availability of a Draft Environmental Impact Report – Metro Comments  
January 4, 2018

1. All CMP arterial monitoring intersections, including monitored freeway on/off-ramp intersections, where the proposed Project will add 50 or more trips during either the a.m. or p.m. weekday peak hour (of adjacent street traffic).
2. If CMP arterial segments are being analyzed rather than intersections, the study area must include all segments where the proposed Project will add 50 or more peak hour trips (total of both directions). Within the study area, the TIA must analyze at least one segment between monitored CMP intersections.
3. Mainline freeway-monitoring locations where the Project will add 150 or more trips, in either direction, during either the a.m. or p.m. weekday peak hour.
4. Caltrans must also be consulted through the NOP process to identify other specific locations to be analyzed on the state highway system.

A6-5  
Cont'd

The CMP TIA requirement also contains two separate impact studies covering roadways and transit, as outlined in Sections D.8.1 – D.9.4. If the TIA identifies no facilities for study based on the criteria above, no further traffic analysis is required. However, projects must still consider transit impacts. For all CMP TIA requirements please see the attached guidelines.

If you have any questions regarding this response, please contact Derek Hull at 213-922-3051 or by email at DevReview@metro.net.

Sincerely,



Derek Hull  
Manager, Transportation Planning

Attachments:      Noise Easement Deed  
                             Adjacent Construction Design Manual  
                             CMP Appendix D: Guidelines for CMP Transportation Impact Analysis

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

**A6. Response to Comments from Los Angeles County Metropolitan Transit Authority (Metro), dated January 4, 2018. Note attachments received from Metro are provided in Appendix A of this FEIR.**

A6-1 The commenter presents a summary of the agency's responsibility and current work efforts along with a summary of the project description. Comment noted.

A6-2 The proximity of the Metro Gold Line to the project site is acknowledged in the DEIR. Although the Metro right-of-way (ROW) and Gold Line Station are directly across Duarte Road from the project site, implementation of the proposed Campus Plan—including construction activities—is not anticipated to interfere with train service, encroach into Metro's ROW, or otherwise impact Metro transit service, property, or equipment. Since construction of the proposed project would not affect Metro facilities, Metro's review of construction plans are not necessary.

Buildings or barriers would not be constructed adjacent to Metro facilities and the project applicant will not require use of Metro ROW to access the project site. The City acknowledges Metro's policies and procedures regarding construction near Metro facilities, as identified by the commenter, and will notify Metro in the event that construction activities may impact the agency's facilities.

Noise and vibration impacts are addressed in Section 5.10, *Noise*, of the DEIR and aesthetics impacts are addressed in Section 5.1, *Aesthetics*. CEQA does not require an evaluation of the impact of the existing environment on a proposed project or its population, unless the project would worsen the existing environmental conditions or hazards. An analysis of noise and vibration from the Metro Gold Line light rail on the proposed project is not warranted and would not be considered an environmental impact of the project.

A6-3 Existing transit service in the vicinity of the project site is discussed in the proposed Specific Plan and in the DEIR. Figure 18 in the Specific Plan shows proposed transit, bicycle, and pedestrian network, including preservation of existing bus stop locations. No additional access points will be added and no conflicts with Metro facilities would occur. Relocation of bus stops is required to implement the project. Since there are no impacts to transit facilities, upgrades to Metro facilities are not required.

A6-4 The City recognizes the potential synergies associated with transit-oriented development identified by Metro. Please also refer to Section 4.4, Transit, Bicycle & Pedestrian Network, of the Specific Plan for a description of the proposed project's connectivity with respect to Metro's Duarte/City of Hope Station. The Specific Plan encourages pedestrian connections and linkages to Metro's transit service (see also Table 3-4 in the DEIR). The DEIR analyzes impacts related to alternative transportation starting on page 5.14-46. The City of Hope currently and will continue to participate in a number of transportation demand management programs, including subsidized transit passes,

## 2. Response to Comments

shuttles to and from Baldwin Park, designated carpool parking spaces, incentive programs, carpool matching, subsidized vanpools, and a Guaranteed Ride Home Program for carpoolers and van poolers.

- A6-5 Please refer to the Transportation Impact Study Section 5 (Appendix J1 of the DEIR) and Impact 5.14-2 of the DEIR starting on page 5.14-44 for an analysis of potential project impacts on CMP facilities. Based on the CMP criteria, the proposed project would not add 50 or more vehicle trips during the AM or PM peak hours at any CMP intersections and would not added 150 trips during the AM or PM peak hours to any CMP mainline freeway segment. The City consulted with Caltrans during the NOP process to agree on methodology and criteria for analyzing impacts to State facilities. Based on the foregoing, and consistent with the criteria discussed in the comment and analyzed in the DEIR, no further traffic analysis is required.



## 2. Response to Comments

LETTER A7 – South Coast Air Quality Management District (4 pages)



### South Coast Air Quality Management District

21865 Copley Drive, Diamond Bar, CA 91765-4178  
(909) 396-2000 • [www.aqmd.gov](http://www.aqmd.gov)

SENT VIA E-MAIL AND USPS:

January 4, 2018

[goldingi@accessduarte.com](mailto:goldingi@accessduarte.com)

Jason Golding, Planning Division Manager  
City of Duarte – Planning Division  
1600 Huntington Drive  
Duarte, CA 91010

**Draft Environmental Impact Report (Draft EIR) for the Proposed  
City of Hope Campus Plan  
(Specific Plan – General Plan Amendment 15-01 and Zone Change 15-01)**

The South Coast Air Quality Management District (SCAQMD) staff appreciates the opportunity to comment on the above-mentioned document. The following comments are meant as guidance for the Lead Agency and should be incorporated into the Final EIR.

**SCAQMD Staff's Summary of Project Description**

The Lead Agency proposes to develop a Campus Plan for the City of Hope as a blueprint to guide enhancement and development with the buildout year in 2035 on approximately 116 acres (Proposed Project). The Proposed Project has a maximum development capacity of 1,436,000 square feet of new development with 387,500 square feet of existing structures proposed for demolition. The Proposed Project is generally bound by the Metro Gold line to the north, the Santa Fe Flood Control Basin to the east and south, and residential uses to the west. Construction of the Proposed Project would occur in phases with construction of each subsequent phase beginning at the completion of the previous phase over a period of 18 years from year 2017 to year 2035<sup>1</sup>. Thus, operation of earlier phases would occur in conjunction with construction of later phases.

A7-1

**SCAQMD Staff's Summary of Air Quality and Health Risk Assessment (HRA) Analyses**

In the Air Quality Section, the Lead Agency quantified the Proposed Project's construction and operational air quality impacts and compared those impacts to SCAQMD's regional and localized air quality CEQA significance thresholds. Based on the analyses, the Lead Agency found that the Proposed Project's construction emissions for PM<sub>2.5</sub>, during Phase 1, would be less than significant after incorporating mitigation measure (MM) AQ-1.<sup>2</sup> Additionally, the Lead Agency performed an HRA and found that the Maximum Exposed Individual Resident cancer risk would be 5.1 in one million after incorporating MM AQ-2, which is below SCAQMD's CEQA significance threshold of 10 in one million for cancer risk.<sup>3</sup> SCAQMD staff has comments regarding the Air Quality Analysis. Please see the attachment for more information. The attachment also includes comments on existing air quality mitigation measure, additional recommended mitigation measure, and SCAQMD Rule 403(e).

Pursuant to California Public Resources Code Section 21092.5 and CEQA Guidelines Section 15088, SCAQMD staff requests that the Lead Agency provide SCAQMD staff with written responses to all comments contained herein prior to the certification of the Final EIR. SCAQMD staff is available to work with the lead agency to address these issues and any other questions that may arise. Please contact Ryan Bañuelos, Air Quality Specialist, CEQA IGR Section, at (909) 396-3479, if you have any questions regarding the enclosed comments.

<sup>1</sup> Draft EIR, Section 5.2 *Air Quality*, Pages 5.2-21 and 5.2-35.

<sup>2</sup> *Ibid.* Page 5.2-41.

<sup>3</sup> *Ibid.* Page 5.2-42.

## 2. Response to Comments

Jason Golding

2

January 4, 2018

Sincerely,

*Lijin Sun*

Lijin Sun, J.D.

Program Supervisor, CEQA IGR

Planning, Rule Development & Area Sources

A7-1  
Count'd

Attachment  
LS:RB  
LAC171116-04  
Control Number



## 2. Response to Comments

Jason Golding

3

January 4, 2018

## ATTACHMENT

**Air Quality Analysis – Overlapping Construction and Operational Impacts**

1. When specific development is reasonably foreseeable as result of the goals, policies, and guidelines in the Proposed Project, the Lead Agency should identify any potential adverse air quality impacts and sources of air pollution that could occur using its best efforts to find out and a good-faith effort at full disclosure in the EIR. The degree of specificity will correspond to the degree of specificity involved in the underlying activity which is described in the EIR (CEQA Guidelines Section 15146). When quantifying air quality emissions, emissions from both construction (including demolition, if any) and operations should be calculated.

Based on a review of the Air Quality Analysis, the Lead Agency did not analyze a scenario where construction emissions overlap with operational emissions. Since implementation of the Proposed Project is expected over a period of 18 years, an overlapping construction and operation scenario is reasonably foreseeable, unless the Proposed Project includes requirement(s) that will avoid overlapping construction and operational activities. To properly analyze a worst-case impact scenario that is reasonably foreseeable at the time the Draft EIR is prepared, SCAQMD staff recommends that the Lead Agency identify the overlapping years, combine construction emissions (including emissions from demolition) with operational emissions, and compare the combined emissions to SCAQMD's air quality CEQA operational thresholds of significance to determine the level of significance in the Final EIR. In the event that the Lead Agency, after revising the Air Quality analysis, finds that the Proposed Project's air quality impacts would be significant, mitigation measures will be required pursuant to CEQA Guidelines Section 15126.4. For more information on potential mitigation measures as guidance to the Lead Agency, please visit SCAQMD's CEQA Air Quality Handbook website<sup>4</sup>.

A7-2

**Comments on Existing Mitigation Measure AQ-2: Use of Level 3 Diesel Particulate Filters (DPF)**

2. The Lead Agency is committed to using Level 3 DPF for all construction equipment of 50 horsepower or more. SCAQMD staff recommends using off-road diesel-powered construction equipment that meets or exceeds the CARB and USEPA Tier 4 off-road emissions standards for equipment rated at 50 horsepower or greater during Project construction. Such equipment will be outfitted with Best Available Control Technology (BACT) devices including a CARB certified Level 4 Diesel Particulate Filter or equivalent. These requirements shall be included in applicable bid documents and successful contractor(s) must demonstrate the ability to supply such equipment. A copy of each unit's certified tier specification or model year specification and CARB or SCAQMD operating permit (if applicable) shall be available upon request at the time of mobilization of each applicable unit of equipment. In the event that construction equipment cannot meet the Tier 4 engine certification, the Project representative or contractor must demonstrate through future study with written findings supported by substantial evidence that is approved by the Lead Agency before using other technologies/strategies. Alternative applicable strategies may include, but would not be limited to, reduction in the number and/or horsepower rating of construction equipment, limiting the number of daily construction haul truck trips to and from the Project, using cleaner vehicle fuel, and/or limiting the number of individual construction project phases occurring simultaneously.

A7-3

**Additional Recommended Mitigation Measure – Performance Standards-Based Technology Review**

3. Since the Proposed Project would be implemented over a period of 18 years, the Lead Agency should take this opportunity to deploy strategies that will foster and facilitate the deployment of the lowest emission technologies possible. SCAQMD staff recommends that the Lead Agency develop performance standards-based technology review at a programmatic level that is generally appropriate

A7-4

<sup>4</sup> South Coast Air Quality Management District. Accessed at: <http://www.aqmd.gov/home/regulations/ceqa>.

## 2. Response to Comments

Jason Golding	4	January 4, 2018
	<p>for an area-wide and long-range plan such as the Proposed Project. The deployment should include those technologies that are “capable of being accomplished in a successful manner within a reasonable period of time” (California Public Resources Code Section 21061.1), such as zero and near-zero emission technologies that are expected to be available in the life of the Proposed Project. As such, SCAQMD staff recommends that the Lead Agency incorporate the performance standards-based technology review or develop other comparable strategies or tools to periodically assess equipment availability, equipment fleet mixtures, and best available emissions control devices, and specify performance standards and appropriate timeline (or schedule) for the technology assessment that supports the goals and objectives of the 2016 AQMP.</p>	A7-4 Cont'd
	<p><b><u>Compliance with SCAQMD Rule 403(e) – Large Operations</u></b></p> <p>4. The Lead Agency included a discussion on compliance with SCAQMD Rule 403- Fugitive Dust in the Draft EIR. Based on the project description, the Proposed Project is a large operation of approximately 116 acres<sup>5</sup> (50-acre sites or more of disturbed surface area; or daily earth-moving operations of 3,850 cubic yards or more on three days in any year) in the South Coast Air Basin. The Lead Agency is required to comply with SCAQMD Rule 403(e) – Additional Requirements for Large Operations<sup>6</sup>. The requirements may include, but are not limited to, Large Operation Notification (Form 403 N), appropriate signage, additional dust control measures, and employment of a dust control supervisor that has successfully completed the Dust Control in the South Coast Air Basin training class<sup>7</sup>. Therefore, SCAQMD recommends that the Lead Agency include a discussion to demonstrate compliance with SCAQMD Rule 403(e) in the Final EIR.</p>	A7-5
	<p><b><u>Other Comment – Insufficient Time for Review</u></b></p> <p>5. The Draft EIR for the Proposed Project was released for public review and comments beginning on November 15 through January 4, 2018 (SCH No.: 2015101047). However, the electronic versions of air quality modeling and HRA files, including original emission calculation spreadsheets and air dispersion modeling files (not PDF files) were not provided to SCAQMD staff for review until January 3, 2018. On October 28, 2015<sup>8</sup>, SCAQMD staff provided timely comments on the Notice of Preparation (NOP) for the Proposed Project, where SCAQMD staff requested the Lead Agency send with the Draft EIR all of the air quality modeling, health risk assessment files, and original emission calculation spreadsheets in electronic versions to the SCAQMD for review. Further, in the same comment letter on the NOP for the Proposed Project, SCAQMD staff stated that without all files and supporting air quality documentation, SCAQMD staff would be unable to complete its review of the air quality analysis in a timely manner, and that any delays in providing all supporting air quality documentation would require additional time for review beyond the end of the comment period. The Lead Agency should provide all files and supporting air quality documentation for the Proposed Project to SCAQMD staff for review when the Draft EIR was released in order to allow SCAQMD the full review period. As such, SCAQMD staff requests that the Lead Agency consider to extend the public review comment period for the Draft EIR for the Proposed Project.</p>	A7-6
	<p><sup>5</sup> <i>Ibid</i>, Page 4.3-47.</p> <p><sup>6</sup> South Coast Air Quality Management District Rule 403. Last amended June 3, 2005. Accessed at: <a href="http://www.aqmd.gov/docs/default-source/rule-book/rule-iv/rule-403.pdf">http://www.aqmd.gov/docs/default-source/rule-book/rule-iv/rule-403.pdf</a>.</p> <p><sup>7</sup> South Coast Air Quality Management District Compliance and Enforcement Staff's contact information for Rule 403(e) Large Operations is (909) 396-2608 or by e-mail at <a href="mailto:dustcontrol@aqmd.gov">dustcontrol@aqmd.gov</a>.</p> <p><sup>8</sup> South Coast Air Quality Management District. NOP Comment Letter, dated October 28, 2015. Accessed at: <a href="http://www.aqmd.gov/docs/default-source/ceqa/comment-letters/2015/october/nopcitvofhope.pdf">http://www.aqmd.gov/docs/default-source/ceqa/comment-letters/2015/october/nopcitvofhope.pdf</a>.</p>	

---

2. Response to Comments**A7. Response to Comments from South Coast Air Quality Management District, dated January 4, 2018.**

A7-1 The commenter provides a summary of the project description for the proposed project in addition to an overview of the initial review of the construction health risk assessment conducted by the South Coast Air Quality Management District. Lastly, the commenter notes that written responses should be provided to address the commenter's comments and recommendations. These comments are noted and no revisions to the DEIR are necessary.

A7-2 The commenter recommends that the air quality analysis includes an evaluation of the combined emissions from overlapping construction and operation scenarios. Per this recommendation, as this combined scenario would be applicable to Phases 1 through 3, the discussion and emissions tables for these development phases under Impact 5.2-3 have been updated to account for this combined scenario as shown below with modeling data provided in Appendix B of this FEIR. All data used to show the combined scenario was provided in Section 5.2, *Air Quality*, of the DEIR (see Tables 5.2-12, 5.2-15, and 5.12-16 of the DEIR).

The combined scenario includes the following scenarios by phase: 1) Phase 1 operation + Phase 3 construction; 2) Phase 2 operation + Phase 4 construction; and 3) Phase 3 operation + Phase 4 construction.

The combined maximum daily operation-phase net emissions and construction emissions would not exceed the regional significance thresholds. Therefore impacts would remain less than significant and no mitigation is required.

Section 5.2, *Air Quality*, has been revised as follows:

---

Pages 5.2-25 through 5.2-28, Chapter 5.2, *Air Quality*, Section 5.2.3, *Environmental Impacts*. The following text and table are modified in response to Comment A7-5 from the South Coast Air Quality Management District.

---

**Impact Analysis:** At full buildout, the proposed project would develop approximately 670,000 building square feet of hospital, 250,000 building square feet of medical office, 371,000 building square feet of research and development, 75,000 building square feet of hospitality, and 30,000 building square feet of industrial space in addition to a 30,000-square-foot data center, two parking structures, and surface lots. Construction activities associated with the proposed project would produce combustion emissions from various sources, such as onsite heavy-duty construction vehicles, vehicles hauling materials to and from the site, and motor vehicles transporting the construction crew. Site preparation activities produce fugitive dust emissions (PM<sub>10</sub> and PM<sub>2.5</sub>) from soil-disturbing activities, such as grading and excavation. Air pollutant emissions from construction activities onsite would vary daily as construction activity levels change. Table 5.2-13, *Maximum Daily Regional Construction Emissions by Development Phase*, shows the construction emissions for

## 2. Response to Comments

the proposed project. The emissions shown account for reductions from project compliance with SCAQMD Rule 403 requirements. These requirements include watering disturbed exposed areas, limiting movement of onsite vehicles to 15 miles per hour on unpaved surfaces, and replacing ground cover quickly. Additionally, due to the total amount of area that would be disturbed (i.e., greater than 50 acres), the proposed project would also be subject to the “large operations” requirements of Rule 403. These additional requirements include implementing additional fugitive dust control measures, maintaining daily records documenting specific dust control actions taken, and contracting with a qualified dust control supervisor that has successfully completed the SCAQMD Fugitive Dust Control Class.

As shown in the table, project-related construction emissions would not exceed the SCAQMD regional construction significance thresholds. Therefore, construction-related regional air quality impacts would be less than significant.

**Table 5.2-13 Maximum Daily Regional Construction Emissions by Development Phase**

Construction Phase(s)	Criteria Air Pollutants (pounds per day) <sup>1, 2</sup>					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Phase 1 and Phase 2</b>						
<b>Year 2018</b>						
Phase 1 Demolition	4	43	24	<1	4	2
Phase 1 Site Preparation	5	49	24	<1	11	7
Phase 1 Grading	6	77	40	<1	7	4
Phase 1 Building Construction	7	56	57	<1	9	4
<b>Year 2019</b>						
Phase 1 Building Construction	7	52	53	<1	9	3
Phase 1 Building Construction and Architectural Coating Overlap	16	54	60	<1	10	4
<b>Year 2020</b>						
Phase 1 Building Construction and Architectural Coating Overlap	15	50	56	<1	10	4
<b>Year 2021</b>						
Phase 1 Building Construction and Architectural Coating Overlap	14	45	53	<1	10	3
Phase 1 Building Construction, Architectural Coating, and Phase 2 Demolition Overlap	18	81	76	<1	13	5
Phase 1 Architectural Coating, Paving, and Phase 2 Demolition Overlap	14	51	45	<1	6	3
Phase 1 Architectural Coating and Phase 2 Site Preparation Overlap	13	43	28	<1	11	7
Phase 1 Architectural Coating and Phase 2 Grading Overlap	13	55	40	<0	8	4
Phase 1 Architectural Coating and Phase 2 Building Construction Overlap	13	36	42	<1	7	3
<b>Year 2022</b>						
Phase 2 Building Construction	4	31	34	<1	6	2
Phase 2 Building Construction and Architectural Coating	8	33	39	<1	7	2

## 2. Response to Comments

Table 5.2-13 Maximum Daily Regional Construction Emissions by Development Phase

Construction Phase(s)	Criteria Air Pollutants (pounds per day) <sup>1, 2</sup>					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
Overlap						
<b>Year 2023</b>						
Phase 2 Building Construction and Architectural Coating Overlap	7	28	37	<1	6	2
<b>Year 2024</b>						
Phase 2 Building Construction and Architectural Coating Overlap	7	27	36	<1	6	2
<b>Year 2025</b>						
Phase 2 Building Construction and Architectural Coating Overlap	7	26	35	<1	6	2
Phase 2 Architectural Coating and Paving Overlap	5	10	19	<1	1	1
Maximum Daily Emissions	18	81	76	<1	13	7
SCAQMD Regional Construction Threshold	75	100	550	150	150	55
Significant?	No	No	No	No	No	No
<b>Phase 3</b>						
<b>Year 2026</b>						
Phase 3 Demolition	2	21	21	<1	2	1
Phase 3 Site Preparation	3	25	18	<1	9	5
Phase 3 Grading	3	28	27	<1	5	3
Phase 3 Building Construction	2	17	22	<1	3	1
<b>Year 2027</b>						
Phase 3 Building Construction	2	17	21	<1	3	1
Phase 3 Building Construction and Architectural Coating Overlap	6	19	24	<1	3	1
<b>Year 2028</b>						
Phase 3 Building Construction and Architectural Coating Overlap	6	19	24	<1	3	1
<b>Year 2029</b>						
Phase 3 Building Construction and Architectural Coating Overlap	6	19	23	<1	3	1
<b>Year 2030</b>						
Phase 3 Building Construction and Architectural Coating Overlap	6	14	23	<1	2	1
Phase 3 Architectural Coating and Paving Overlap	6	8	19	<1	1	<1
Maximum Daily Emissions	6	29	27	<1	9	5
SCAQMD Regional Construction Threshold	75	100	550	150	150	55
Significant?	No	No	No	No	No	No
<b>Phase 4</b>						
<b>Year 2031</b>						
Phase 4 Demolition	2	11	20	<1	2	1
Phase 4 Site Preparation	2	14	17	<1	8	5
Phase 4 Grading	3	14	24	<1	4	2

## 2. Response to Comments

**Table 5.2-13 Maximum Daily Regional Construction Emissions by Development Phase**

Construction Phase(s)	Criteria Air Pollutants (pounds per day) <sup>1, 2</sup>					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
Phase 4 Building Construction	2	11	19	<1	2	1
<b>Year 2032</b>						
Phase 4 Building Construction	2	11	19	<1	2	1
Phase 4 Building Construction and Architectural Coating Overlap	5	12	21	<1	2	1
<b>Year 2033</b>						
Phase 4 Building Construction and Architectural Coating Overlap	4	12	21	<1	2	1
<b>Year 2034</b>						
Phase 4 Building Construction and Architectural Coating Overlap	4	12	21	<1	2	1
<b>Year 2035</b>						
Phase 4 Building Construction and Architectural Coating Overlap	4	11	21	<1	2	1
Phase 4 Architectural Coating and Paving Overlap	4	6	18	<1	1	<1
Maximum Daily Emissions	5	14	24	<1	8	5
SCAQMD Regional Construction Threshold	75	100	550	150	150	55
Significant?	No	No	No	No	No	No

Source: CalEEMod Version 2016.3.1. Highest winter or summer emissions are reported.

<sup>1</sup> Based on information provided by the applicant. Where specific information regarding project-related construction activities was not available, construction assumptions were based on CalEEMod defaults.

<sup>2</sup> Includes implementation of fugitive dust control measures required by SCAQMD under Rule 403, including watering disturbed areas a minimum of two times per day, reducing speed limit to 15 miles per hour on unpaved surfaces, replacing ground cover quickly, and street sweeping with Rule 1186-compliant sweepers. The proposed project would also be subject to the large project requirements under Rule 403 such as implementing additional fugitive dust control measures, maintaining daily records documenting specific dust control actions taken, and contracting with a qualified dust control supervisor that has successfully completed the SCAQMD Fugitive Dust Control Class.

Pages 5.2-28 through 5.2-31, Chapter 5.2, *Air Quality*, Section 5.2.3, *Environmental Impacts*. The following text and tables are modified in response to Comment A7-2 from the South Coast Air Quality Management District.

### Phase 1

Phase 1 of the project would result in an overall net decrease of 920 average daily trips and 13,156 vehicle miles per day (see Appendix J1) compared to existing conditions. The results of the CalEEMod modeling are shown in Table 5.2-14, *Phase 1: Net Maximum Daily Operation-Phase Emissions*. The net change in emissions is based on the new emissions generated by the new facility buildings subtracted by the emissions associated with the existing buildings proposed to be demolished. Furthermore, the net change in emissions is also attributed to the net change in vehicle trips. As shown in the table, the net emissions generated from implementation of the proposed project would not exceed the SCAQMD regional operation-phase significance thresholds. In addition, the combined maximum daily operation-phase net emissions and Phase 2 construction emissions would also not exceed the regional significance thresholds.

## 2. Response to Comments

Table 5.2-14 Phase 1: Net Maximum Daily Operation-Phase Emissions

Phase	Operation-Related Regional Emissions (pounds/day)					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Existing (Year 2021)</b>						
Area	37	<1	2	<1	<1	<1
Energy	2	18	15	<1	1	1
Transportation	27	145	428	2	132	36
<b>Total</b>	<b>66</b>	<b>163</b>	<b>445</b>	<b>2</b>	<b>133</b>	<b>37</b>
<b>Project<sup>1</sup></b>						
Area	46	<1	1	<1	<1	<1
Energy	2	23	19	<1	2	2
Transportation <sup>2</sup>	25	134	396	1	122	33
<b>Total</b>	<b>74</b>	<b>157</b>	<b>416</b>	<b>2</b>	<b>124</b>	<b>35</b>
<b>Net Change (Project – Existing)</b>						
Net Change	8	(-6)	(-29)	(-1)	(-10)	(-3)
SCAQMD Regional Thresholds	55	55	550	150	150	55
Significant?	No	No	No	No	No	No
<b>Combined Phase 1 Operation &amp; Phase 2 Construction</b>						
Phase 1 Operation	8	(-6)	(-29)	(-1)	(-10)	(-3)
Phase 2 Construction <sup>3</sup>	8	34	39	<1	7	2
<b>Total</b>	<b>16</b>	<b>28</b>	<b>9</b>	<b>&lt;1</b>	<b>(-3)</b>	<b>(-1)</b>
SCAQMD Regional Thresholds	55	55	550	150	150	55
Significant?	No	No	No	No	No	No

Source: CalEEMod Version 2016.3.1. Based on highest winter or summer emissions using 2035 transportation emission rates. Totals may not equal 100 percent due to rounding. Excludes permitted sources of emissions that are covered under SCAQMD regulations.

<sup>1</sup> It is assumed that approximately 98,000 building square feet of the existing City of Hope structures would be demolished.

<sup>2</sup> Assumed vehicle fleet mix based on CalEEMod defaults and the annual average daily trips identified by Caltrans for the segment of I-210 west of I-605 (Caltrans 2016).

<sup>3</sup> Phase 2 construction activities would occur concurrently with Phase 1 operation starting with the Phase 2 Building Construction phase.

## Phase 2

Phase 2 of the project would generate a net increase of 641 average daily trips and 9,166 vehicle miles per day (see Appendix J1). The results of the CalEEMod modeling are shown in Table 5.2-15, *Phase 2: Net Maximum Daily Operation-Phase Emissions*. The net change in emissions is based on the new emissions generated by the new facility buildings and the additional vehicle trips associated with the additional visitors, patients, and employees subtracted by the emissions associated with the existing buildings proposed to be demolished. As shown in the table, the net emissions generated from implementation of the proposed project would not exceed the SCAQMD regional operation-phase significance thresholds. In addition, the combined maximum daily operation-phase net emissions and Phase 3 construction emissions would also not exceed the regional significance thresholds.

## 2. Response to Comments

**Table 5.2-15 Phase 2: Net Maximum Daily Operation-Phase Emissions**

Phase	Operation-Related Regional Emissions (pounds/day)					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Land Uses</b>						
<b>Existing (Year 2025)</b>						
Area	37	<1	2	<1	<1	<1
Energy	2	18	15	<1	1	1
Transportation	21	93	334	1	131	36
<b>Total</b>	<b>60</b>	<b>111</b>	<b>352</b>	<b>1</b>	<b>133</b>	<b>37</b>
<b>Project<sup>1</sup></b>						
Area	50	<1	1	<1	<1	<1
Energy <sup>2</sup>	3	26	22	<1	2	2
Transportation <sup>3</sup>	22	99	353	1	139	38
<b>Total</b>	<b>76</b>	<b>125</b>	<b>376</b>	<b>2</b>	<b>141</b>	<b>40</b>
<b>Net Change (Project – Existing)</b>						
<b>Net Change</b>	<b>16</b>	<b>14</b>	<b>25</b>	<b>&lt;1</b>	<b>8</b>	<b>2</b>
SCAQMD Regional Thresholds	55	55	550	150	150	55
<b>Significant?</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>
<b>Combined Phase 2 Operation &amp; Phase 3 Construction</b>						
<u>Phase 2 Operation</u>	<u>16</u>	<u>14</u>	<u>25</u>	<u>&lt;1</u>	<u>8</u>	<u>2</u>
<u>Phase 3 Construction</u>	<u>6</u>	<u>29</u>	<u>27</u>	<u>&lt;1</u>	<u>9</u>	<u>5</u>
<b>Total</b>	<b>22</b>	<b>42</b>	<b>52</b>	<b>&lt;1</b>	<b>17</b>	<b>8</b>
SCAQMD Regional Thresholds	55	55	550	150	150	55
<b>Significant?</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>
<b>New Potential Stationary Sources</b>						
<i>Central Utilities Plant – Boilers<sup>4</sup></i>	<i>1</i>	<i>1</i>	<i>13</i>	<i>&lt;1</i>	<i>1</i>	<i>1</i>

Source: CalEEMod Version 2016.3.1. Based on highest winter or summer emissions using 2035 transportation emission rates. Totals may not equal 100 percent due to rounding. Excludes permitted sources of emissions that are covered under SCAQMD regulations.

<sup>1</sup> It is assumed that approximately 107,000 building square feet of the existing City of Hope structures would be demolished.

<sup>2</sup> Per CalEEMod methodology, emissions associated with any additional boilers needed for additional heating for the new facilities are accounted in the Energy sector. Emissions in this sector represent emissions associated with building energy use.

<sup>3</sup> Assumed vehicle fleet mix based on CalEEMod defaults and the annual average daily trips identified by Caltrans for the segment of I-210 west of I-605 (Caltrans 2016).

<sup>4</sup> ~~Shown for informational purposes.~~ For purposes of this analysis, it is assumed a new boiler would be installed at the City of Hope central utilities plant in Phase 2 and Phase 4 for a total of two new boiler units, thus boiler emissions shown are not additive. Per CalEEMod methodology, the Energy sector emissions calculated for land uses encompasses emissions associated with boilers. In addition, installation of new or additional boilers and other stationary equipment such as an emergency generator would require a permit to operate from SCAQMD and would be subject to SCAQMD Regulation XIII, *New Source Review*, which would mitigate emissions through Best Available Control Technology (BACT).

### Phase 3

Phase 3 of the project would generate a net increase of 2,572 average daily trips and 36,779 vehicle miles per day (see Appendix J1). The results of the CalEEMod modeling are shown in Table 5.2-16, *Phase 3: Net Maximum Daily Operation-Phase Emissions*. The net change in emissions is based on the new emissions generated by the new facility buildings and the additional vehicle trips associated with the additional visitors, patients, and employees subtracted by the emissions associated with the existing buildings proposed to be demolished. As shown in the table, the net emissions generated from implementation of the proposed project would not exceed the SCAQMD regional operation-phase significance thresholds. In addition, the



## 2. Response to Comments

combined maximum daily operation-phase net emissions and Phase 4 construction emissions would also not exceed the regional significance thresholds.

Table 5.2-16 Phase 3: Net Maximum Daily Operation-Phase Emissions

Phase	Operation-Related Regional Emissions (pounds/day)					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Land Uses</b>						
<b>Existing (Year 2030)</b>						
Area	37	<1	2	<1	<1	<1
Energy	2	18	15	<1	1	1
Transportation	18	82	269	1	131	35
<b>Total</b>	<b>56</b>	<b>100</b>	<b>286</b>	<b>1</b>	<b>133</b>	<b>37</b>
<b>Project<sup>1</sup></b>						
Area	55	<1	1	<1	<1	<1
Energy <sup>2</sup>	3	28	24	<1	2	2
Transportation <sup>3</sup>	21	100	328	1	160	43
<b>Total</b>	<b>80</b>	<b>129</b>	<b>353</b>	<b>2</b>	<b>162</b>	<b>45</b>
<b>Net Change (Project – Existing)</b>						
Net Change	24	29	67	<1	29	8
SCAQMD Regional Thresholds	55	55	550	150	150	55
Significant?	No	No	No	No	No	No
<b>Combined Phase 3 Operation &amp; Phase 4 Construction</b>						
Phase 3 Operation	24	29	67	<1	29	8
Phase 4 Construction	5	14	24	<1	8	5
<b>Total</b>	<b>28</b>	<b>43</b>	<b>90</b>	<b>&lt;1</b>	<b>38</b>	<b>13</b>
SCAQMD Regional Thresholds	55	55	550	150	150	55
Significant?	No	No	No	No	No	No
<b>New Potential Stationary Sources</b>						
Central Utilities Plant – Boilers <sup>4</sup>	1	1	13	<1	1	1

Source: CalEEMod Version 2016.3.1. Based on highest winter or summer emissions using 2035 transportation emission rates. Totals may not equal 100 percent due to rounding. Excludes permitted sources of emissions that are covered under SCAQMD regulations.

<sup>1</sup> It is assumed that approximately 153,500 building square feet of the existing City of Hope structures would be demolished.

<sup>2</sup> Per CalEEMod methodology, emissions associated with any additional boilers needed for additional heating for the new facilities are accounted in the Energy sector. Emissions in this sector represent emissions associated with building energy use.

<sup>3</sup> Assumed vehicle fleet mix based on CalEEMod defaults and the annual average daily trips identified by Caltrans for the segment of I-210 west of I-605 (Caltrans 2016).

<sup>4</sup> ~~Shown for informational purposes.~~ For purposes of this analysis, it is assumed a new boiler would be installed at the City of Hope central utilities plant in Phase 2 and Phase 4 for a total of two new boiler units ~~thus boiler emissions shown are not additive~~. Per CalEEMod methodology, the Energy sector emissions calculated for land uses encompasses emissions associated with boilers. In addition, installation of new or additional boilers and other stationary equipment such as an emergency generator would require a permit to operate from SCAQMD and would be subject to SCAQMD Regulation XIII, *New Source Review*, which would mitigate emissions through Best Available Control Technology (BACT).

A7-3

The commenter provides additional recommendations to contribute in further minimizing construction-related emissions. These recommendations include requiring the use of construction equipment of 50 horsepower or more that are fitted with USEPA Tier 4-rated engines, or if construction equipment with Tier 4 engines cannot be utilized, to prepare future studies that support the use of other technologies/strategies. The commenter's recommendations are noted. As discussed

## 2. Response to Comments

under Impact 5.2-2 in Chapter 5.2, *Air Quality*, of the DEIR, construction-related emissions would not exceed the SCAQMD regional significance thresholds for construction. As discussed under Impact 5.2-4, project-related construction activities are shown to exceed the SCAQMD's screening-level construction localized significance thresholds (LST) for fine particulate matter (PM<sub>2.5</sub>). Additionally, as discussed under Impact 5.2-5, project-related construction activities are also shown to exceed the cancer risk threshold without mitigation. As discussed in Section 5.2.7, Mitigation Measures AQ-1 and AQ-2 were prescribed to reduce these potentially significant construction impacts. Mitigation Measure AQ-1 requires watering exposed surfaces at least three times per day to minimize fugitive dust emissions from ground-disturbing activities. Mitigation Measure AQ-2 requires the use of off-road construction equipment of 50 horsepower or more to be fitted with Level 3 Diesel Particulate Filters to minimize diesel particulate exhaust emissions. As discussed in Section 5.2.8, implementation of Mitigation Measures AQ-1 and AQ-2 would reduce construction-related LST and health risk impacts to below the significance threshold and reduce impacts to a less than significant. Per CEQA Guidelines Section 15126.4(a)(4)(B), prescribed mitigation "must be 'roughly proportional' to the impacts of the project. As discussed above, because the included Mitigation Measures AQ-1 and AQ-2 would suffice in reducing impacts to a less than significant level, additional measures to further reduce emissions are not required under CEQA regulations.

A7-4 The commenter recommends a performance standards-based technology review that would periodically assess equipment availability, equipment fleet mixtures, and best available control devices, which would foster and facilitate the deployment of the lowest emission technologies possible. Please see response above to Comment A7-3. All impacts related to air quality have been mitigated to less than significant levels with implementation of Mitigation Measures AQ-1 and AQ-2. No additional mitigation measures are necessary. Additionally as described on pages 5.2-24 and 5.2-25 of the DEIR, the proposed project would not result in long-term emission of criteria air pollutants that would exceed the SCAQMD's regional operation-phase significance thresholds; and the growth associated with the proposed project was assumed in the SCAG growth projections for the cities of Duarte and Irwindale. Therefore, implementation of the proposed project would be considered consistent with the AQMP and impacts would be less than significant. Additional mitigation measures related to performance standards-based technology review as suggested would not be required.

A7-5 The commenter noted that the proposed project would be subject to the "large operations" requirements of South Coast Air Quality Management Rule 403 and recommends including a discussion of the applicability of the rule to the proposed project. As recommended by the commenter, a discussion noting the applicability of the "large operations" requirements of Rule 403 has been included in the Impact 5.2-2

## 2. Response to Comments

discussion as shown in Response to Comment A7-2. Additionally, a footnote has also been added to Table 5.2-13, *Maximum Daily Regional Construction Emissions by Development Phase*, noting that the proposed project would be subject to the Rule 403 “large operations” requirements as also shown in Section 3.2 of this FEIR. Applicability of Rule 403 “large operations” requirements would not change the analysis or conclusions of the DEIR.

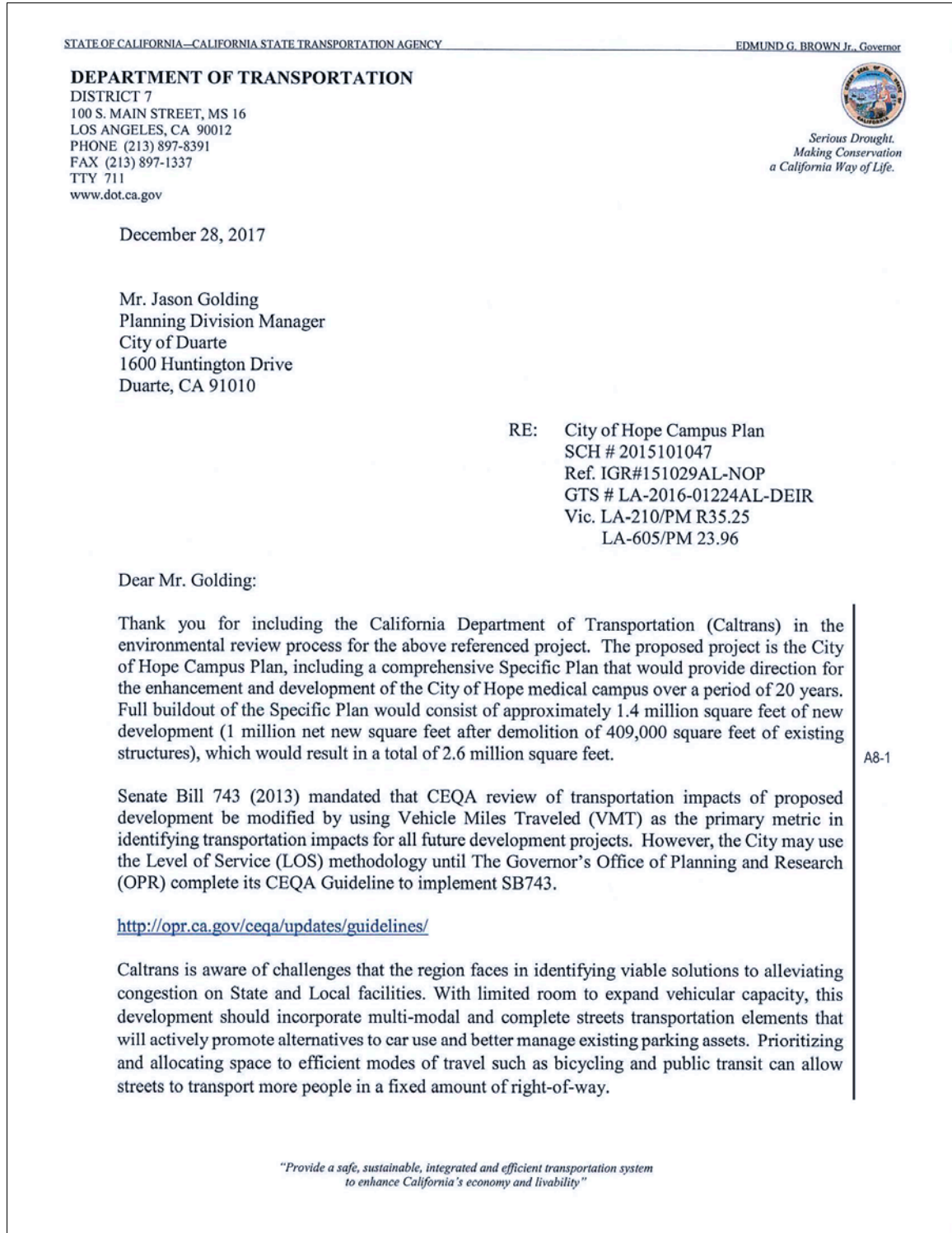
- A7-6 The City acknowledges the commenters request for electronic versions of the air quality modeling and HRA files, including original emission calculation spreadsheets and air dispersion modeling files. The City’s environmental consultant, PlaceWorks, provided SCAQMD the requested files on January 2, 2018 and offered additional time to submit further comments, if needed. On January 10, 2018 PlaceWorks followed up with SCAQMD to ensure that they had all the data files and to solicit any additional comments. On January 12, 2018 SCAQMD confirmed that they have no further comments on the DEIR. Correspondence supporting these statements are provided in Appendix B of this FEIR.

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

### LETTER A8 – Caltrans District 7 (3 pages)



## 2. Response to Comments

Mr. Jason Golding  
December 28, 2017  
Page 2 of 3

Caltrans supports the implementation of complete streets and pedestrian safety measures such as road diets and other traffic calming measures. Please note the Federal Highway Administration (FHWA) recognizes the road diet treatment as a proven safety countermeasure, and the cost of a road diet can be significantly reduced if implemented in tandem with routine street resurfacing.

A8-1  
Cont'd

After reviewing the environmental document based on LOS, we have the following comments:

1. The project claimed to generate 4,753 daily trips and 514/462 AM/PM peak hour trips. There are 13 related projects in the project vicinity generating 49,597 daily trips and 3,351/4,536 AM/PM peak hour trips. Many of the project and related trips would be traveling on the State facilities once the projects are built. Therefore, significant cumulative traffic impacts on the State facilities would occur. As a reminder, the decision makers should be aware of this issue and be prepared to mitigate significant cumulative traffic impacts.

A8-2

2. With additional traffic trips assigning to the State facilities, we have traffic conflict and speed differential concerns at these off-ramps.

A8-3

- a. Study location # 8, I-605 Northbound off-ramp to Live Oak Avenue
- b. Study location # 17, I-210 Westbound off-ramp to Central Avenue
- c. Study location # 9, I-605 Southbound off-ramp to Arrow Highway

Caltrans concurs the signal warrant analysis in Table 9 (page j-47) of Transportation Impact Study prepare in April 2017 for study location #8 and #17. From the Traffic Impact Study Report of United Rock Quarry No. 3 prepare on September 26, 2017, the study location #9 will have significant cumulative traffic impact. The report recommends to add an additional lane for the eastbound Arrow Highway, to modify the existing traffic signal to allow for the optimization of the traffic signal timing, and to interconnect existing traffic signals in the area. Caltrans is evaluating this proposal at this time. Feasible mitigation should be proposed with fair share contribution from the project. Further discussion with Caltrans is encouraged to mitigate those locations.

A8-4

3. With additional traffic trips, freeway segments I-210 west of I-605 and I-605 south of I-210 are overflowing according to Table 15, Existing Freeway Mainline Level of Service. A spillover of vehicles has the potential to create significant speed differentials and increase the number of conflicts. This may cause potential traffic conflict at the access points such as weaving, diverging, and merging areas within the project vicinity. As a reminder, CEQA does not exempt these type of operational concerns from evaluation. Potential traffic mitigation should be considered. Currently, Caltrans is preparing the I-605 Corridor Feasibility Study. If improvements are identified, the project should be prepared to pay a fair share contribution. We would like the City to work with Caltrans in identifying feasible mitigations or provide more effective Transportation Demand Management (TDM) for the cumulative traffic impact.

A8-5

*"Provide a safe, sustainable, integrated and efficient transportation system  
to enhance California's economy and livability"*



## 2. Response to Comments

Mr. Jason Golding  
December 28, 2017  
Page 3 of 3

4. Normally, potential improvements/mitigations may include restriping, striping with additional lane, signal upgrade, signal timing adjustment, right-of-way acquisition, reconstruct/add deceleration/acceleration lane (auxiliary lanes), interchange improvements, off-ramp expansion, freeway widening, install an overhead sign structure, cold plane and apply friction surface treatment, remove and replace pavement delineation, install pavement markers, upgrade ADA curb ramps, maintain traffic control system, remove and replace the raised island, install LED lighting system, overhead signs, fair share contribution to Caltrans planned projects and etc. to resolve any potential traffic conflict issues. Any feasible mitigation selection should also include Intersection Control Evaluation (ICE) when necessary. Any of these fore mentioned mitigation measure options should be considered for this project. A8-6

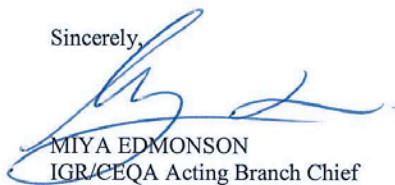
5. Once potential improvements are identified, we would like the City to consider to condition the developer to make a fair share contribution toward future improvements on the State facility; we would like the developer to sign a Traffic Mitigation Agreement with Caltrans prior to circulation of the FEIR. A8-7

6. Storm water run-off is a sensitive issue for Los Angeles and Ventura counties. Please be mindful that projects should be designed to discharge clean run-off water. Additionally, discharge of storm water run-off is not permitted onto State highway facilities without any storm water management plan. A8-8

7. Transportation of heavy construction equipment and/or materials, which requires the use of oversized-transport vehicles on State highways, will require a transportation permit from Caltrans. It is recommended that large size truck trips be limited to off-peak commute periods. A8-9

Caltrans will continue to work with the Lead Agency and/or traffic consultant closely in an effort to evaluate traffic impacts, identify potential improvements, and complete a Traffic Mitigation Agreement before the FEIR release. If you have any questions, please feel free to contact Alan Lin the project coordinator at (213) 897-8391 and refer to GTS # 07-LA-2017-01224AL-DEIR. A8-10

Sincerely,



MIYA EDMONSON  
IGR/CEQA Acting Branch Chief

cc: Scott Morgan, State Clearinghouse

*"Provide a safe, sustainable, integrated and efficient transportation system  
to enhance California's economy and livability"*

## 2. Response to Comments

*This page intentionally left blank.*



## 2. Response to Comments

### A8. Response to Comments from Caltrans District 7, dated December 28, 2017.

A8-1 The commenter recommends that the proposed project incorporate multi-modal and complete streets transportation elements. As listed under Impact 5.14-5 in the DEIR, the proposed project is consistent with policies designed to promote this type of transportation system, including goals, objectives, and policies identified in the General Plans of the cities of Duarte, Irwindale, and Monrovia. As discussed under Impact 5.14-5, buildout of the proposed Campus Plan would enhance pedestrian facilities by providing continuations of sidewalks, streetscape improvements, and installation of high visibility crosswalks along Duarte Road. The proposed Campus Plan also includes improvements to bicycle facilities and internal roadways, including shared lane treatments, bike parking facilities, connections to the Emerald Necklace Recreational Trail system to the east, and bike lane/sharrows along Duarte Road and Buena Vista Street. These sets of project design features (see PDF-2, PDF-3, and PDF-4 in Section 5.14 of the DEIR) are consistent with complete streets principles. No revisions to the DEIR are necessary.

The proposed project is within walking distance to the Metro Gold Line Foothill Extension Duarte/City of Hope Station northeast of the site. The line runs from downtown Los Angeles to Azusa. One of the goals of the Specific Plan is to encourage connectivity to and use of the Metro Gold Line and Duarte's public transit system. Also note that the proposed project's consistency with SB 743 was provided starting on page 5.14-49 of the DEIR for informational purposes.

A8-2 As discussed in Section 5.14.4 of the DEIR, cumulative traffic impacts were determined to be significant and unavoidable. Where feasible, mitigation measures related to cumulative trip generation are identified in the DEIR (see Section 5.14, *Transportation and Traffic*, in the DEIR). As shown in the DEIR, the proposed project would result in a significant impact two Caltrans ramp intersections: I-605 Northbound Off-Ramp & Live Oak Avenue and I-210 Westbound Off-Ramp & Central Avenue. Freeway ramp queues would extend beyond the 85 percent length of the ramp at I-210 Westbound Off-Ramp & Central Avenue in the AM peak hour in the future condition. In addition, the proposed project would have a significant impact at two freeway segment locations in the PM peak hour under existing plus project conditions: 1) westbound I-210 west of I-605 and 2) southbound I-605 south of I-210.

A8-3 The comment states that Caltrans has traffic conflict and speed differential concerns at I-605 Northbound Off-Ramp and Live Oak Avenue (Intersection 8), I-210 Westbound Off-Ramp and Central Avenue (Intersection 17), and I-605 Southbound Off-Ramp and Arrow Highway (Intersection 9). On September 6, 2016, the City of Duarte staff and their CEQA consulting team (PlaceWorks and Fehr & Peers), conducted an in-person meeting with Caltrans staff to determine the analysis methodologies to be used for Caltrans facilities. Following the direction given by Caltrans, two analyses were

## 2. Response to Comments

conducted and presented in the DEIR, which included off-ramp queuing analysis at five off-ramps on the I-210 and I-605 freeways and freeway mainline freeway segment analysis at ten mainline segments on I-210, I-605, and I-10 freeways.

### **Existing plus Project Analysis**

The off-ramp queuing analysis determined that Existing plus Project queues on the three off-ramps identified would not exceed 85 percent of the ramp length. Accordingly, under the Existing plus Project condition, no significant queuing impacts would occur at those off-ramp locations.

### **Future plus Project Analysis**

The off-ramp queuing analysis determined that queues for the I-605 Northbound Off-Ramp at Live Oak Avenue and the I-605 Southbound Off-Ramp at Arrow Highway would not exceed 85 percent of the ramp length. However, the off-ramp queuing analysis determined that for the I-210 Westbound Off-Ramp at Central Avenue would exceed 85 percent of the ramp length. The DEIR transportation analysis identified a significant traffic impact at the intersection of I-210 Westbound Off-Ramp and Central Avenue, which was subsequently mitigated by installing a traffic signal at the intersection. After mitigation, the I-210 Westbound Off-Ramp at Central Avenue queue would not exceed 85 percent of the ramp length.

- A8-4 The comment states that Caltrans concurs with the signal warrant analysis in Table 9 of the Transportation Impact Study (Appendix J1 of the DEIR) for I-605 Northbound Off-Ramp and Live Oak Avenue (Intersection 8) and I-210 Westbound Off-Ramp and Central Avenue (Intersection 17). The comment states that according to the Traffic Impact Study Report of United Rock Quarry No. 3, the I-605 Southbound Off-Ramp and Arrow Highway (Intersection 9) intersection will have a significant cumulative traffic impact. The comment identifies a proposed mitigation of adding an additional eastbound lane on Arrow Highway and states that feasible mitigation should be proposed with fair share contribution from the project.

The Traffic Impact Study Report for United Rock Quarry No. 3 in the City of Irwindale, California prepared on September 26, 2017 does not identify a new cumulative impact. There is not sufficient evidentiary support in the Traffic Impact Study Report for United Rock Quarry No. 3 that there would be a significant impact at the I-605 southbound off-ramp and Arrow Highway Intersection. Note that the United Rock Quarry traffic study applies different impact criteria and does not apply thresholds uniformly across the intersections. Furthermore, Table 14 of the traffic study shows that the intersection of the I-605 Southbound Off-Ramp and Arrow Highway under existing plus project plus related projects conditions would have no effect on the AM peak hour—there would be no change in level of service and no increase in the V/C ratio—and no impact to the PM peak hour..

## 2. Response to Comments

The City of Duarte is the lead agency for the DEIR. The lead agency has discretion to select its significance thresholds. The DEIR team and City of Duarte staff conducted an in-person meeting with Caltrans staff on September 6, 2016 to determine the analysis methodologies to be used for Caltrans facilities. The analysis methodologies and significance criteria utilized for the study locations of the transportation analysis is identified on pages 5.14-23 through 5.14-26 of the DEIR. It is important to note that the cumulative impact analysis included the United Rock Quarry No. 3 as a related project in addition to application of an annual growth rate (see Table 4-5 of the DEIR, Project No. 13). Based on the methodologies and criteria identified in the DEIR in consultation with Caltrans and substantial evidence, less than significant impact would occur at the intersection of I-605 Southbound Off-Ramp and Arrow Highway (under both Existing plus Project or Future plus Project conditions). Since no significant impact was identified, mitigation measures are not warranted and no fair share contribution is required.

- A8-5 The comment states that with additional traffic trips, freeway segments I-210 west of I-605 and I-605 south of I-210 are overflowing according to Table 15 of the Transportation Impact Study (Appendix J1 of the DEIR), and that a spillover of has the potential to create significant speed differentials and increase the number of conflicts at locations such as weaving, diverging, and merging areas within the project vicinity. The comment identifies that Caltrans is preparing the I-605 Corridor Feasibility Study and requests the project to make a fair share contribution to any identified improvements.

In accordance with Caltrans recommendations during the consultation process, two analyses were conducted and presented in the DEIR, which included off-ramp queuing analysis at five off-ramps on the I-210 and I-605 freeways and freeway mainline freeway segment analysis at ten mainline segments on I-210, I-605, and I-10 freeways.

The off-ramp queuing analysis determined that Existing plus Project queues for all of the off-ramps studied would not exceed 85 percent of the ramp length. The off-ramp queuing analysis determined that Future plus Project queue for the I-210 Westbound Off-Ramp at Central Avenue would exceed 85 percent of the ramp length prior to mitigation. After mitigation, the I-210 Westbound Off-Ramp at Central Avenue queue would not exceed 85 percent of the ramp length. Mitigation Measure TRAF-1 requiring signalization of the intersection of I-210 Westbound Off-Ramp and Central Avenue has been incorporated into the project. According to the signal warrant analysis in the Transportation Impact Study (Appendix J1 of the DEIR), the intersection meets the peak hour signal warrant criteria. Implementation of this mitigation measure would reduce impacts to less than significance.

The freeway mainline segment analysis determined that two freeway segments in Existing plus project condition would have a change in the measure of effectiveness due to the project. These locations were identified to be I-210 west of I-605 in the

## 2. Response to Comments

westbound direction during the PM peak hour and I-605 south of I-210 in the southbound direction during the PM peak hour. To mitigate the impacts at the identified locations, freeway mainline widening or other improvements could be required.

Caltrans has not identified feasible mitigation to reduce or eliminate impacts to freeway mainline segments and it is speculative at this time that any project could mitigate the impacts that have been identified. As noted in Section 5.14.8 of the DEIR, the type of infrastructure required to mitigate mainline impacts is extremely costly and is typically infeasible for one development project to undertake. For example, the cost to widen the I-5 from the Orange County line to I-605 is \$1.155 billion<sup>1</sup> and the cost of adding HOV lanes to the I-10 from Puente Avenue to SR-57 is \$365 million<sup>2</sup>. Due to the speculative nature of the necessary improvements required and the infeasibility of freeway widening, no additional mitigation measures are required.

The City cannot assure the construction of improvements to freeway facilities that may be needed to improve traffic flow. Furthermore, Caltrans does not have any funding mechanism in place to allow development projects to contribute a fair-share payment to future improvements and off-set traffic impacts caused by regional transportation. The facility is not controlled by the Cities, which could not guarantee implementation of the mitigation measures. Therefore, the identified impacts to the freeway system are considered significant and unavoidable.

The freeway mainline freeway segment analysis determined that no freeway segments in Future plus Project condition would have a change in the measure of effectiveness due to the project.

A8-6 The comment identifies a variety of mitigation measures such as restriping, signal timing adjustments, freeway widening, installing pavement markers, upgrading ADA curb ramps, overhead signs, and fair share payments to resolve any potential traffic conflict issues and states that any of the mitigation measures listed should be considered for this project.

Pages 5.14-53 through 5.14-55 of the DEIR identifies all feasible mitigation measures proposed for the project. These measures include the installation of traffic signals, fair share payment for intersection capacity improvements, and the development of a construction management plan. Page 5.14-55 of the DEIR identifies mitigation measures that were considered and rejected. These measures include changing lane configurations, restriping lane approaches, and installing overlapping signals. These

---

<sup>1</sup> Los Angeles County Metropolitan Transportation Authority (Metro), CMIA Supplemental Application Information, website accessed February 2018, [https://media.metro.net/projects\\_studies/cmia/images/K%20I-5%20South%20Web.pdf](https://media.metro.net/projects_studies/cmia/images/K%20I-5%20South%20Web.pdf)

<sup>2</sup> Los Angeles County Metropolitan Transportation Authority (Metro), CMIA Supplemental Application Information, website accessed February 2018, [https://media.metro.net/projects\\_studies/cmia/images/MI-10%20Web.pdf](https://media.metro.net/projects_studies/cmia/images/MI-10%20Web.pdf)

## 2. Response to Comments

physical measures were explored but determined to be infeasible due to physical constraints, safety concerns, and/or potential secondary impacts.

The payment of fees or fair share contributions are considered adequate mitigation only if the fee is associated with a definite commitment and reasonable plan to make the improvement. Furthermore, the lead agency is not required to impose mitigation fees that are not included in a mitigation program established by the agency with authority to make the improvements. Currently, there is no fee program in place that would mitigate impacts to the freeway mainlines effected by the project.




- A8-7 The comment requests that the City consider to condition the applicant to make a fair share contribution toward future improvements on the State facility and that the applicant sign a Traffic Mitigation Agreement with Caltrans prior to the circulation of the Final EIR. See response to Comments A8-5 and A8-6 regarding impacts, mitigations, and fair share payments for improvements to the state facilities. As discussed under Section 5.14.8 in the DEIR, Caltrans does not have any funding mechanism in place to allow development projects to contribute a fair-share payment to future improvements and offset traffic impacts caused by regional transportation. However, the comment is acknowledged and will be included in the Final EIR for review and consideration by the City's decision-making body.
- A8-8 No runoff to state facilities under Caltrans jurisdiction would occur. Stormwater runoff impacts of the proposed project are analyzed in Section 5.8, *Hydrology and Water Quality*, of the DEIR. As discussed under Impacts 5.8-1 and 5.8-3, runoff-related impacts would be less than significant. The commenter's remarks are acknowledged and no revisions to the DEIR are necessary.
- A8-9 The City acknowledges that a transportation permit for use of oversize construction vehicles on state highways may be required as future development is constructed. Please note that Mitigation Measure TRAF-3 has been incorporated into the project which requires deliveries and pick up of construction materials to be schedule during non-peak travel periods.
- A8-10 The City acknowledges Caltrans effort to continue to work with the City and traffic consultant on this project.

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

LETTER A9 – California Governor's Office of Planning and Research (6 pages)

 EDMUND G. BROWN JR. GOVERNOR	<p>STATE OF CALIFORNIA</p> <p><b>GOVERNOR'S OFFICE of PLANNING AND RESEARCH</b></p> <p>STATE CLEARINGHOUSE AND PLANNING UNIT</p>	 KEN ALEX DIRECTOR
<p>January 5, 2018</p>		<p><b>RECEIVED</b></p> <p><b>JAN 08 2018</b></p> <p>CITY OF DUARTE COMMUNITY DEVELOPMENT</p>
<p>Jason Golding City of Duarte 1600 Huntington Drive Duarte, CA 91010</p>		
<p>Subject: City of Hope Campus Plan SCH#: 2015101047</p>		
<p>Dear Jason Golding:</p>		
<p>The State Clearinghouse submitted the above named Draft EIR to selected state agencies for review. On the enclosed Document Details Report please note that the Clearinghouse has listed the state agencies that reviewed your document. The review period closed on January 4, 2018, and the comments from the responding agency (ies) is (are) enclosed. If this comment package is not in order, please notify the State Clearinghouse immediately. Please refer to the project's ten-digit State Clearinghouse number in future correspondence so that we may respond promptly.</p>		
<p>Please note that Section 21104(c) of the California Public Resources Code states that:</p>		
<p style="padding-left: 40px;">"A responsible or other public agency shall only make substantive comments regarding those activities involved in a project which are within an area of expertise of the agency or which are required to be carried out or approved by the agency. Those comments shall be supported by specific documentation."</p>		
<p>These comments are forwarded for use in preparing your final environmental document. Should you need more information or clarification of the enclosed comments, we recommend that you contact the commenting agency directly.</p>		
<p>This letter acknowledges that you have complied with the State Clearinghouse review requirements for draft environmental documents, pursuant to the California Environmental Quality Act. Please contact the State Clearinghouse at (916) 445-0613 if you have any questions regarding the environmental review process.</p>		
<p>Sincerely,</p>  Scott Morgan Director, State Clearinghouse		
<p>Enclosures cc: Resources Agency</p>		
<p style="text-align: center;">1400 10th Street P.O. Box 3044 Sacramento, California 95812-3044 (916) 445-0613 FAX (916) 323-3018 www.opr.ca.gov</p>		

## 2. Response to Comments

Document Details Report State Clearinghouse Data Base	
<b>SCH#</b>	2015101047
<b>Project Title</b>	City of Hope Campus Plan
<b>Lead Agency</b>	Duarte, City of
<b>Type</b>	EIR Draft EIR
<b>Description</b>	Note: Review Per Lead
	<p>The proposed project is the City of Hope Campus Plan, a comprehensive Specific Plan that would provide direction for the enhancement and development of the City of Hope medical campus over a period of 20 years, including the replacement of existing outdated and/or obsolete buildings with modern facilities. Full buildout of the Specific Plan would consist of approximately 1.4 million sf of gross new development (1 million net new sf after demolition of 409,000 sf of existing structures), which would result in a total of 2.6 million sf of developed floor area on the campus. Discretionary approvals required for approval of the proposed project include General Plan Amendments and zone changes in both the City of Duarte and the City of Irwindale.</p>
<b>Lead Agency Contact</b>	
<b>Name</b>	Jason Golding
<b>Agency</b>	City of Duarte
<b>Phone</b>	(626) 357-7931 x231
<b>email</b>	
<b>Address</b>	1600 Huntington Drive
<b>City</b>	Duarte
<b>State</b>	CA
<b>Zip</b>	91010
<b>Fax</b>	
<b>Project Location</b>	
<b>County</b>	Los Angeles
<b>City</b>	Duarte, Irwindale
<b>Region</b>	
<b>Lat / Long</b>	34° 7' 46" N / 117° 58' 21" W
<b>Cross Streets</b>	Duarte Road and Village Road
<b>Parcel No.</b>	Multiple
<b>Township</b>	1N
<b>Range</b>	10W
<b>Section</b>	31
<b>Base</b>	SBB&M
<b>Proximity to:</b>	
<b>Highways</b>	I-210, 605
<b>Airports</b>	No
<b>Railways</b>	La Metro (Gold Line)
<b>Waterways</b>	Santa Fe Flood Control Basin, San Gabriel River
<b>Schools</b>	Beardslee ES, Duarte HS
<b>Land Use</b>	Multiple
<b>Project Issues</b>	Air Quality; Archaeologic-Historic; Biological Resources; Drainage/Absorption; Economics/Jobs; Flood Plain/Flooding; Forest Land/Fire Hazard; Geologic/Seismic; Noise; Population/Housing Balance; Public Services; Recreation/Parks; Schools/Universities; Sewer Capacity; Soil Erosion/Compaction/Grading; Solid Waste; Toxic/Hazardous; Traffic/Circulation; Vegetation; Water Quality; Water Supply; Wetland/Riparian; Growth Inducing; Landuse; Cumulative Effects; Other Issues; Aesthetic/Visual
<b>Reviewing Agencies</b>	Resources Agency; Department of Fish and Wildlife, Region 5; Native American Heritage Commission; Cal Fire; Department of Parks and Recreation; Caltrans, District 7; Office of Emergency Services, California; Regional Water Quality Control Board, Region 4; Resources, Recycling and Recovery; Air Resources Board; Public Utilities Commission; State Lands Commission; San Gabriel & Lower Los Angeles Rivers & Mountains Conservancy; Statewide Health Planning
Note: Blanks in data fields result from insufficient information provided by lead agency.	


A9-1  
Cont'd



2. Response to Comments

Document Details Report State Clearinghouse Data Base					
<b>Date Received</b>	11/15/2017	<b>Start of Review</b>	11/15/2017	<b>End of Review</b>	01/04/2018
				A9-1 Cont'd	
Note: Blanks in data fields result from insufficient information provided by lead agency.					

## 2. Response to Comments

<small>STATE OF CALIFORNIA—CALIFORNIA STATE TRANSPORTATION AGENCY</small>		<i>CLEAR</i>	<small>EDMUND G. BROWN Jr., Governor</small>
<b>DEPARTMENT OF TRANSPORTATION</b>		<i>1-4-18</i>	 <i>Serious Drought Making Conservation a California Way of Life</i>
DISTRICT 7		<i>E</i>	
100 S. MAIN STREET, MS 16 LOS ANGELES, CA 90012 PHONE (213) 897-8391 FAX (213) 897-1337 TTY 711 <a href="http://www.dot.ca.gov">www.dot.ca.gov</a>			
		<b>Governor's Office of Planning &amp; Research</b>	
December 28, 2017		<b>DEC 28 2017</b>	
		<b>STATE CLEARINGHOUSE</b>	
Mr. Jason Golding Planning Division Manager City of Duarte 1600 Huntington Drive Duarte, CA 91010		RE: City of Hope Campus Plan SCH # 2015101047 Ref. IGR#151029AL-NOP GTS # LA-2016-01224AL-DEIR Vic. LA-210/PM R35.25 LA-605/PM 23.96	A9-1 Cont'd
Dear Mr. Golding:			
<p>Thank you for including the California Department of Transportation (Caltrans) in the environmental review process for the above referenced project. The proposed project is the City of Hope Campus Plan, including a comprehensive Specific Plan that would provide direction for the enhancement and development of the City of Hope medical campus over a period of 20 years. Full buildout of the Specific Plan would consist of approximately 1.4 million square feet of new development (1 million net new square feet after demolition of 409,000 square feet of existing structures), which would result in a total of 2.6 million square feet.</p>			
<p>Senate Bill 743 (2013) mandated that CEQA review of transportation impacts of proposed development be modified by using Vehicle Miles Traveled (VMT) as the primary metric in identifying transportation impacts for all future development projects. However, the City may use the Level of Service (LOS) methodology until The Governor's Office of Planning and Research (OPR) complete its CEQA Guideline to implement SB743.</p>			
<p><a href="http://opr.ca.gov/ceqa/updates/guidelines/">http://opr.ca.gov/ceqa/updates/guidelines/</a></p>			
<p>Caltrans is aware of challenges that the region faces in identifying viable solutions to alleviating congestion on State and Local facilities. With limited room to expand vehicular capacity, this development should incorporate multi-modal and complete streets transportation elements that will actively promote alternatives to car use and better manage existing parking assets. Prioritizing and allocating space to efficient modes of travel such as bicycling and public transit can allow streets to transport more people in a fixed amount of right-of-way.</p>			
<p><i>"Provide a safe, sustainable, integrated and efficient transportation system to enhance California's economy and livability"</i></p>			

## 2. Response to Comments

Mr. Jason Golding  
December 28, 2017  
Page 2 of 3

Caltrans supports the implementation of complete streets and pedestrian safety measures such as road diets and other traffic calming measures. Please note the Federal Highway Administration (FHWA) recognizes the road diet treatment as a proven safety countermeasure, and the cost of a road diet can be significantly reduced if implemented in tandem with routine street resurfacing.

After reviewing the environmental document based on LOS, we have the following comments:

1. The project claimed to generate 4,753 daily trips and 514/462 AM/PM peak hour trips. There are 13 related projects in the project vicinity generating 49,597 daily trips and 3,351/4,536 AM/PM peak hour trips. Many of the project and related trips would be traveling on the State facilities once the projects are built. Therefore, significant cumulative traffic impacts on the State facilities would occur. As a reminder, the decision makers should be aware of this issue and be prepared to mitigate significant cumulative traffic impacts.
2. With additional traffic trips assigning to the State facilities, we have traffic conflict and speed differential concerns at these off-ramps.
  - a. Study location # 8, I-605 Northbound off-ramp to Live Oak Avenue
  - b. Study location # 17, I-210 Westbound off-ramp to Central Avenue
  - c. Study location # 9, I-605 Southbound off-ramp to Arrow Highway

A9-1  
Cont'd

Caltrans concurs the signal warrant analysis in Table 9 (page j-47) of Transportation Impact Study prepare in April 2017 for study location #8 and #17. From the Traffic Impact Study Report of United Rock Quarry No. 3 prepare on September 26, 2017, the study location #9 will have significant cumulative traffic impact. The report recommends to add an additional lane for the eastbound Arrow Highway, to modify the existing traffic signal to allow for the optimization of the traffic signal timing, and to interconnect existing traffic signals in the area. Caltrans is evaluating this proposal at this time. Feasible mitigation should be proposed with fair share contribution from the project. Further discussion with Caltrans is encouraged to mitigate those locations.

3. With additional traffic trips, freeway segments I-210 west of I-605 and I-605 south of I-210 are overflowing according to Table 15, Existing Freeway Mainline Level of Service. A spillover of vehicles has the potential to create significant speed differentials and increase the number of conflicts. This may cause potential traffic conflict at the access points such as weaving, diverging, and merging areas within the project vicinity. As a reminder, CEQA does not exempt these type of operational concerns from evaluation. Potential traffic mitigation should be considered. Currently, Caltrans is preparing the I-605 Corridor Feasibility Study. If improvements are identified, the project should be prepared to pay a fair share contribution. We would like the City to work with Caltrans in identifying feasible mitigations or provide more effective Transportation Demand Management (TDM) for the cumulative traffic impact.

*"Provide a safe, sustainable, integrated and efficient transportation system  
to enhance California's economy and livability"*

## 2. Response to Comments

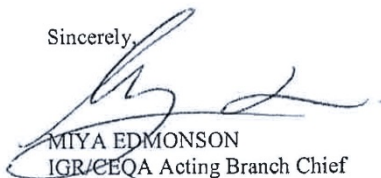
Mr. Jason Golding  
December 28, 2017  
Page 3 of 3

4. Normally, potential improvements/mitigations may include restriping, striping with additional lane, signal upgrade, signal timing adjustment, right-of-way acquisition, reconstruct/add deceleration/acceleration lane (auxiliary lanes), interchange improvements, off-ramp expansion, freeway widening, install an overhead sign structure, cold plane and apply friction surface treatment, remove and replace pavement delineation, install pavement markers, upgrade ADA curb ramps, maintain traffic control system, remove and replace the raised island, install LED lighting system, overhead signs, fair share contribution to Caltrans planned projects and etc. to resolve any potential traffic conflict issues. Any feasible mitigation selection should also include Intersection Control Evaluation (ICE) when necessary. Any of these fore mentioned mitigation measure options should be considered for this project.
5. Once potential improvements are identified, we would like the City to consider to condition the developer to make a fair share contribution toward future improvements on the State facility; we would like the developer to sign a Traffic Mitigation Agreement with Caltrans prior to circulation of the FEIR.
6. Storm water run-off is a sensitive issue for Los Angeles and Ventura counties. Please be mindful that projects should be designed to discharge clean run-off water. Additionally, discharge of storm water run-off is not permitted onto State highway facilities without any storm water management plan.
7. Transportation of heavy construction equipment and/or materials, which requires the use of oversized-transport vehicles on State highways, will require a transportation permit from Caltrans. It is recommended that large size truck trips be limited to off-peak commute periods.

A9-1  
Cont'd

Caltrans will continue to work with the Lead Agency and/or traffic consultant closely in an effort to evaluate traffic impacts, identify potential improvements, and complete a Traffic Mitigation Agreement before the FEIR release. If you have any questions, please feel free to contact Alan Lin the project coordinator at (213) 897-8391 and refer to GTS # 07-LA-2017-01224AL-DEIR.

Sincerely,



MIYA EDMONSON  
IGR/CEQA Acting Branch Chief

cc: Scott Morgan, State Clearinghouse

*"Provide a safe, sustainable, integrated and efficient transportation system  
to enhance California's economy and livability"*

## 2. Response to Comments

**A9. Response to Comments from California Office of Planning and Research, dated January 5, 2018.**

A9-1 The letter submitted by the California Office of Planning and Research consists of forwarded correspondence from Caltrans District 7. See responses to Comments A8-1 through A8-10 under Letter A8.

## 2. Response to Comments

*This page intentionally left blank.*



**COMMENT CARD**  
**December 6, 2017 at 6:30 PM – City of Hope Specific Plan & EIR Community Meeting**

Please let us know your comments on the City of Hope Campus Plan EIR (please print):

ENCLOSURE 3 FIGURE S-2 BORROSQUE PARK ALSO LABELED AS  
 MOORE PARK

R1-1

Name: STAC HERNANDEZ

Address: 2327 PARK ROSE AVE DUARTE CA 91010

Please return this comment card to Jason Golding, Planning Division Manager, City of Duarte, at the end of the Community Meeting or fold in half, staple, and mail it to the City of Duarte using the address provided (see reverse).

## 2. Response to Comments

*This page intentionally left blank.*



## 2. Response to Comments

### **R1. Response to Comments from Steve Hernandez, dated December 6, 2017.**

- R1-1 The commenter is correct that the basemap that underlies Figure 3-2 is incorrectly labeled. The exhibit has been revised to indicate that the park at the intersection of Buena Vista Street and Galen Street is Beardslee Park as shown in Section 3.2 of this FEIR.

## 2. Response to Comments

*This page intentionally left blank.*

## 2. Response to Comments

LETTER PC1 – Planning Commission Hearing on January 16, 2018 (2 pages)

**CEQA RELATED COMMENTS FROM COMMISSIONER FARRA**  
**Planning Commission Hearing**  
**January 16, 2018**

- |   |       |
|---|-------|
| <p>1. Staff did state that the scoping process included the general neighborhood. There is no indication in the documents that scoping included property owners. It is a good idea that we provide proof of service. The document does not include a list of persons the scoping letter was sent to for the meeting. Do you think that further notification and proof of notification, not only to residents but also property owners, can be included in the documents?</p>  | PC1-1 |
| <p>2. Pg. 43 (of the COHSP) discusses adding two (2) traffic signals at the intersection of Highland and Duarte. I did not see the intersection on the map that showed the intersections on which studies were done. Does Staff think that two (2) traffic signals on Duarte and two (2) on Highland (a total of four at that intersection) will hinder traffic and is not a good idea?</p>   | PC1-2 |
| <p>3. Water, sewer, natural gas, electricity and the capacity to handle additional load from City of Hope Specific Plan (COHSP). For water demands, future Duarte Station Specific Plan (DSSP) developments are included, but future capacity needs for Town Center Specific Plan (TCSP) are not included. Should TCSP needs be included? Seems COHSP may be reserving water capacity ahead of TCSP developments, which may preclude development capacity within the TCSP. Comment also applies to sewer, gas and all other utilities.</p>  | PC1-3 |
| <p>4. Sewer – COHSP discusses capacity over existing use (p. 87-88). P. 88 right column addresses 701,277 gpd (future) v. 412,152 gpd (existing). Concern is future TCSP development are not accounted for in COHSP.</p>  | PC1-4 |
| <p>5. Stormwater retention (p.93). Don't you believe that a project of this size should be able to retain 100% of its stormwater on-site? Fig. 31 - the retention basins look miniscule compared to available open space on-site. Don't you think they should be able to retain more, if not all, stormwater on-site, even if not required to by law? He is going to share his personal experiences and get our opinion on it. His workplace is a 10-acre site, of which four acres were recently developed. Stormwater for four acres mostly had to be retained onsite through a retention basin and vertical wells. The geology of his workplace has similar geology – river/sand material - to that of City of Hope. On the four acres, the water (rainwater) drains to a retention basin and disappears immediately, the basin never contains water. On the other six acres, water is channeled by surface drains adjacent to (but not into) the basin. We are ashamed when it rains because the drains are carrying water (appx. 50 CFS), and the basin next to it is empty. He offered a site visit. There are ways that are better than horizontal wells (using perforated pipe) BMPs, which would be more efficient, like vertical wells, they would substantially increase percolation because of the waterhead in the well.</p> | PC1-5 |

## 2. Response to Comments

He suggests vertical wells, instead of horizontal wells, and larger detention basins. At his work, they also constructed bioswales (with French drains) – rainwater would disappear in two hours. He thinks a lot more can be done in regard to stormwater retention. What's your feedback on what was said?	PC1-5 Cont.
6. Lozeau-Drury letter and their request for more sustainability, without saying which areas of CEQA are deficient. What is their connection to sustainability? Agree that they (COH) is doing more than the minimum (in respect to stormwater). Farra agrees with letter in that not all feasible mitigation measures are being implemented. Unlike the letter I don't blame the EIR, especially since both LA County and State agencies (CA DFW, Water Quality Board, San Gabriel River Conservancy) were scoped but did not provide an answer. Since these agencies were scoped, I am ok. Its not a CEQA defect that COH is not using all feasible mitigation measures. Farra thinks this (incorporating all feasible mitigation measures) is something that should be added to the Plan.	PC1-6
7. Alquist-Priolo Zone (p. 5.5-1) – States geotechnical report (appendix) says that site is not in an Alquist-Priolo zone. CEQA document (DEIR) doesn't not make that statement; says all laws must be followed; and it does not state that it meets the requirements of the Alquist-Priolo Act.	PC1-7
8. Soils & Geology Report (p. 5.5.2) – States local municipality requires soils and geology report for all development. The geotechnical report in the appendix was not a geotechnical report, it was instead a desktop study of available public docs and four (4) reports from prior consultants. Is the intent to provide a geotechnical report with each proposed specific development (e.g. building), or is it intended that the geotechnical report, in the appendix to the DEIR, cover all proposed development?	PC1-8
9. Scoping – States he is used to NEPA and its scoping efforts; did not see that in CEQA; is that not required?	PC1-9
10. Comments received and included in staff report. Are they included in DEIR? Will they be in FEIR?	PC1-10
11. FEIR – What is the sequence of processing/approval of the EIR document. Will Planning Commission have another look at EIR?	PC1-11
12. Scenery Management. As was explained in the plan, (building) height goes from 75' (existing H Zone) to 140' (proposed COHSP). Within this subject there is something called KOP (key observation point) – points where you're looking at a project and evaluating the scenery. KOP for this project is 605 North – it's the first thing you see. Building articulation is mentioned on p. 64 & 66. Propose collective articulation for entire campus, as presented to drivers on 605 northbound. Also, to prevent glare from windows at heights. Colors are also discussed - recommends that colors should match the mountains behind Duarte. Are those issues the City would consider?	PC1-12

## 2. Response to Comments

### **PC1. Response to Comments from Planning Commissioner Farra, dated January 16, 2018.**

PC1-1 CEQA noticing requirements related to preparation of the DEIR and the scoping process (per Section 15082 of the CEQA Guidelines) were satisfied by release of a Notice of Preparation (NOP) on October 15, 2015. The NOP was posted at the Los Angeles County Clerk's office on October 16, 2015 and published in the Pasadena Star-News on October 15, 2015. Copies of the Initial Study and NOP were made available for public review at Duarte City Hall, the Duarte Library, the Duarte Public Safety Office, and the City's website at [www.accessduarte.com](http://www.accessduarte.com). Electronic copies of the NOP and Initial Study were sent certified mail to responsible agencies and surrounding jurisdictions. The NOP contained notice of the public scoping meeting held on October 19, 2015, at the Duarte Community Center, 1600 Huntington Drive. This meeting was in addition to the two community meetings and other outreach activities conducted as part of the outreach process for the Specific Plan. The meeting was conducted pursuant to Section 15083 of the CEQA Guidelines and included a presentation of the proposed Specific Plan, the EIR process, and the topics to be analyzed in the EIR. Following the presentation, interested agencies, organization, and members of the public were encouraged to offer their views concerning what environmental issues should be included in the EIR.

Pursuant to Section 15126.2 of the CEQA Guidelines, comments received on the NOP and at the scoping meeting were used to identify potentially significant adverse impacts in the DEIR. This process is summarized in Section 2.3 of the DEIR.

Further public input opportunities include the 45-day public review period for the DEIR from November 15, 2017 to January 4, 2018, and a community meeting held on December 6, 2017 at the Duarte Community Center. The Notice of Availability (NOA) for the DEIR was sent to responsibility agencies, surrounding jurisdictions, interested persons and organizations, sent to the State Clearinghouse in Sacramento for distribution to public agencies, posted at the City of Duarte, and published in the Pasadena Star-News on November 15, 2017. The NOA was posted at the Los Angeles County Clerk's office on November 15, 2017. Copies of the DEIR were made available for public review at Duarte City Hall, the Duarte Library, the Duarte Public Safety Office, and the City's website at [www.accessduarte.com](http://www.accessduarte.com). The community meeting included a presentation on the proposed project, the CEQA process, and a summary of analysis and environmental impacts disclosed in the DEIR.

PC1-2 There are no traffic signals proposed at Highland Avenue and Duarte Road. Highland Avenue at Duarte Road was not evaluated as a study intersection because it is technically not considered an intersection. This location is a free turn movement in both directions.

## 2. Response to Comments

Two signals were proposed on Duarte Road, one at Village Road and one at Circle Road. These proposed signals would be timed to ensure that they do not hinder the flow of traffic.

- PC1-3 Project and cumulative impacts related to water, sewer, natural gas, and electricity are addressed in Section 5.16, Utilities and Service Systems, of the DEIR. The assumptions and approach for determining cumulative impacts are detailed in Section 4.4 of the DEIR. The Town Center Specific Plan was included as a related project in the DEIR (see related project #6, Table 4-5 of the DEIR), therefore its development was accounted for in assessing cumulative impacts for all utilities—water, wastewater, natural gas, and electricity. The DEIR determined that there would not be a significant cumulative impact related to utilities or service systems.

A water supply assessment (WSA) in accordance with California Water Code Section 10910 (Senate Bill 610) was prepared for the City of Hope Specific Plan by Water Systems Consulting, Inc. The WSA was approved by California American Water (CAW) on October 4, 2017 and documents that CAW has sufficient water supplies to meet the demands of the project in addition to planned and future uses, which includes the Town Center Specific Plan. The WSA guarantees that water supply is available during average, single dry, and multiple dry water years during a 20-year projection.

- PC1-4 Please refer to Section 5.16.1.4 of the DEIR for an analysis of cumulative impacts to wastewater treatment and collection. Cumulative growth is based on growth projections in County Sanitation Districts of Los Angeles County District 22 service area. The proposed project and cumulative growth, including General Plan buildout, would be adequately conveyed and treated by the wastewater treatment provider—County Sanitation Districts of Los Angeles County. See also Response to Comment PC1-3, the Town Center Specific Plan was included as a related project in the DEIR. The DEIR concluded that there would not be a significant impact because there is adequate infrastructure and capacity at the wastewater treatment facility to accommodate cumulative projects, including Town Center Specific Plan buildout.

- PC1-5 CEQA requires an analysis of the proposed project's environmental impacts compared to baseline (existing) conditions. With respect to hydrology and water quality impacts, the analysis is based on changes in impervious surfaces across the project site resulting from future Campus Plan improvements. Because this is a redevelopment project and only 50 percent of the developed site will be altered, only the proposed alterations must meet the LID requirements. However, the project goes above and beyond these standard requirements and through the use of LID best management practices, the project would result in a net reduction in the amount of stormwater runoff and pollutants currently entering the storm drain system from the campus under existing conditions.

## 2. Response to Comments

Although the project would increase the amount of impervious surface on the campus by approximately 5 percent, the implementation of stormwater treatment measures, including infiltration, more than makes up for the increased impermeability. Consistent with Los Angeles County methodology, 10-year and 50-year storm events were used as a metric for calculating runoff. Under existing conditions, a 50-year storm event is calculated to generate 221 cubic feet per second (cfs) of total runoff for the entire campus. Using this as a baseline, the project, without implementation of stormwater treatment/infiltration measures, would increase total runoff by 1.76 percent (3.89 cfs). However, with the implementation of proposed LID measures, the project would decrease total runoff for the entire campus by 5.03 percent (11.11 cfs) compared to existing conditions.

Please refer to Section 5.8, *Hydrology and Water Quality*, of the DEIR, for a detailed analysis related to storm water. As determined in the DEIR the project would have a less than significant impact on hydrology and water quality. The DEIR analysis is based on a Low Impact Development Study and Hydrology Report prepared by KPFF for the proposed project (see Appendix H1 and H2). These reports were peer reviewed by PlaceWorks' in-house engineer to ensure that the methodologies were consistent with the 2006 Los Angeles County Hydrology Manual and to verify the accuracy of the parameters and calculations used to determine stormwater runoff flow and water quality treatment facilities sizing. As discussed in the DEIR starting on page 5.8-24, the proposed project would be constructed and operated in accordance with the Los Angeles County MS4 Permit requirements and guidance provided in the Los Angeles County Department of Public Works Low Impact Development Standards Manual. The project is required to retain the 85th percentile, 24-hour rainfall event through infiltration, biofiltration/bioretenion, and/or rainfall harvest and use.

The primary treatment system would be the installation of a proprietary subsurface perforated corrugated metal pipe CMP stormwater infiltration system at the southwest corner of the project site, just east of the LACFCD channel. Stormwater would be collected from drainage areas DA1 and DA2 and treated with a proprietary hydrodynamic separator that screens, separates, and traps trash, debris, sediment, and hydrocarbons prior to entry into the infiltration system. Drainage areas DA3 and DA4 would be treated with modified bioswales, which would serve as pretreatment systems, and smaller individual infiltration systems. The water quality features would target pollutants of concern in stormwater. A summary of the volume, flow rates, and sizing requirements for the stormwater treatment systems is provided in Table 5.8-5 of the DEIR. Refer also to Figure 5.8-5 of the DEIR for an illustration of the proposed storm drain system.

- PC1-6 The City is unaware of Lozeau-Drury's connection to sustainability or their intent in submitting a comment letter on the DEIR. The commenter is makes a distinction between mitigation measures required under CEQA versus measure that go beyond the

## 2. Response to Comments

requirements of CEQA. The commenter thinks that additional measures should be added to the plan. While the commenter is requested additional measures, it must be clarified that the proposed project incorporates all feasible mitigation measures required under CEQA to reduce significant environmental impacts. This conclusion is supported by substantial evidence in the DEIR and FEIR.

- PC1-7 As stated on pages 5.5-11 and 5.5-12 of the DEIR, an Initial Study was prepared and included in Appendix A of the DEIR which substantiates that no active faults pass through or abut the project site. Accordingly, no portion of the project site is located within an Alquist Priolo zone.
- PC1-8 PlaceWorks hired LGC Geotechnical to review past geotechnical reports prepared for the project site to project recommendations regarding site feasibility and geotechnical issues that may need to be addressed during future site development (see Appendix F of the DEIR). Development on the project site was determined to be feasible from a geotechnical standpoint. Pursuant to the California Building Code, as future site specific development is proposed, the project applicant is required to conduct a site specific geotechnical evaluation and comply with the grading and design recommendations.
- PC1-9 The scoping process for the proposed project is discussed in Section 2.3 in the DEIR. This process included the preparation of an Initial Study and a public scoping meeting held on October 19, 2015.
- PC1-10 Comments included in the staff report were comments received from the public and agencies on the DEIR. This FEIR includes all comments on the DEIR, responses, and any changes made to the DEIR. The FEIR will be included in the staff report provided to the Duarte City Council, all persons who commented on the FEIR, and the City of Irwindale.
- PC1-11 The proposed project and DEIR were discussed at the City of Duarte Planning Commission hearing held on January 16, 2018. At the conclusion of their review, the Planning Commission recommended that City Council certify the EIR and approve the proposed project. Pursuant to Planning and Zoning Law and the Duarte Development Code, the EIR will not come back to Planning Commission for review.
- PC1-12 The commenter is asking whether the City considered building height, views, glare, and building articulation and colors in the Specific Plan. The Specific Plan includes development standards and design guidelines to address the physical development of future buildings on the project site. For example, proposed Specific Plan's development standards and design guidelines are designed to develop an "established identity and sense of place" (see Goal 2 in Chapter 2, Vision & Goals, of the proposed Specific Plan). They are intended to develop a "cohesive and contemporary design character for the campus" and create an enhanced campus entrance. Standards and guidelines in the Specific Plan address a number of aesthetic considerations, including:



## 2. Response to Comments

- Building orientation, height, and setbacks
- Open space and landscaping
- Buffering and screening of utilities and service areas
- Architectural character and building form
- Building colors and materials
- Fences and walls
- Lighting
- Wayfinding
- Public art

Implementation of these provisions would ensure that buildout of the proposed Campus Plan would create a unified character on the campus and buildings that are more architecturally compatible than under existing conditions. Design guidelines in the Specific Plan would supersede existing City of Duarte and City of Irwindale design guidelines in effect on the site. In particular, the proposed Specific Plan's focus on compatibility between buildings and on developing a system of meaningful, connected public spaces would result in beneficial aesthetic impacts on the project site. Design guidelines in the proposed Specific Plan also reduce light and glare spillover from the project site to surrounding land uses by buffering new development with landscaping and trees. Replacement of older buildings with newer buildings adhering to Specific Plan lighting guidelines, and surface parking with screened parking structures, would also reduce the amount of spill light potentially impacting surrounding land uses.

Additionally, aesthetics, light and glare were fully analyzed in Section 5.1, *Aesthetics*, of the DEIR. The long-term operation of the proposed project would have a less than significant impact related to aesthetics.

## 2. Response to Comments

*This page intentionally left blank.*

## 3. Revisions to the Draft EIR

---

### 3.1 INTRODUCTION

This section contains revisions to the DEIR based upon (1) additional or revised information required to prepare a response to a specific comment; (2) applicable updated information that was not available at the time of DEIR publication; and/or (3) typographical errors. This section also includes additional mitigation measures to fully respond to commenter concerns as well as provide additional clarification to mitigation requirements included in the DEIR. The provision of these additional mitigation measures does not alter any impact significance conclusions as disclosed in the DEIR. Changes made to the DEIR are identified here in ~~strikeout text~~ to indicate deletions and in underlined text to signify additions.

### 3.2 DEIR REVISIONS IN RESPONSE TO WRITTEN COMMENTS

The following text has been revised in response to comments received on the DEIR.

---

Figure 3-2, Chapter 3, *Project Description*, has been modified in response to Comment R1-1 from Steve Hernandez. The figure now correctly labels Beardslee Park.

---

See revised Figure 3-2, *Local Vicinity*.

---

Table 4-5, Chapter 4, *Environmental Setting*, has been modified in response to Comment A1-4 from the City of Irwindale. The table provides further clarification of the buildout statistics associated with Project No. 8. In addition, the jurisdiction for Project No. 13 was corrected.

---

**Table 4-5 Summary of Related Projects**

No.	Project Location	Jurisdiction	Buildout Statistics	Daily Trips
1	Northeast Corner - Huntington Drive & Buena Vista Street	Duarte	<ul style="list-style-type: none"><li>• 1.80 KSF drive-thru coffee shop</li><li>• 2.60 KSF retail</li></ul>	1,584
2	Metro Gold Line Duarte Station Parking Facility Project	Duarte	<ul style="list-style-type: none"><li>• Transit parking</li></ul>	893
3	Southeast Corner - Huntington Drive & Buena Vista Street	Duarte	<ul style="list-style-type: none"><li>• 19.93 KSF supermarket</li></ul>	2,038
4	800 Block of Buena Vista Street	Duarte	<ul style="list-style-type: none"><li>• 191-bed assisted living facility</li></ul>	411
5	Northwest Corner - Highland Avenue & Duarte Road	Duarte	<ul style="list-style-type: none"><li>• 475 DU apartment</li><li>• 400 KSF office</li><li>• 250-room hotel</li><li>• 12 KSF retail</li></ul>	7,259
6	1200 Block Huntington Drive	Duarte	<ul style="list-style-type: none"><li>• 800 DU residential</li><li>• 703 KSF commercial</li></ul>	

### 3. Revisions to the Draft EIR

**Table 4-5 Summary of Related Projects**

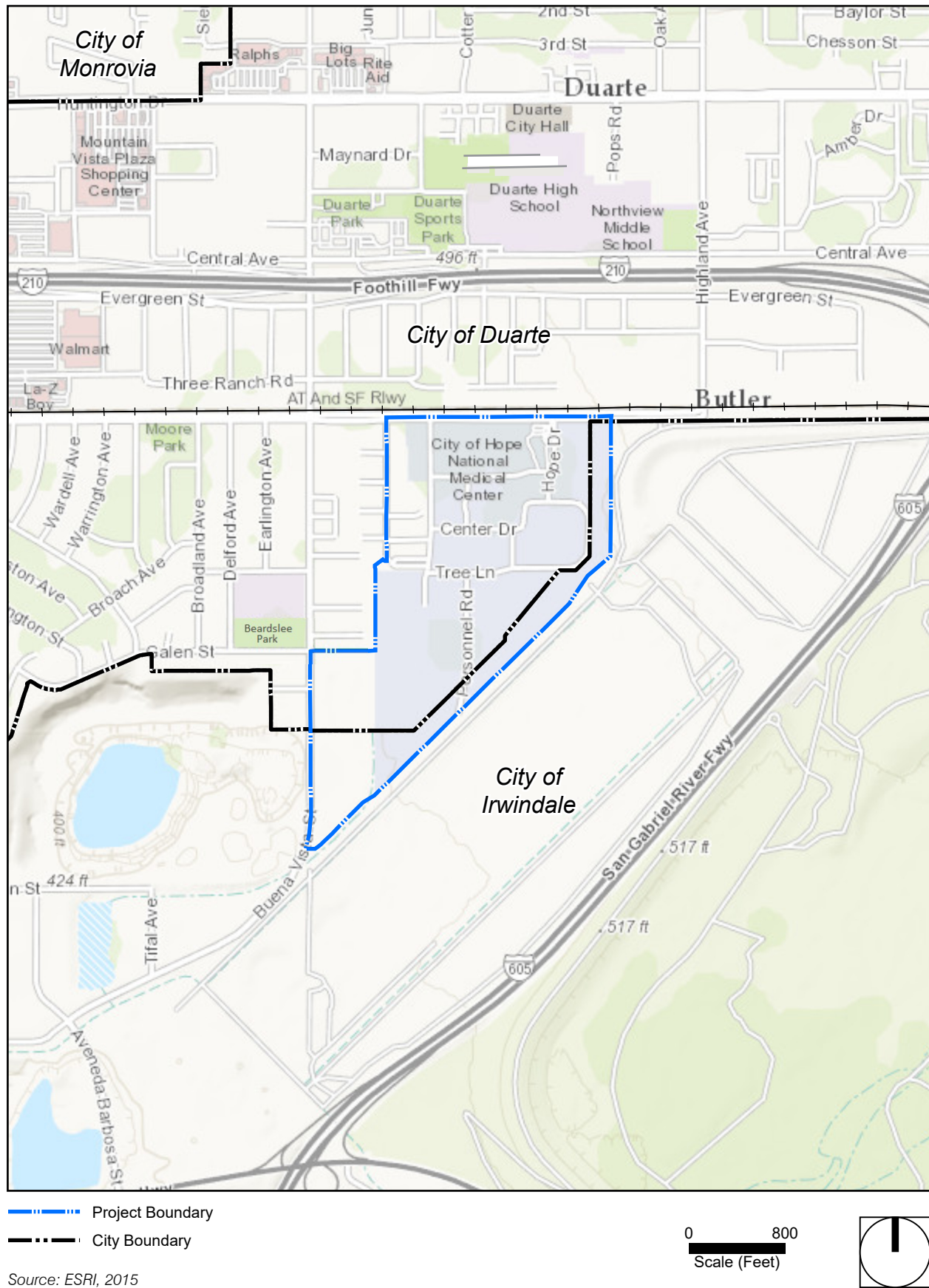
No.	Project Location	Jurisdiction	Buildout Statistics	Daily Trips
			<ul style="list-style-type: none"> <li>450-room lodging</li> </ul>	3,150
7	1634 Third Street & 1101 Oak Avenue	Duarte	<ul style="list-style-type: none"> <li>18 DU townhouse</li> <li>Park</li> </ul>	106
8	2200 Arrow Hwy	Irwindale	<ul style="list-style-type: none"> <li>265,228 KSF Material Recovery Facility/Transfer Station/Convenience Store with Fueling Station General light industrial</li> </ul>	8,333
9	Arrow Hwy & Live Oak Lane	Irwindale	<ul style="list-style-type: none"> <li>17-acre athletic club</li> </ul>	710
10	Live Oak Lane	Irwindale	<ul style="list-style-type: none"> <li>29 KSF retail</li> </ul>	1,202
11	500 Speedway Drive	Irwindale	<ul style="list-style-type: none"> <li>700 KSF Factory Outlet Center</li> </ul>	17,788
12	Station Square Transit Village	Monrovia	<ul style="list-style-type: none"> <li>23 KSF retail</li> <li>450 KSF office</li> <li>700 DU residential</li> </ul>	4,513
13	Miguel Miranda Avenue & Meridian Street (LACo. Flood Quarry #3 project)	Irwindale Azusa	n/a	1,610

Source: Fehr & Peers 2017; Table 6, Appendix J1 of this DEIR.  
Notes: DU = dwelling unit; KSF = thousand square feet; n/a = not applicable

Pages 5.2-25 through 5.2-28, Chapter 5.2, *Air Quality*, Section 5.2.3, *Environmental Impacts*. The following text and table are modified in response to Comment A7-5 from the South Coast Air Quality Management District.

**Impact Analysis:** At full buildout, the proposed project would develop approximately 670,000 building square feet of hospital, 250,000 building square feet of medical office, 371,000 building square feet of research and development, 75,000 building square feet of hospitality, and 30,000 building square feet of industrial space in addition to a 30,000-square-foot data center, two parking structures, and surface lots. Construction activities associated with the proposed project would produce combustion emissions from various sources, such as onsite heavy-duty construction vehicles, vehicles hauling materials to and from the site, and motor vehicles transporting the construction crew. Site preparation activities produce fugitive dust emissions (PM<sub>10</sub> and PM<sub>2.5</sub>) from soil-disturbing activities, such as grading and excavation. Air pollutant emissions from construction activities onsite would vary daily as construction activity levels change. Table 5.2-13, *Maximum Daily Regional Construction Emissions by Development Phase*, shows the construction emissions for the proposed project. The emissions shown account for reductions from project compliance with SCAQMD Rule 403 requirements. These requirements include watering disturbed exposed areas, limiting movement of onsite vehicles to 15 miles per hour on unpaved surfaces, and replacing ground cover quickly. Additionally, due to the total amount of area that would be disturbed (i.e., greater than 50 acres), the proposed project would also be subject to the “large operations” requirements of Rule 403. These additional requirements include implementing additional fugitive dust control measures, maintaining daily records documenting specific dust control actions taken, and contracting with a qualified dust control supervisor that has successfully completed the SCAQMD Fugitive Dust Control Class.

Figure 3-2 - Local Vicinity  
3. Project Description



### 3. Revisions to the Draft EIR

*This page intentionally left blank.*

## 3. Revisions to the Draft EIR

As shown in the table, project-related construction emissions would not exceed the SCAQMD regional construction significance thresholds. Therefore, construction-related regional air quality impacts would be less than significant.

Table 5.2-13 Maximum Daily Regional Construction Emissions by Development Phase

Construction Phase(s)	Criteria Air Pollutants (pounds per day) <sup>1,2</sup>					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Phase 1 and Phase 2</b>						
<b>Year 2018</b>						
Phase 1 Demolition	4	43	24	<1	4	2
Phase 1 Site Preparation	5	49	24	<1	11	7
Phase 1 Grading	6	77	40	<1	7	4
Phase 1 Building Construction	7	56	57	<1	9	4
<b>Year 2019</b>						
Phase 1 Building Construction	7	52	53	<1	9	3
Phase 1 Building Construction and Architectural Coating Overlap	16	54	60	<1	10	4
<b>Year 2020</b>						
Phase 1 Building Construction and Architectural Coating Overlap	15	50	56	<1	10	4
<b>Year 2021</b>						
Phase 1 Building Construction and Architectural Coating Overlap	14	45	53	<1	10	3
Phase 1 Building Construction, Architectural Coating, and Phase 2 Demolition Overlap	18	81	76	<1	13	5
Phase 1 Architectural Coating, Paving, and Phase 2 Demolition Overlap	14	51	45	<1	6	3
Phase 1 Architectural Coating and Phase 2 Site Preparation Overlap	13	43	28	<1	11	7
Phase 1 Architectural Coating and Phase 2 Grading Overlap	13	55	40	<0	8	4
Phase 1 Architectural Coating and Phase 2 Building Construction Overlap	13	36	42	<1	7	3
<b>Year 2022</b>						
Phase 2 Building Construction	4	31	34	<1	6	2
Phase 2 Building Construction and Architectural Coating Overlap	8	33	39	<1	7	2
<b>Year 2023</b>						
Phase 2 Building Construction and Architectural Coating Overlap	7	28	37	<1	6	2
<b>Year 2024</b>						
Phase 2 Building Construction and Architectural Coating Overlap	7	27	36	<1	6	2
<b>Year 2025</b>						
Phase 2 Building Construction and Architectural Coating Overlap	7	26	35	<1	6	2

### 3. Revisions to the Draft EIR

**Table 5.2-13 Maximum Daily Regional Construction Emissions by Development Phase**

Construction Phase(s)	Criteria Air Pollutants (pounds per day) <sup>1, 2</sup>					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
Phase 2 Architectural Coating and Paving Overlap	5	10	19	<1	1	1
Maximum Daily Emissions	18	81	76	<1	13	7
SCAQMD Regional Construction Threshold	75	100	550	150	150	55
Significant?	No	No	No	No	No	No
<b>Phase 3</b>						
<b>Year 2026</b>						
Phase 3 Demolition	2	21	21	<1	2	1
Phase 3 Site Preparation	3	25	18	<1	9	5
Phase 3 Grading	3	28	27	<1	5	3
Phase 3 Building Construction	2	17	22	<1	3	1
<b>Year 2027</b>						
Phase 3 Building Construction	2	17	21	<1	3	1
Phase 3 Building Construction and Architectural Coating Overlap	6	19	24	<1	3	1
<b>Year 2028</b>						
Phase 3 Building Construction and Architectural Coating Overlap	6	19	24	<1	3	1
<b>Year 2029</b>						
Phase 3 Building Construction and Architectural Coating Overlap	6	19	23	<1	3	1
<b>Year 2030</b>						
Phase 3 Building Construction and Architectural Coating Overlap	6	14	23	<1	2	1
Phase 3 Architectural Coating and Paving Overlap	6	8	19	<1	1	<1
Maximum Daily Emissions	6	29	27	<1	9	5
SCAQMD Regional Construction Threshold	75	100	550	150	150	55
Significant?	No	No	No	No	No	No
<b>Phase 4</b>						
<b>Year 2031</b>						
Phase 4 Demolition	2	11	20	<1	2	1
Phase 4 Site Preparation	2	14	17	<1	8	5
Phase 4 Grading	3	14	24	<1	4	2
Phase 4 Building Construction	2	11	19	<1	2	1
<b>Year 2032</b>						
Phase 4 Building Construction	2	11	19	<1	2	1
Phase 4 Building Construction and Architectural Coating Overlap	5	12	21	<1	2	1
<b>Year 2033</b>						
Phase 4 Building Construction and Architectural Coating Overlap	4	12	21	<1	2	1
<b>Year 2034</b>						
Phase 4 Building Construction and Architectural Coating	4	12	21	<1	2	1



## 3. Revisions to the Draft EIR

Table 5.2-13 Maximum Daily Regional Construction Emissions by Development Phase

Construction Phase(s)	Criteria Air Pollutants (pounds per day) <sup>1, 2</sup>					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
Overlap						
Year 2035						
Phase 4 Building Construction and Architectural Coating Overlap	4	11	21	<1	2	1
Phase 4 Architectural Coating and Paving Overlap	4	6	18	<1	1	<1
Maximum Daily Emissions	5	14	24	<1	8	5
SCAQMD Regional Construction Threshold	75	100	550	150	150	55
Significant?	No	No	No	No	No	No

Source: CalEEMod Version 2016.3.1. Highest winter or summer emissions are reported.

<sup>1</sup> Based on information provided by the applicant. Where specific information regarding project-related construction activities was not available, construction assumptions were based on CalEEMod defaults.

<sup>2</sup> Includes implementation of fugitive dust control measures required by SCAQMD under Rule 403, including watering disturbed areas a minimum of two times per day, reducing speed limit to 15 miles per hour on unpaved surfaces, replacing ground cover quickly, and street sweeping with Rule 1186-compliant sweepers. The proposed project would also be subject to the large project requirements under Rule 403 such as implementing additional fugitive dust control measures, maintaining daily records documenting specific dust control actions taken, and contracting with a qualified dust control supervisor that has successfully completed the SCAQMD Fugitive Dust Control Class.

Pages 5.2-28 through 5.2-31, Chapter 5.2, *Air Quality*, Section 5.2.3, *Environmental Impacts*. The following text and tables are modified in response to Comment A7-2 from the South Coast Air Quality Management District.

### Phase 1

Phase 1 of the project would result in an overall net decrease of 920 average daily trips and 13,156 vehicle miles per day (see Appendix J1) compared to existing conditions. The results of the CalEEMod modeling are shown in Table 5.2-14, *Phase 1: Net Maximum Daily Operation-Phase Emissions*. The net change in emissions is based on the new emissions generated by the new facility buildings subtracted by the emissions associated with the existing buildings proposed to be demolished. Furthermore, the net change in emissions is also attributed to the net change in vehicle trips. As shown in the table, the net emissions generated from implementation of the proposed project would not exceed the SCAQMD regional operation-phase significance thresholds. In addition, the combined maximum daily operation-phase net emissions and Phase 2 construction emissions would also not exceed the regional significance thresholds.

### 3. Revisions to the Draft EIR

**Table 5.2-14 Phase 1: Net Maximum Daily Operation-Phase Emissions**

Phase	Operation-Related Regional Emissions (pounds/day)					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Existing (Year 2021)</b>						
Area	37	<1	2	<1	<1	<1
Energy	2	18	15	<1	1	1
Transportation	27	145	428	2	132	36
<b>Total</b>	<b>66</b>	<b>163</b>	<b>445</b>	<b>2</b>	<b>133</b>	<b>37</b>
<b>Project<sup>1</sup></b>						
Area	46	<1	1	<1	<1	<1
Energy	2	23	19	<1	2	2
Transportation <sup>2</sup>	25	134	396	1	122	33
<b>Total</b>	<b>74</b>	<b>157</b>	<b>416</b>	<b>2</b>	<b>124</b>	<b>35</b>
<b>Net Change (Project – Existing)</b>						
Net Change	8	(-6)	(-29)	(-1)	(-10)	(-3)
SCAQMD Regional Thresholds	55	55	550	150	150	55
Significant?	No	No	No	No	No	No
<b>Combined Phase 1 Operation &amp; Phase 2 Construction</b>						
Phase 1 Operation	8	(-6)	(-29)	(-1)	(-10)	(-3)
Phase 2 Construction <sup>3</sup>	8	34	39	<1	7	2
<b>Total</b>	<b>16</b>	<b>28</b>	<b>9</b>	<b>&lt;1</b>	<b>(-3)</b>	<b>(-1)</b>
SCAQMD Regional Thresholds	55	55	550	150	150	55
Significant?	No	No	No	No	No	No

Source: CalEEMod Version 2016.3.1. Based on highest winter or summer emissions using 2035 transportation emission rates. Totals may not equal 100 percent due to rounding. Excludes permitted sources of emissions that are covered under SCAQMD regulations.

<sup>1</sup> It is assumed that approximately 98,000 building square feet of the existing City of Hope structures would be demolished.

<sup>2</sup> Assumed vehicle fleet mix based on CalEEMod defaults and the annual average daily trips identified by Caltrans for the segment of I-210 west of I-605 (Caltrans 2016).

<sup>3</sup> Phase 2 construction activities would occur concurrently with Phase 1 operation starting with the Phase 2 Building Construction phase.

#### Phase 2

Phase 2 of the project would generate a net increase of 641 average daily trips and 9,166 vehicle miles per day (see Appendix J1). The results of the CalEEMod modeling are shown in Table 5.2-15, *Phase 2: Net Maximum Daily Operation-Phase Emissions*. The net change in emissions is based on the new emissions generated by the new facility buildings and the additional vehicle trips associated with the additional visitors, patients, and employees subtracted by the emissions associated with the existing buildings proposed to be demolished. As shown in the table, the net emissions generated from implementation of the proposed project would not exceed the SCAQMD regional operation-phase significance thresholds. In addition, the combined maximum daily operation-phase net emissions and Phase 3 construction emissions would also not exceed the regional significance thresholds.

## 3. Revisions to the Draft EIR

Table 5.2-15 Phase 2: Net Maximum Daily Operation-Phase Emissions

Phase	Operation-Related Regional Emissions (pounds/day)					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Land Uses</b>						
<b>Existing (Year 2025)</b>						
Area	37	<1	2	<1	<1	<1
Energy	2	18	15	<1	1	1
Transportation	21	93	334	1	131	36
<b>Total</b>	<b>60</b>	<b>111</b>	<b>352</b>	<b>1</b>	<b>133</b>	<b>37</b>
<b>Project<sup>1</sup></b>						
Area	50	<1	1	<1	<1	<1
Energy <sup>2</sup>	3	26	22	<1	2	2
Transportation <sup>3</sup>	22	99	353	1	139	38
<b>Total</b>	<b>76</b>	<b>125</b>	<b>376</b>	<b>2</b>	<b>141</b>	<b>40</b>
<b>Net Change (Project – Existing)</b>						
<b>Net Change</b>	<b>16</b>	<b>14</b>	<b>25</b>	<b>&lt;1</b>	<b>8</b>	<b>2</b>
SCAQMD Regional Thresholds	55	55	550	150	150	55
<b>Significant?</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>
<b>Combined Phase 2 Operation &amp; Phase 3 Construction</b>						
<u>Phase 2 Operation</u>	<u>16</u>	<u>14</u>	<u>25</u>	<u>&lt;1</u>	<u>8</u>	<u>2</u>
<u>Phase 3 Construction</u>	<u>6</u>	<u>29</u>	<u>27</u>	<u>&lt;1</u>	<u>9</u>	<u>5</u>
<b>Total</b>	<b>22</b>	<b>42</b>	<b>52</b>	<b>&lt;1</b>	<b>17</b>	<b>8</b>
SCAQMD Regional Thresholds	55	55	550	150	150	55
<b>Significant?</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>
<b>New Potential Stationary Sources</b>						
<i>Central Utilities Plant – Boilers<sup>4</sup></i>	<i>1</i>	<i>1</i>	<i>13</i>	<i>&lt;1</i>	<i>1</i>	<i>1</i>

Source: CalEEMod Version 2016.3.1. Based on highest winter or summer emissions using 2035 transportation emission rates. Totals may not equal 100 percent due to rounding. Excludes permitted sources of emissions that are covered under SCAQMD regulations.

<sup>1</sup> It is assumed that approximately 107,000 building square feet of the existing City of Hope structures would be demolished.

<sup>2</sup> Per CalEEMod methodology, emissions associated with any additional boilers needed for additional heating for the new facilities are accounted in the Energy sector. Emissions in this sector represent emissions associated with building energy use.

<sup>3</sup> Assumed vehicle fleet mix based on CalEEMod defaults and the annual average daily trips identified by Caltrans for the segment of I-210 west of I-605 (Caltrans 2016).

<sup>4</sup> ~~Shown for informational purposes.~~ For purposes of this analysis, it is assumed a new boiler would be installed at the City of Hope central utilities plant in Phase 2 and Phase 4 for a total of two new boiler units. Per CalEEMod methodology, the Energy sector emissions calculated for land uses encompasses emissions associated with boilers, thus boiler emissions shown are not additive. In addition, installation of new or additional boilers and other stationary equipment such as an emergency generator would require a permit to operate from SCAQMD and would be subject to SCAQMD Regulation XIII, *New Source Review*, which would mitigate emissions through Best Available Control Technology (BACT).

## Phase 3

Phase 3 of the project would generate a net increase of 2,572 average daily trips and 36,779 vehicle miles per day (see Appendix J1). The results of the CalEEMod modeling are shown in Table 5.2-16, *Phase 3: Net Maximum Daily Operation-Phase Emissions*. The net change in emissions is based on the new emissions generated by the new facility buildings and the additional vehicle trips associated with the additional visitors, patients, and employees subtracted by the emissions associated with the existing buildings proposed to be demolished. As shown in the table, the net emissions generated from implementation of the proposed project would not exceed the SCAQMD regional operation-phase significance thresholds. In addition, the

### 3. Revisions to the Draft EIR

combined maximum daily operation-phase net emissions and Phase 4 construction emissions would also not exceed the regional significance thresholds.

**Table 5.2-16 Phase 3: Net Maximum Daily Operation-Phase Emissions**

Phase	Operation-Related Regional Emissions (pounds/day)					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Land Uses</b>						
<b>Existing (Year 2030)</b>						
Area	37	<1	2	<1	<1	<1
Energy	2	18	15	<1	1	1
Transportation	18	82	269	1	131	35
<b>Total</b>	<b>56</b>	<b>100</b>	<b>286</b>	<b>1</b>	<b>133</b>	<b>37</b>
<b>Project<sup>1</sup></b>						
Area	55	<1	1	<1	<1	<1
Energy <sup>2</sup>	3	28	24	<1	2	2
Transportation <sup>3</sup>	21	100	328	1	160	43
<b>Total</b>	<b>80</b>	<b>129</b>	<b>353</b>	<b>2</b>	<b>162</b>	<b>45</b>
<b>Net Change (Project – Existing)</b>						
Net Change	24	29	67	<1	29	8
SCAQMD Regional Thresholds	55	55	550	150	150	55
Significant?	No	No	No	No	No	No
<b>Combined Phase 3 Operation &amp; Phase 4 Construction</b>						
Phase 3 Operation	24	29	67	<1	29	8
Phase 4 Construction	5	14	24	<1	8	5
<b>Total</b>	<b>28</b>	<b>43</b>	<b>90</b>	<b>&lt;1</b>	<b>38</b>	<b>13</b>
SCAQMD Regional Thresholds	55	55	550	150	150	55
Significant?	No	No	No	No	No	No
<b>New Potential Stationary Sources</b>						
<i>Central Utilities Plant – Boilers<sup>4</sup></i>	1	1	13	<1	1	1

Source: CalEEMod Version 2016.3.1. Based on highest winter or summer emissions using 2035 transportation emission rates. Totals may not equal 100 percent due to rounding. Excludes permitted sources of emissions that are covered under SCAQMD regulations.

<sup>1</sup> It is assumed that approximately 153,500 building square feet of the existing City of Hope structures would be demolished.

<sup>2</sup> Per CalEEMod methodology, emissions associated with any additional boilers needed for additional heating for the new facilities are accounted in the Energy sector. Emissions in this sector represent emissions associated with building energy use.

<sup>3</sup> Assumed vehicle fleet mix based on CalEEMod defaults and the annual average daily trips identified by Caltrans for the segment of I-210 west of I-605 (Caltrans 2016).

<sup>4</sup> ~~Shown for informational purposes.~~ For purposes of this analysis, it is assumed a new boiler would be installed at the City of Hope central utilities plant in Phase 2 and Phase 4 for a total of two new boiler units ~~thus boiler emissions shown are not additive~~. Per CalEEMod methodology, the Energy sector emissions calculated for land uses encompasses emissions associated with boilers. In addition, installation of new or additional boilers and other stationary equipment such as an emergency generator would require a permit to operate from SCAQMD and would be subject to SCAQMD Regulation XIII, *New Source Review*, which would mitigate emissions through Best Available Control Technology (BACT).

Page 5.6-33, Section 5.6, *Greenhouse Gas Emissions*, has been modified in response to Comment A1-9 from City of Irwindale Community Development Department.

As shown in Table 5.6-9 in the DEIR, no inconsistency between the proposed project and the City of Irwindale Energy Action Plan was identified. Accordingly, the indicated sentence has been modified as follows to be more clear:

### 3. Revisions to the Draft EIR

#### *City of Irwindale Energy Action Plan*

Portions of the project site within the City of Irwindale would be subject to Irwindale's EAP. Table 5.6-9, Consistency with the City of Irwindale Energy Action Plan, evaluates the proposed project's consistency with the goals and policies in the City's EAP. Implementation of the City of Hope Campus Plan would replace some of the existing facility buildings with newer, more energy-efficient buildings that would comply with the current and future Building Energy Efficiency Standards. Additionally, the Specific Plan design guidelines include measures that encourage and promote incorporation and inclusion of design features that would contribute to increasing energy efficiency, reducing energy demand, and conserving water. Therefore, overall, the proposed project would generally ~~not be inconsistent~~ with the City of Irwindale's EAP.

Table 5.12-1 on Page 5.12-2, Section 5.12, *Public Services*, has been modified in response to Comment A2-1 from County of Los Angeles Fire Department.

**Table 5.12-1 Fire Stations**

Station Address Distance from Project Site	Apparatus	Daily Staffing
Station 44 (1105 Highland Avenue, Duarte) 1.2 miles from the City of Hope campus	<del>1 engine company, 1 assessment engine</del> <del>company 2 fire engines, one 1 patrol</del> vehicle	7
Station 48 (15546 Arrow Highway, Irwindale) 4.2 miles from the City of Hope campus	1 fire engine	4
Station 169 (5112 Peck Road, El Monte) 4.0 miles from the City of Hope Campus	1 fire engine	3
Source: Johnson 2016		

Page 5.16-3, Section 5.16, *Utilities and Service Systems*, has been modified in response to Comment A3-1 from County Sanitation Districts of Los Angeles County.

#### *Wastewater Treatment*

The wastewater generated by the project site is conveyed through the aforementioned trunk sewer pipelines and treated at the San Jose Creek Water Reclamation Plant (SJCWRP) located at 1965 Workman Mill Road in unincorporated Los Angeles County adjacent to the City of Industry. The design capacity of the SJCWRP is 100 million gallons per day (mgd) and the facility currently processes an average flow of ~~64.669-4~~ mgd, resulting in a remaining capacity of about ~~35.430-6~~ mgd.

### 3. Revisions to the Draft EIR

---

Page 5.16-7, Section 5.16, *Utilities and Service Systems*, has been modified in response to Comment A3-1 from County Sanitation Districts of Los Angeles County.

---

#### Wastewater Treatment

As discussed under Subsection 5.16.1.1, above, the wastewater generated by the project site is treated at the SJCWRP, which has a design capacity of 100 mgd and currently processes an average flow of ~~64.669~~<sup>4</sup> mgd. Approximately 42 million gallons per day of reclaimed water (tertiary treatment) is reused for groundwater recharge, irrigation of parks, schools, and greenbelts with the remainder discharged to the San Gabriel River. SJCWRP has a remaining capacity of about ~~35.430~~<sup>6</sup> mgd. The projected average peak daily wastewater flow generated by buildout of the proposed Campus Plan—823,908 gpd—would only represent 0.8 percent of the facility's design capacity and ~~2.32~~<sup>7</sup> percent of its remaining capacity. When compared to the SJCWRP's overall treatment capacity, buildout of the proposed Campus Plan would not have a significant impact on the SJCWRP's ability to treat wastewater in the area. Impacts related to wastewater treatment would be less than significant.

### 3.3 ADDITIONAL DEIR REVISIONS

The following text has been revised in order to correct minor errors or provide additional information or clarification of the DEIR text.

---

Page 1-11, Table 1-3, Chapter 1, *Executive Summary*; and Pages 5.2-40 (Mitigation Measure AQ-1), 5.10-40 (Mitigation Measure N-1), 5.14-54 (Mitigation Measure TRAF-3) are hereby revised as follows to correct minor errors and to reflect the changes made throughout this FEIR.

---

See Appendix D, *EIR Tables 1-3, 5.6-7, 5.10-9, 5.10-10, 5.10-11*, herein.

---

Page 3-1, Chapter 3, *Project Description*, Section 3.2, *Statement of Objectives*; and Page 7-2, Section 7.1.2, *Project Objectives*, are hereby revised to correct a minor error.

---

### 3.2 STATEMENT OF OBJECTIVES

The following goals and objectives for City of Hope Campus Plan project will aid decision makers in their review potential associated environmental impacts:

1. Allow for the flexible, long-term development and enhancement of the entire City of Hope campus in order to augment hospital, outpatient services, research uses, office space and support services, and meet the evolving needs of the community, while minimally disrupting the surrounding neighborhood.
2. Facilitate the replacement and/or enhancement of existing medical buildings and support facilities in order to accommodate the projected increase in regional demand for outpatient services through 2035.

### 3. Revisions to the Draft EIR

3. Maximize the creation of construction jobs and new permanent jobs in the Cities of Duarte and Irwindale and the surrounding community through the long-term expansion and enhancement of the campus, such that at full project buildout there is a jobs-housing balance in the City of Duarte at the top end of the desirable range of jobs to housing (between 1.3:1 and 1.7:1) recommended by the American Planning Association so that Duarte remains a regional employment center with a multitude of jobs in the health care industry that reinforces Duarte's brand as the "City of Health."
4. Develop enhanced and expanded open space on the campus to serve the needs of City of Hope patients, employees and visitors, while concentrating development footprints.
5. Provide a modern, cohesive and contemporary design complemented by landscaping and public art, to create a dynamic relationship between existing and new buildings.
6. Modernize or replace obsolete or outdated buildings and facilities with more efficient development that meets the needs of City of Hope patients, physicians, researchers and other employees.
7. Reinforce public investment in and encourage use of public transit, and maximize employee density in proximity to public transit, including the Gold Line station at Duarte/City of Hope and regional bus lines.
8. Improve and streamline multimodal transportation and access throughout the campus, including by foot, bicycle, car, and shuttle.
9. Maximize employee density in proximity to public transit while reducing ~~or mitigating all net new~~ greenhouse gas emissions from construction and operation as much as feasible to zero.
10. Incorporate sustainable design elements to the maximum extent possible throughout the campus, including compliance with green building standards, water and energy efficient design elements, electricity generation, adaptive reuse of buildings, and minimization of solid waste generation.
11. Support proximate parking for patients, visitors and employees, between parking structures and surface lots, and the variety of buildings intended to serve campus populations.
12. Upgrade and expand utilities and infrastructure necessary to support campus growth, while minimizing impacts to the greater community.
13. Augment site improvements, signage and wayfinding to foster a more accessible campus for all populations.

### 3. Revisions to the Draft EIR

Page 3-24, Chapter 3, *Project Description*, is hereby revised as follows to clarify that the specific planned future expansion of the Central Utilities Plant is being developed and the worst case buildout assumptions were used in the environmental analysis.

#### Central Utilities Plant

Buildout of the City of Hope campus requires improvements to the existing central utilities plant. The specific planned future improvements—equipment, fuel type, and installation methods— are still being developed/unknown at this time and speculative. Expansion of the central utilities plant will be required to undergo separate CEQA review under the South Coast Air Quality Management District (SCAQMD) and future discretionary action by SCAQMD per SCAQMD Regulation XIII, New Source Review. ~~For informational purposes, w~~Worst case buildout assumptions of the central utilities plant are provided in Table 3-6 for the purposes of providing energy and emissions data in the environmental analysis of this EIR.

Page 5.2-15, Table 5.2-4, Section 5.2, *Air Quality*, are hereby revised as follows to provide clarification.

**Table 5.2-4 Existing City of Hope Daily Emissions Inventory**

Phase	Operation-Related Regional Emissions (pounds/day)					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Land Uses</b>						
Area	37	<1	2	<1	<1	<1
Energy	2	18	15	<	1	1
Transportation <sup>1</sup>	45	219	698	2	133	37
<b>Total</b>	<b>83</b>	<b>237</b>	<b>715</b>	<b>2</b>	<b>135</b>	<b>39</b>
<b>Stationary Equipment</b>						
<i>Central Utilities Plant<sup>2</sup></i>	<i>3</i>	<i>46</i>	<i>34</i>	<i>&lt;1</i>	<i>3<sup>3</sup></i>	<i>3<sup>3</sup></i>

Source: CalEEMod 2016.3.1.

Notes: Based on highest winter or summer emissions using 2016 transportation emission rates. Totals may not equal 100 percent due to rounding. ~~Excludes permitted sources of emissions that are covered under SCAQMD regulations.~~

<sup>1</sup> Assumed vehicle fleet mix based on CalEEMod defaults and the annual average daily trips identified by Caltrans for the segment of Interstate 210 west of interstate 605 (Caltrans 2016).

<sup>2</sup> Emissions are ~~shown for information purposes and~~ from SCAQMD reporting system, City of Hope Medical Center (Facility ID 23194). Per CalEEMod methodology, emissions associated with boilers in the Energy sector are based on building energy demand and are encompassed within the total Energy sector emissions shown. In addition, emissions from permitted stationary equipment such as installed in the central utilities plant (e.g., boilers) are controlled through the SCAQMD permitting process.

<sup>3</sup> PM emissions are shown as PM<sub>10</sub>. PM<sub>2.5</sub> fraction of PM<sub>10</sub> is assumed at 99 percent (SCAQMD 2006).

Page 5.2-21, Section 5.2, *Air Quality*, Section 5.2.3, *Environmental Impacts*, “Methodology,” is hereby revised as follows to provide clarification.

- **Stationary Sources:** Per CalEEMod methodology, emissions associated with operation of boilers are encompassed within the energy sector emissions associated with the buildings. Moreover, specific The project includes planned future improvements to the City of Hope central utilities plant that are currently unknown and speculative. Design and engineering of the specific planned future improvements to the



## 3. Revisions to the Draft EIR

City of Hope central utilities plant are still being developed. Therefore, this analysis reviews reasonably foreseeable worst-case emissions profiles from the central utilities plant that would be required as part of the project. The reasonably foreseeable worst-case emissions profile assumes that natural gas fired boilers would continue to provide the steam and heating needs of the project. Note that future improvements to the central utilities plant that includes modifications to or the addition of new stationary equipment would require a permit to operate from SCAQMD per SCAQMD Regulation XIII, New Source Review. Permitting would require future CEQA processing and discretionary approval by SCAQMD and provide a control for stationary-source emissions. The purpose of including the central utilities plant in this analysis is to provide an estimate of all emission sources contributing to air quality impacts for the whole of the proposed project, which includes all reasonably foreseeable impacts resulting from the approval of the Specific Plan, including the central utilities plant expansion. However, for purposes of this analysis, emissions from the potential installation of two new boilers (estimated in Phase 2 and 4) at the existing City of Hope central utilities plant are included. Per CalEEMod methodology, emissions associated with operation of boilers are encompassed within the energy sector emissions associated with the buildings. Thus, boiler emissions for informational purposes only and are not additive to the overall total operational-phase emissions. While two new emergency generators could also be installed, operation of an emergency generator would only occur during emergencies and periodic testing and its operation would be minimal overall. Additionally, installation of stationary sources of emissions such as boilers and generators would be subject to CEQA and future discretionary action by SCAQMD per SCAQMD Regulation XIII, New Source Review the SCAQMD permitting process. The daily and heat annual inputs are based on data provided for the three existing boilers in operation at the City of Hope central utilities plant. Boiler Emissions from the assumed two new boilers within the central utilities plant are based on the following:

- Boilers:
  - Fuel Type: Compressed natural gas
  - Boiler Rating: 4 MMBtu per hour
  - Daily Heat Input Per Boiler: 131.79 MMBtu per day
  - Annual Heat Input Per Boiler: 49,003 MMBtu per year

Page 5.2-32, Table 5.2-17, Section 5.2, *Air Quality*, is hereby revised as follows to provide clarification.

**Table 5.2-17 Phase 4 (Full Buildout): Net Maximum Daily Operation-Phase Emissions**

Phase	Operation-Related Regional Emissions (pounds/day)					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Land Uses</b>						
<b>Existing (Year 2035)</b>						
Area	37	<1	2	<1	<1	<1
Energy	2	18	15	<1	1	1
Transportation	15	75	227	1	131	35
<b>Total</b>	<b>54</b>	<b>93</b>	<b>245</b>	<b>1</b>	<b>133</b>	<b>37</b>
<b>Project<sup>1</sup></b>						
Area	60	<1	1	<1	<1	<1

### 3. Revisions to the Draft EIR

**Table 5.2-17 Phase 4 (Full Buildout): Net Maximum Daily Operation-Phase Emissions**

Phase	Operation-Related Regional Emissions (pounds/day)					
	VOC	NO <sub>x</sub>	CO	SO <sub>2</sub>	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Land Uses</b>						
Energy <sup>2</sup>	3	29	25	<1	2	2
Transportation <sup>3</sup>	21	106	319	2	184	49
<b>Total</b>	<b>84</b>	<b>135</b>	<b>344</b>	<b>2</b>	<b>186</b>	<b>52</b>
<b>Net Change (Project – Existing)</b>						
<b>Net Change</b>	<b>31</b>	<b>42</b>	<b>100</b>	<b>1</b>	<b>53</b>	<b>15</b>
SCAQMD Regional Thresholds	55	55	550	150	150	55
<b>Significant?</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>
<b>New Potential Stationary Sources</b>						
<i>Central Utilities Plant – Boilers<sup>4</sup></i>	<i>1</i>	<i>3</i>	<i>25</i>	<i>&lt;1</i>	<i>2</i>	<i>2</i>

Source: CalEEMod Version 2016.3.1. Based on highest winter or summer emissions using 2035 transportation emission rates. Totals may not equal 100 percent due to rounding. Excludes permitted sources of emissions that are covered under SCAQMD regulations.

<sup>1</sup> It is assumed that approximately 387,500 building square feet of the existing City of Hope structures would be demolished.

<sup>2</sup> Per CalEEMod methodology, emissions associated with any additional boilers needed for additional heating for the new facilities are accounted in the Energy sector. Emissions in this sector represent emissions associated with building energy use.

<sup>3</sup> Assumed vehicle fleet mix based on CalEEMod defaults and the annual average daily trips identified by Caltrans for the segment of I-210 west of I-605 (Caltrans 2016).

<sup>4</sup> ~~Shown for informational purposes.~~ For purposes of this analysis, it is assumed a new boiler would be installed at the City of Hope central utilities plant in Phase 2 and Phase 4 for a total of two new boiler units. Per CalEEMod methodology, the Energy sector emissions calculated for land uses encompasses emissions associated with boilers, thus boiler emissions shown are not additive. In addition, installation of new or additional boilers and other stationary equipment such as an emergency generator would require a permit to operate from SCAQMD and would be subject to SCAQMD Regulation XIII, *New Source Review*, which would mitigate emissions through Best Available Control Technology (BACT).

Pages 5.2-36, 5.2-37, and 5.2-38, Impact 5.2-6; and Table 5.2-20, Section 5.2, *Air Quality*, are hereby revised as follows to provide clarification.

**Impact 5.2-6: Implementation of the proposed City of Hope Campus Plan would not expose sensitive receptors to substantial pollutant concentrations. [Threshold AQ-4]**

**Impact Analysis:** Operation of new land uses consistent with the Campus Plan would result in new area/stationary and mobile sources of criteria air pollutants and TACs in the plan area.

#### Operational LSTs

The types of land uses that typically generate substantial amounts of stationary source emissions include industrial land uses. The City of Hope Campus Plan would guide expansion of the City of Hope medical office facilities to meet the medical needs of the region. The City of Hope operates a Central Plant to offset campus-wide energy needs associated with building and cooling. These facilities are constructed at institutional facilities, such as hospitals, universities, and county facilities, because they offer co-benefits that reduce the overall energy needs and the amount of electricity and natural gas the agency needs to purchase from the grid/energy purveyor. The existing Central Plant at the City of Hope Campus includes three boilers and chillers. Additionally, the City of Hope campus maintains emergency generators for back-up power to support critical services. These types of equipment require a permit to operate by the SCAQMD.

## 3. Revisions to the Draft EIR

The proposed project would result in an increase in electricity and natural gas use on the campus (see Table 5.2-17). To accommodate the increase in electricity and natural gas use, the City of Hope may purchase additional energy from electricity purveyors or expand the Central Plant so that it can offset the increase in energy use. At this time, information on the specific equipment that the City of Hope may consider and SCAQMD would permit at the Central Plant ~~is not known is still being determined, and is therefore considered speculative for this programmatic analysis.~~ While the analysis considers the installation of the proposed two new boilers, as stated, per CalEEMod methodology, their emissions are encompassed within the land use Energy sector emissions. Additionally, installation of additional boilers, chillers, emergency generators, and other stationary equipment (e.g., cogeneration unit) necessary to provide heating and cooling and power needs to the City of Hope would require a permit to operate from SCAQMD as required under SCAQMD Regulation XIII, *New Source Review*. This permitting process would be separate from the general occupancy permits issued either by the City of Duarte or City of Irwindale and would provide a control for emissions associated with any new or modified future stationary equipment and ensure that applicable emissions standards are met and potential impacts are less than significant.

Although operation of the proposed project would result in the use of standard on-site mechanical equipment (such as heating, ventilation, and air conditioning units) and occasional use of landscaping equipment for project site maintenance, air pollutant emissions generated from these activities would be below the SCAQMD screening-level LSTs thresholds, as shown in Table 5.2-20, *Maximum Daily On-Site Localized Operation Emissions at Full Buildout*. Therefore, localized air quality impacts related to stationary-source emissions would be less than significant.

Table 5.2-20 Maximum Daily On-Site Localized Operational Phase Emissions at Full Buildout

Operational Phase	Net Increase in Criteria Air Pollutants (lbs/day)			
	NOx	CO	PM <sub>10</sub>	PM <sub>2.5</sub>
<b>Net Change</b>				
Area	<1	<1	<1	<1
Energy	11	10	1	1
<b>Total</b>	<b>11</b>	<b>10</b>	<b>1</b>	<b>1</b>
SCAQMD LST	203	1,733	4	2
Exceeds LST?	No	No	No	No
<b>New Potential Stationary Sources</b>				
<i>Central Utilities Plant Boilers<sup>1</sup></i>	3	25	2	2

Source: CalEEMod 2016.3.1; SCAQMD 2008b.

Notes: In accordance with SCAQMD methodology, only on-site stationary sources and mobile equipment occurring within the proposed project site are included in the analysis. LSTs are based on sensitive receptors within 82 feet (25 meters) of the proposed project site within SRA 9. ~~Excludes permitted sources of emissions that are covered under SCAQMD regulations.~~

<sup>1</sup> ~~Shown for informational purposes.~~ For purposes of this analysis, it is assumed a new boiler would be installed at the City of Hope central utilities plant in Phase 2 and Phase 4 for a total of two new boiler units. Per CalEEMod methodology, the Energy sector emissions calculated for land uses encompasses emissions associated with boilers, ~~thus boiler emissions shown are not additive.~~ In addition, installation of new or additional boilers and other stationary equipment such as an emergency generator would require a permit to operate from SCAQMD and would be subject to SCAQMD Regulation XIII, *New Source Review*, which would mitigate emissions through Best Available Control Technology (BACT).

### 3. Revisions to the Draft EIR

#### Toxic Air Contaminants

The proposed project would result in development of approximately 60,000 square feet of industrial-type land uses within the City of Hope campus. However, it is not anticipated that these industrial-type land uses, which would include a 30,000 square-foot data center, would be large emitters of TACs. In addition, and as stated, land uses that have the potential to be substantial stationary sources that would require a permit from SCAQMD for emissions of TACs include industrial land uses, such as chemical processing facilities, chrome-plating facilities, dry cleaners, and gasoline-dispensing facilities. Emissions of TACs would be controlled by SCAQMD through permitting and would be subject to further study and health risk assessment prior to the issuance of any necessary air quality permits under SCAQMD Rule 1401. The permitting process ensures that stationary source emissions would be below the SCAQMD significance thresholds of 10 in a million cancer risk and 1 for acute risk at the maximally exposed individual. There may be a possibility that new medical buildings accommodated under the proposed Campus Plan would include stationary sources of emissions such as from an emergency generator or cogeneration unit. For example, the proposed central plant would be located on the southeastern edge of the campus adjacent to undeveloped land. The structure would be located more than 1,000 feet from existing off-site sensitive receptors. Emissions disperse rapidly from the source and would not be expected to result in a substantial impact to off-site receptors. Therefore, equipment installed through the SCAQMD permitting process would not be expected to result in toxic air contaminant impacts to off-site receptors.

Further, as stated, the specific planned future improvements to the City of Hope central utilities plant are still being developed. ~~as the proposed project is a program-level document, it is currently unknown which additional types of stationary sources may be installed, if any.~~ However, as stated, any new stationary sources of emissions introduced under the proposed project would require an SCAQMD permit to operate, which would provide a control for emissions. Therefore, overall, impacts related to TACs are considered less than significant.

---

Page 5.6-25, Section 5.6, *Greenhouse Gas Emissions*, Section 5.6.3, *Environmental Impacts*, “Methodology,” is hereby revised as follows to provide clarification.

---

- **Stationary Sources:** Per CalEEMod methodology, emissions associated with operation of boilers are encompassed within the energy sector emissions associated with the buildings. Moreover, specific The project includes planned future improvements to the City of Hope central utilities plant that are currently unknown and speculative. Design and engineering of the specific planned future improvements to the City of Hope central utilities plant are still being developed. Therefore, this analysis reviews reasonably foreseeable worst-case emissions profiles from the central utilities plant that would be required as part of the project. The reasonably foreseeable worst-case emissions profile assumes that natural gas fired boilers would continue to provide the steam and heating needs of the project. Note that future improvements to the central utilities plant that includes modifications to or the addition of new stationary equipment would require a permit to operate from SCAQMD per SCAQMD Regulation XIII, New Source Review. Permitting would require future CEQA processing and discretionary approval by SCAQMD and provide a control for stationary-source emissions. The purpose of including the central utilities plant in this analysis is to provide an estimate of all emission sources contributing to air quality

### 3. Revisions to the Draft EIR

impacts for the whole of the proposed project, which includes all reasonably foreseeable impacts resulting from the approval of the Specific Plan, including the central utilities plant expansion. However, for purposes of this analysis, emissions from the potential installation of two new boilers (estimated in Phase 2 and 4) at the existing City of Hope central utilities plant are included. Per CalEEMod methodology, emissions associated with operation of boilers are encompassed within the energy sector emissions associated with the buildings. Thus, boiler emissions for informational purposes only and are not additive to the overall total operational-phase emissions. While two new emergency generators could also be installed, operation of an emergency generator would only occur during emergencies and periodic testing and its operation would be minimal overall. Additionally, installation of stationary sources of emissions such as boilers and generators would be subject to CEQA and future discretionary action by SCAQMD per SCAQMD Regulation XIII, New Source Review, the SCAQMD permitting process. The daily and heat annual inputs are based on data provided for the three existing boilers in operation at the City of Hope central utilities plant. Boiler emissions from the assumed two new boilers within the central utilities plant are based on the following:

- Boilers:
  - Fuel Type: Compressed natural gas
  - Boiler Rating: 4 MMBtu per hour
  - Daily Heat Input Per Boiler: 131.79 MMBtu per day
  - Annual Heat Input Per Boiler: 49,003 MMBtu per year

---

Page 5.6-27, Table 5.6-7, Section 5.6, *Greenhouse Gas Emissions*, is hereby revised as follows to correct a minor error.

---

See Appendix D, *EIR Tables 1-3, 5.6-7, 5.10-9, 5.10-10, 5.10-11*, herein.

---

Pages 5.6-34 and 5.6-35, Section 5.6, *Greenhouse Gas Emissions*, Section 5.6.4, *Cumulative Impacts*, is hereby revised as follows to correct a typographical error and incorporate information that was provided in Impact 5.6-1 starting on page 5.6-26 of the DEIR .

---

#### 5.6.4 Cumulative Impacts

Project-related GHG emissions are not confined to a particular air basin, but are dispersed worldwide. Therefore, impacts identified under Impact 5.6-1 are not project-specific impacts to global warming, but the proposed project's contribution to this cumulative impact. The recommended mitigation measures would ensure that GHG emissions from buildout of the proposed project would be minimized. However, additional federal, state, and local measures would be necessary to reduce GHG emissions under the proposed project to meet the midterm GHG reduction target set by SB 32 and the long-term GHG reduction goal under Executive Order S-03-05. Based on SCAQMD's 2020 efficiency target, the SB 32 target, and the reduction goal under Executive Order S-03-05, this would equate to 2.3 MTCO<sub>2</sub>e/SP at full buildout. The buildout GHG emissions for the proposed project would generate 7.1 MTCO<sub>2</sub>e/SP and would exceed the forecast

### 3. Revisions to the Draft EIR

~~efficiency target of 2.3 MTCO<sub>2</sub>e/SP. Currently, there is no adopted plan that achieves the long-term GHG reduction goal. As identified by the California Council on Science and Technology, the state cannot meet the 2050 goal without major advances in technology (CCST 2012). Overall, no additional statewide measures are currently available to further minimize GHG emissions, and cumulative GHG emissions impacts would remain significant and unavoidable. With mitigation, GHG emissions and the project's cumulative contribution to global climate change impacts would be less than cumulatively considerable, and therefore, less than significant.~~

---

Pages 5.8-26 and 5.8-27, Section 5.8, *Hydrology and Water Quality*, is hereby revised as follows to correct a minor error.

---

A Water Supply Assessment (WSA) has been prepared for the project and is provided in Appendix L (WSC 2017). Water supply is also discussed in further detail in Section 5.16, *Utilities and Service Systems*. Cal Am assesses whether the total projected water supplies available during average, single-dry, and multiple-dry water years during a 20-year projection would meet the projected water demand for the project, in addition to Cal Am's existing and planned future uses. The WSA determined that the project would require an additional 359 acre-feet per year of water at full buildout and that Cal Am's total projected water supplies available during average, single dry, and multiple dry water years during a 20-year projection will meet the projected water demand for the project. However, the additional water demand of the proposed project would increase the existing well capacity deficit; this deficit could be met with one additional groundwater well that could be located on the City of Hope campus. Additional details are provided in Section 5.16 of this DEIR. ~~With implementation of the Mitigation Measure USS-1, t~~ The impact of the project on groundwater recharge and/or groundwater supplies would be less than significant.

---

Tables 5.10-9, 5.10-10, and 5.10-11, Section 5.10, *Noise*, are hereby revised as follows to correct a typographical error. Specifically, all references to the street name Cinco Roberts have been revised to Cinco Robles.

---

See Appendix D, *EIR Tables 1-3, 5.6-7, 5.10-9, 5.10-10, 5.10-11*, herein.

---

Pages 5.12-3 and 5.12-4, Section 5.12, *Public Services*, are hereby revised as follows to correct minor errors.

---

Further, future development in accordance with the Campus Plan would be required to comply with all applicable fire code and ordinances for construction, access, water mains, fire flows, and fire hydrants. Specific fire and life safety requirements for the construction phase would be addressed at the building fire plan check review stage (Johnson 2016). For example, site plans would be submitted to LACFD ~~the Los Angeles Fire Department~~ in order to obtain a fire flow requirement based upon the tenant type, building size, and building type. Compliance with LACFD requirements would also ensure adequate provision of resources. Demolition and replacement of outdated facilities with new facilities equipped with modern fire and life safety systems would also reduce demands for fire protection.

### 3. Revisions to the Draft EIR

#### 5.12.1.5 CUMULATIVE IMPACTS

The area considered for cumulative impacts is LACFD Battalions 16 and 10, which span much of the north-central and west-central San Gabriel Valley, respectively; Battalion 16 also serves part of the San Gabriel Mountains. Battalion 16 includes the cities of Duarte, Baldwin Park, Irwindale, Azusa, and Covina; while Battalion 10 encompasses the cities of Rosemead, El Monte, South El Monte, and San Gabriel, and some adjoining unincorporated areas. Battalion 16 is housed in eight fire stations, and Battalion 10 in nine stations (LACFD 2012). Over the buildout period of the Campus Plan, other projects in the service areas of Battalions 10 and 16 would develop additional structures housing increased numbers of residents and workers, thus generating increased demands for fire protection and emergency medical services. Cumulative growth anticipated in the region would generate increased tax revenues to cities and Los Angeles County. Some of those revenues would be available to fund construction of new or expanded fire stations; purchase additional apparatus; and/or hire additional staff. Such additional revenue would offset some of the potentially adverse impacts of increased development. In addition, similar to the proposed project, each of the cumulative projects would be subject to Title 24 Building Code regulations and individually subject to ~~LACFD Los Angeles Fire Department~~ review and compliance with all applicable construction-related and operational fire safety requirements of ~~LACFD the Los Angeles Fire Department~~ and the Building and Fire Codes of the applicable city. In addition, in correspondence included with Appendix M, LACFD has indicated that it will be able to serve cumulative developments in addition to the proposed project. To that end, LACFD has not identified the need for additional facilities as a result of the Campus Plan and identified cumulative development. Therefore, cumulative impacts to fire services would be less than significant.

---

Page 5.14-49, Section 5.14, *Transportation and Traffic*, is hereby revised as follows to correct duplicative text.

---

#### Consistency with SB 743

As stated in Section 5.14.1.1, Regulatory Setting, SB 743 started a process that could fundamentally change transportation impact analysis as part of CEQA compliance. These changes in many parts of California (if not statewide) will include the elimination of auto delay, LOS, and similar measures of vehicular capacity or traffic congestion as a basis for determining significant impacts. As part of the new CEQA Guidelines, the new criteria “shall promote the reduction of greenhouse gas emissions, the development of multimodal transportation networks, and a diversity of land uses” (Public Resources Code Section 21099(b)(1)). Certification of the new guidelines are expected in late 2017. However, since OPR has not yet amended the CEQA Guidelines to implement this change, automobile delay is still considered a significant impact, and the Cities of Duarte and Irwindale will continue to use the established LOS criteria.

For informational purposes, Fehr & Peers prepared a technical memorandum (included in Appendix J1) to quantify the VMT for the project under existing and proposed conditions. To evaluate total VMT for the project, the analysis considered two methods for determining trip distance. The first method utilized trip distances as determined by the Southern California Association of Government's (SCAG) travel demand model, and the second method utilized the anonymous cell phone data from the existing City of Hope campus on weekdays for one year from July 2014 to June 2015. Detailed methodology used to calculate VMT and VMT reductions are provided in the Appendix J1 of this DEIR.

### 3. Revisions to the Draft EIR

#### *Vehicle Miles Traveled (VMT) Analysis*

~~To evaluate total VMT for the project, the VMT analysis considered two methods for determining trip distance. The first method utilized trip distances as determined by the Southern California Association of Government's (SCAG) travel demand model, and the second method utilized the anonymous cell phone data from the existing City of Hope campus on weekdays for one year from July 2014 to June 2015.~~

---

Page 5.14-55, Section 5.14, *Transportation and Traffic*, Section 5.14.8, *Level of Significance After Mitigation*, is hereby revised as follows to correct minor errors.

---

#### 5.14.8 Level of Significance After Mitigation

##### Impact 5.14-1

With implementation of Mitigation Measure TRAF-1 and TRAF-2, traffic operations would be improved to acceptable levels of service and impacts would be less than significant, with the exception of three intersections in the future condition (see Tables 10 and 11 in Appendix J1 of this DEIR). For the reasons stated above, improvements to: Live Oak Avenue & Arrow Highway (#1; Irwindale), Buena Vista Street & Evergreen Street (#13; Duarte), and Buena Vista Street & Duarte Road (#15; Duarte) are not recommended for safety reasons. Impacts to these intersections would remain ***significant and unavoidable***.

Two freeway ramp intersections would result in significant impacts—I-605 Northbound Off-Ramp & Live Oak Avenue (#8) and I-210 Westbound Off-Ramp & Central Avenue (#17). As stated above, signalization at these intersection required by TRAF-1 would improve traffic operations to acceptable levels of service. Additionally, one ~~The freeway ramp queues would extend beyond the 85 percent length of the ramp at I-605 Northbound Off-Ramp & Live Oak Avenue (#8) and I-210 Westbound Off-Ramp & Central Avenue (#17).~~ Signalization of ~~this~~ these ramp intersections as required under TRAF-1 would reduce the storage length by approximately half during both peak periods, ensuring that the queue would not extent beyond the 85 percent length (see Table 14 of Appendix J1 of this DEIR). This would mitigate the ramps to less than significant. However, the improvement is within the responsibility of Caltrans and not controlled by the Cities. Therefore, the Cities cannot guarantee implementation of the improvement and impacts to freeway ramps would be ***significant and unavoidable***.

---

Page 5.16-34, Section 5.16, *Utilities and Service Systems*, is hereby revised as follows to correct an error in numbering.

---

#### Level of Significance Before Mitigation

Upon implementation of regulatory requirements, Impact ~~5.16-4~~ 5.16-3 would be less than significant.



### 3. Revisions to the Draft EIR

---

Page 5.17-10, Section 5.17, *Energy*, is hereby revised as follows to correct a minor error.

---

#### *Gas Energy*

The project site already being served by SCG ~~and such demands would be eliminated once construction operations are completed.~~ The construction-related equipment would not be powered by natural gas and no natural gas demand is anticipated during construction. No new or expanded natural gas facilities or supply are anticipated. Impacts related to gas energy use during short-term construction activities would be less than significant.

---

Page 7-11, Section 7.5, *No Project/No Development Alternative*, is revised as follows to provide additional information and clarification.

---

#### **Ability to Achieve Project Objectives**

Implementation of the No Project/No Development Alternative would ultimately stop any new development from occurring within in the project site beyond what is already on the ground. Therefore, none of the project objectives would be achieved under this alternative.

The No Project/No Development Alternative would not provide any of the project benefits that would occur with adoption of the Specific Plan, including enhancement of character and design, improved mobility and connectivity, water quality enhancement, creation of place, sustainable development and design, and economic revitalization. Because no demolition of existing buildings or construction of new buildings could occur, City of Hope would not be allowed to reorganize and reorient the campus to be aesthetically pleasing and physically cohesive. The existing, haphazardly-arranged collection of buildings would be preserved and circulation through the site would remain fragmented to visitors. Accordingly, City of Hope would not be able to use new buildings and urban design to create a “sense of place” as proposed under the proposed project. The project site would be less sustainable due to the continued use of older, energy-inefficient buildings that feature aging and outdated utility and service systems. The preserved site design would also prevent City of Hope from implementing low-impact development, source control, site design, and treatment control best management practices (BMPs) to minimize runoff and water pollution. In general, the campus would be less of an economic engine and catalyst for medical research in the region due to the reduced building space available for serving patients.

---

Pages 7-16 and 7-17, Section 7.5, *No Project/Existing General Plan Alternative*, is revised as follows to correct a minor error.

---

#### **Ability to Reduce Environmental Impacts**

As summarized in Table 7-3, *Summary of No Project/Existing General Plan Alternative Impacts*, the No Project Alternative would have greater environmental impacts related to aesthetics, air quality, GHG emissions, hazards and hazardous materials, hydrology and water quality, land use and planning, noise, public services, transportation and traffic, utilities and service systems, and energy; and have similar impact in the areas of

### 3. Revisions to the Draft EIR

biological resources, cultural resources, geology and soils, population and housing, recreation, and tribal cultural resources. Notably, this alternative would result in a new significant and unavoidable impact to GHG emissions and would still have significant and unavoidable impacts to construction noise, and traffic ~~and water supply~~. Therefore, overall this alternative is considered environmentally inferior when compared to the proposed project.

#### Ability to Achieve Project Objectives

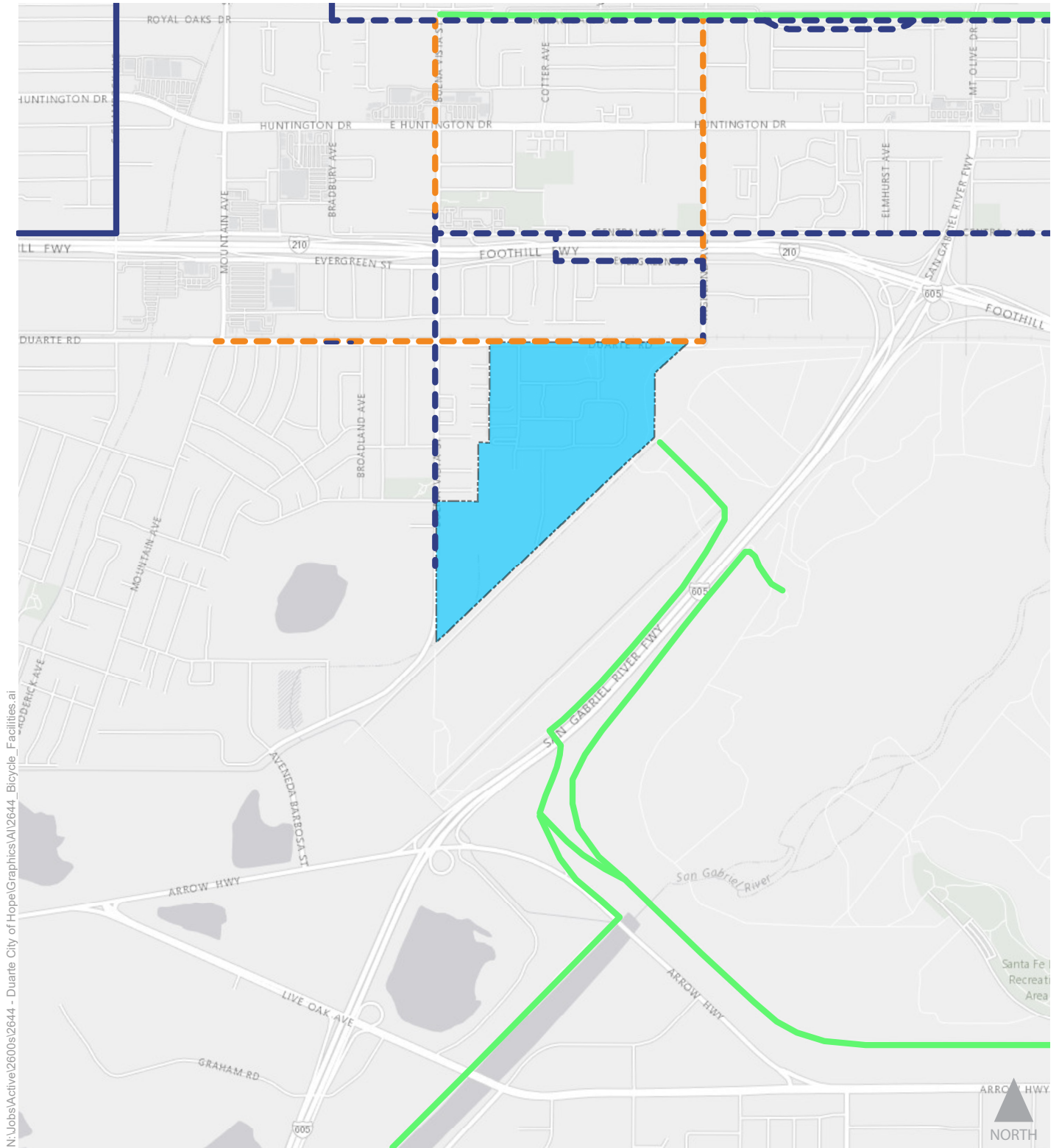
Implementation of this alternative would not achieve objective 5 (a modern, cohesive and contemporary design complemented by landscaping and public art), 11 (proximate parking), and 13 (wayfinding). Due the increase in square footage and associated increases in GHG emissions, this alternative would not achieve objective 9 (maximize density while mitigating GHG emissions) to the same degree as the proposed project. Implementation of the No Project/Existing General Plan Alternative has the ability to~~would~~ achieve project objectives 1 through 3 involving campus development, outpatient health care capacity, employment generation, and city revenues (see Section 7.6). Implementation of this alternative would partially or wholly achieve objectives 4 (open space), 6 (modernize/replace buildings), 7 and 8 (public transit and active transportation on and off campus), ~~9~~-and 10 (sustainability regarding GHG emissions, water- and energy-efficient designs, and minimizing solid waste generation), and 12 (expansion of infrastructure). Objectives 5, 7, 8, 9, 10, and 11 are all consistent with the existing City of Duarte General Plan, as described in Section 5.9, Land Use, of this DEIR.

---

Appendix J1, Figure 4, Area Bicycle Facilities, is revised as follows to correct the proposed Class I bicycle facility.

---

See revised Figure 4, *Area Bicycle Facilities*.



- | Existing |           | Proposed |           |
|----------|-----------|----------|-----------|
|          | Class I   |          | Class I   |
|          | Class II  |          | Class II  |
|          | Class III |          | Class III |
- Project Area



Figure 4  
Area Bicycle Facilities

### 3. Revisions to the Draft EIR

*This page intentionally left blank.*

## Appendix

# Appendix A. Metro Attachments

## Appendix

*This page intentionally left blank.*

# GUIDELINES FOR CMP TRANSPORTATION IMPACT ANALYSIS

*Important Notice to User: This section provides detailed travel statistics for the Los Angeles area which will be updated on an ongoing basis. Updates will be distributed to all local jurisdictions when available. In order to ensure that impact analyses reflect the best available information, lead agencies may also contact MTA at the time of study initiation. Please contact MTA staff to request the most recent release of "Baseline Travel Data for CMP TIAs."*

## D.1 OBJECTIVE OF GUIDELINES

The following guidelines are intended to assist local agencies in evaluating impacts of land use decisions on the Congestion Management Program (CMP) system, through preparation of a regional transportation impact analysis (TIA). The following are the basic objectives of these guidelines:

- ☐ Promote consistency in the studies conducted by different jurisdictions, while maintaining flexibility for the variety of project types which could be affected by these guidelines.
- ☐ Establish procedures which can be implemented within existing project review processes and without ongoing review by MTA.
- ☐ Provide guidelines which can be implemented immediately, with the full intention of subsequent review and possible revision.

These guidelines are based on specific requirements of the Congestion Management Program, and travel data sources available specifically for Los Angeles County. References are listed in Section D.10 which provide additional information on possible methodologies and available resources for conducting TIAs.

## D.2 GENERAL PROVISIONS

Exhibit D-7 provides the model resolution that local jurisdictions adopted containing CMP TIA procedures in 1993. TIA requirements should be fulfilled within the existing environmental review process, extending local traffic impact studies to include impacts to the regional system. In order to monitor activities affected by these requirements, Notices of Preparation (NOPs) must be submitted to MTA as a responsible agency. Formal MTA approval of individual TIAs is not required.

The following sections describe CMP TIA requirements in detail. In general, the competing objectives of consistency & flexibility have been addressed by specifying standard, or minimum, requirements and requiring documentation when a TIA varies from these standards.

### D.3 PROJECTS SUBJECT TO ANALYSIS

In general a CMP TIA is required for all projects required to prepare an Environmental Impact Report (EIR) based on local determination. A TIA is not required if the lead agency for the EIR finds that traffic is not a significant issue, and does not require local or regional traffic impact analysis in the EIR. Please refer to Chapter 5 for more detailed information.

CMP TIA guidelines, particularly intersection analyses, are largely geared toward analysis of projects where land use types and design details are known. Where likely land uses are not defined (such as where project descriptions are limited to zoning designation and parcel size with no information on access location), the level of detail in the TIA may be adjusted accordingly. This may apply, for example, to some redevelopment areas and citywide general plans, or community level specific plans. In such cases, where project definition is insufficient for meaningful intersection level of service analysis, CMP arterial segment analysis may substitute for intersection analysis.

### D.4 STUDY AREA

The geographic area examined in the TIA must include the following, at a minimum:

- ☐ All CMP arterial monitoring intersections, including monitored freeway on- or off-ramp intersections, where the proposed project will add 50 or more trips during either the AM or PM weekday peak hours (of adjacent street traffic).
- ☐ If CMP arterial segments are being analyzed rather than intersections (see Section D.3), the study area must include all segments where the proposed project will add 50 or more peak hour trips (total of both directions). Within the study area, the TIA must analyze at least one segment between monitored CMP intersections.
- ☐ Mainline freeway monitoring locations where the project will add 150 or more trips, in either direction, during either the AM or PM weekday peak hours.
- ☐ Caltrans must also be consulted through the Notice of Preparation (NOP) process to identify other specific locations to be analyzed on the state highway system.

**If the TIA identifies no facilities for study based on these criteria, no further traffic analysis is required. However, projects must still consider transit impacts (Section D.8.4).**

### D.5 BACKGROUND TRAFFIC CONDITIONS

The following sections describe the procedures for documenting and estimating background, or non-project related traffic conditions. Note that for the purpose of a TIA, these background estimates must include traffic from all sources without regard to the exemptions specified in CMP statute (e.g., traffic generated by the provision of low and very low income housing, or trips originating outside Los Angeles County. Refer to Chapter 5, Section 5.2.3 for a complete list of exempted projects).

**D.5.1 Existing Traffic Conditions.** Existing traffic volumes and levels of service (LOS) on the CMP highway system within the study area must be documented. Traffic counts must



be less than one year old at the time the study is initiated, and collected in accordance with CMP highway monitoring requirements (see Appendix A). Section D.8.1 describes TIA LOS calculation requirements in greater detail. Freeway traffic volume and LOS data provided by Caltrans is also provided in Appendix A.

**D.5.2 Selection of Horizon Year and Background Traffic Growth.** Horizon year(s) selection is left to the lead agency, based on individual characteristics of the project being analyzed. In general, the horizon year should reflect a realistic estimate of the project completion date. For large developments phased over several years, review of intermediate milestones prior to buildout should also be considered.

At a minimum, horizon year background traffic growth estimates must use the generalized growth factors shown in Exhibit D-1. These growth factors are based on regional modeling efforts, and estimate the general effect of cumulative development and other socioeconomic changes on traffic throughout the region. Beyond this minimum, selection among the various methodologies available to estimate horizon year background traffic in greater detail is left to the lead agency. Suggested approaches include consultation with the jurisdiction in which the intersection under study is located, in order to obtain more detailed traffic estimates based on ongoing development in the vicinity.

## **D.6 PROPOSED PROJECT TRAFFIC GENERATION**

Traffic generation estimates must conform to the procedures of the current edition of Trip Generation, by the Institute of Transportation Engineers (ITE). If an alternative methodology is used, the basis for this methodology must be fully documented.

Increases in site traffic generation may be reduced for existing land uses to be removed, if the existing use was operating during the year the traffic counts were collected. Current traffic generation should be substantiated by actual driveway counts; however, if infeasible, traffic may be estimated based on a methodology consistent with that used for the proposed use.

Regional transportation impact analysis also requires consideration of trip lengths. Total site traffic generation must therefore be divided into work and non-work-related trip purposes in order to reflect observed trip length differences. Exhibit D-2 provides factors which indicate trip purpose breakdowns for various land use types.

For lead agencies who also participate in CMP highway monitoring, it is recommended that any traffic counts on CMP facilities needed to prepare the TIA should be done in the manner outlined in Chapter 2 and Appendix A. If the TIA traffic counts are taken within one year of the deadline for submittal of CMP highway monitoring data, the local jurisdiction would save the cost of having to conduct the traffic counts twice.

## **D.7 TRIP DISTRIBUTION**

For trip distribution by direct/manual assignment, generalized trip distribution factors are provided in Exhibit D-3, based on regional modeling efforts. These factors indicate Regional Statistical Area (RSA)-level tripmaking for work and non-work trip purposes.

(These RSAs are illustrated in Exhibit D-4.) For locations where it is difficult to determine the project site RSA, census tract/RSA correspondence tables are available from MTA.

Exhibit D-5 describes a general approach to applying the preceding factors. Project trip distribution must be consistent with these trip distribution and purpose factors; the basis for variation must be documented.

Local agency travel demand models disaggregated from the SCAG regional model are presumed to conform to this requirement, as long as the trip distribution functions are consistent with the regional distribution patterns. For retail commercial developments, alternative trip distribution factors may be appropriate based on the market area for the specific planned use. Such market area analysis must clearly identify the basis for the trip distribution pattern expected.

## **D.8 IMPACT ANALYSIS**

CMP Transportation Impact Analyses contain two separate impact studies covering roadways and transit. Section Nos. D.8.1-D.8.3 cover required roadway analysis while Section No. D.8.4 covers the required transit impact analysis. Section Nos. D.9.1-D.9.4 define the requirement for discussion and evaluation of alternative mitigation measures.

**D.8.1 Intersection Level of Service Analysis.** The LA County CMP recognizes that individual jurisdictions have wide ranging experience with LOS analysis, reflecting the variety of community characteristics, traffic controls and street standards throughout the county. As a result, the CMP acknowledges the possibility that no single set of assumptions should be mandated for all TIAs within the county.

However, in order to promote consistency in the TIAs prepared by different jurisdictions, CMP TIAs must conduct intersection LOS calculations using either of the following methods:

- ☐ The Intersection Capacity Utilization (ICU) method as specified for CMP highway monitoring (see Appendix A); or
- ☐ The Critical Movement Analysis (CMA) / Circular 212 method.

Variation from the standard assumptions under either of these methods for circumstances at particular intersections must be fully documented.

TIAs using the 1985 or 1994 Highway Capacity Manual (HCM) operational analysis must provide converted volume-to-capacity based LOS values, as specified for CMP highway monitoring in Appendix A.

**D.8.2 Arterial Segment Analysis.** For TIAs involving arterial segment analysis, volume-to-capacity ratios must be calculated for each segment and LOS values assigned using the V/C-LOS equivalency specified for arterial intersections. A capacity of 800 vehicles per hour per through traffic lane must be used, unless localized conditions necessitate alternative values to approximate current intersection congestion levels.

**D.8.3 Freeway Segment (Mainline) Analysis.** For the purpose of CMP TIAs, a simplified analysis of freeway impacts is required. This analysis consists of a demand-to-capacity calculation for the affected segments, and is indicated in Exhibit D-6.

**D.8.4 Transit Impact Review.** CMP transit analysis requirements are met by completing and incorporating into an EIR the following transit impact analysis:

- ☐ Evidence that affected transit operators received the Notice of Preparation.
- ☐ A summary of existing transit services in the project area. Include local fixed-route services within a ¼ mile radius of the project; express bus routes within a 2 mile radius of the project, and; rail service within a 2 mile radius of the project.
- ☐ Information on trip generation and mode assignment for both AM and PM peak hour periods as well as for daily periods. Trips assigned to transit will also need to be calculated for the same peak hour and daily periods. Peak hours are defined as 7:30-8:30 AM and 4:30-5:30 PM. Both “peak hour” and “daily” refer to average weekdays, unless special seasonal variations are expected. If expected, seasonal variations should be described.
- ☐ Documentation of the assumption and analyses that were used to determine the number and percent of trips assigned to transit. Trips assigned to transit may be calculated along the following guidelines:
  - Multiply the total trips generated by 1.4 to convert vehicle trips to person trips;
  - For each time period, multiply the result by one of the following factors:
    - 3.5% of Total Person Trips Generated for most cases, except:
      - 10% primarily Residential within 1/4 mile of a CMP transit center
      - 15% primarily Commercial within 1/4 mile of a CMP transit center
      - 7% primarily Residential within 1/4 mile of a CMP multi-modal transportation center
      - 9% primarily Commercial within 1/4 mile of a CMP multi-modal transportation center
      - 5% primarily Residential within 1/4 mile of a CMP transit corridor
      - 7% primarily Commercial within 1/4 mile of a CMP transit corridor
      - 0% if no fixed route transit services operate within one mile of the project

To determine whether a project is primarily residential or commercial in nature, please refer to the CMP land use categories listed and defined in Appendix E, *Guidelines for New Development Activity Tracking and Self Certification*. For projects that are only partially within the above one-quarter mile radius, the base rate (3.5% of total trips generated) should be applied to all of the project buildings that touch the radius perimeter.

- ☐ Information on facilities and/or programs that will be incorporated in the development plan that will encourage public transit use. Include not only the jurisdiction’s TDM Ordinance measures, but other project specific measures.

- ☐ Analysis of expected project impacts on current and future transit services and proposed project mitigation measures, and;
- ☐ Selection of final mitigation measures remains at the discretion of the local jurisdiction/lead agency. Once a mitigation program is selected, the jurisdiction self-monitors implementation through the existing mitigation monitoring requirements of CEQA.

## D.9 IDENTIFICATION AND EVALUATION OF MITIGATION

**D.9.1 Criteria for Determining a Significant Impact.** For purposes of the CMP, a significant impact occurs when the proposed project increases traffic demand on a CMP facility by 2% of capacity ( $V/C \geq 0.02$ ), causing LOS F ( $V/C > 1.00$ ); if the facility is already at LOS F, a significant impact occurs when the proposed project increases traffic demand on a CMP facility by 2% of capacity ( $V/C \geq 0.02$ ). The lead agency may apply a more stringent criteria if desired.

**D.9.2 Identification of Mitigation.** Once the project has been determined to cause a significant impact, the lead agency must investigate measures which will mitigate the impact of the project. Mitigation measures proposed must clearly indicate the following:

- ☐ Cost estimates, indicating the fair share costs to mitigate the impact of the proposed project. If the improvement from a proposed mitigation measure will exceed the impact of the project, the TIA must indicate the proportion of total mitigation costs which is attributable to the project. This fulfills the statutory requirement to exclude the costs of mitigating inter-regional trips.
- ☐ Implementation responsibilities. Where the agency responsible for implementing mitigation is not the lead agency, the TIA must document consultation with the implementing agency regarding project impacts, mitigation feasibility and responsibility.

Final selection of mitigation measures remains at the discretion of the lead agency. The TIA must, however, provide a summary of impacts and mitigation measures. Once a mitigation program is selected, the jurisdiction self-monitors implementation through the mitigation monitoring requirements contained in CEQA.

**D.9.3 Project Contribution to Planned Regional Improvements.** If the TIA concludes that project impacts will be mitigated by anticipated regional transportation improvements, such as rail transit or high occupancy vehicle facilities, the TIA must document:

- ☐ Any project contribution to the improvement, and
- ☐ The means by which trips generated at the site will access the regional facility.

**D.9.4 Transportation Demand Management (TDM).** If the TIA concludes or assumes that project impacts will be reduced through the implementation of TDM measures, the TIA must document specific actions to be implemented by the project which substantiate these conclusions.

---

**D.10 REFERENCES**

1. *Traffic Access and Impact Studies for Site Development: A Recommended Practice*, Institute of Transportation Engineers, 1991.
2. *Trip Generation*, 5th Edition, Institute of Transportation Engineers, 1991.
3. *Travel Forecast Summary: 1987 Base Model - Los Angeles Regional Transportation Study (LARTS)*, California State Department of Transportation (Caltrans), February 1990.
4. *Traffic Study Guidelines*, City of Los Angeles Department of Transportation (LADOT), July 1991.
5. *Traffic/Access Guidelines*, County of Los Angeles Department of Public Works.
6. *Building Better Communities*, Sourcebook, Coordinating Land Use and Transit Planning, American Public Transit Association.
7. *Design Guidelines for Bus Facilities*, Orange County Transit District, 2nd Edition, November 1987.
8. *Coordination of Transit and Project Development*, Orange County Transit District, 1988.
9. *Encouraging Public Transportation Through Effective Land Use Actions*, Municipality of Metropolitan Seattle, May 1987.

## ADJACENT CONSTRUCTION DESIGN MANUAL

## 1.0 INTRODUCTION

1.1 Parties planning construction over, under or adjacent to a Metropolitan Transportation Authority (MTA) facilities or structures are advised to submit for review ~~seven (7)~~ **two (2) hard** copies **and one (1) electronic copy** of their **design** drawings and ~~four (4)~~ copies of their calculations showing the relationship between their project and the MTA facilities, for MTA review. The purpose of the MTA review is to reduce the chance of conflict, damage, and unnecessary remedial measures for both MTA and the parties. Parties are defined as developers, agencies, municipalities, property owners or similar organizations proposing to perform or sponsor construction work near MTA facilities.

1.2 Sufficient drawings and details shall be submitted at each level of completion such as Preliminary, In-Progress, Pre-final and Final, etc. to facilitate the review of the effects that the proposed project may or may not have on the MTA facilities. An MTA review requires internal circulation of the construction drawings to concerned departments (~~usually includes Construction, Operations, Maintenance, and Real Estate~~) **for MTA departments review**. Parties shall be responsible for all costs related to ~~MTA drawing reviews by MTA~~. MTA costs shall be based upon the actual hours taken for review at the hourly rate of pay plus overhead charges. Drawings normally required for review are:

- A. Site Plan
- B. Drainage Area Maps and Drainage Calculations
- C. Architectural drawings
- D. Structural drawings and calculations
- E. Civil Drawings
- F. Utility Drawings
- G. Sections showing Foundations and MTA Structures
- H. Column Load Tables
- I. Pertinent Drawings and calculations detailing an impact on MTA facilities
- J. A copy of the Geotechnical Report.
- K. Construction zone traffic safety and detour plans: Provide and regulate positive traffic guidance and definition for vehicular and pedestrian traffic adjacent to the construction site to ensure traffic safety and reduce adverse traffic circulation impact.
- L. Drawings and calculations should be sent to:

**MTA Third Party Administration (Permits Administration)**  
**Los Angeles County Metropolitan Transportation Authority**  
One Gateway Plaza  
Los Angeles, California 90012

- 1.3 If uncertainty exists on the possible impacts a project may have on the MTA facilities, and before submitting a formal letter requesting a review of a construction project adjacent to the Metro System, the party or his agent may contact the MTA Third Party Administrator (Permits). The Party shall review the complexity of the project, and **contact MTA to** receive an informal evaluation of the amount of detail required for the MTA review. In those cases, whereby it appears the project will present no risk to MTA, the Third Party Administrator (Permits) shall immediately route the design documents to **Engineering**, Construction, Operations, Maintenance, and Real Estate departments for a preliminary evaluation. If it is then confirmed that MTA risk is not present, the Administrator shall process an approval letter to the party.
- 1.4 A period of 30 working days should be allowed for review of the drawings and calculations. Thirty (30) work days should be allowed for each successive review as required. It is noted that preliminary evaluations are usually produced within 5 working days.
- 1.5 The party shall reimburse the MTA for any technical review or support services costs incurred that are associated with his/her request for access to the Metro **Transit**Rail System
- 1.6 The following items must be completed before starting any construction:
- A. Each part of the project's design may be reviewed and approved by the MTA. The prime concern of the MTA is to determine the effect of the project on the MTA structure and its transit operations. A few of the other parts of a project to be considered are overhead protection, dust protection, dewatering, and temporary use of public space for construction activities.
  - B. Once the Party has received written acceptance of the design of a given project then the Party must notify MTA prior to the start of construction, in accordance with the terms of acceptance.
- 1.7 Qualified Seismic, Structural and Geotechnical Oversight
- The design documents shall note the name of the responsible Structural Engineer and Geotechnical Engineer, licensed in the State of California.

## 2.0 REVIEW PROCEDURE

- 2.1 All portions of any proposed design that will have a direct impact on an MTA facility or structure will be reviewed to assure that the MTA facility or structure is not placed in risk at any time, and that the design meets all applicable codes and criteria. Any portion of the proposed design that is to form part of an MTA controlled area shall be designed to meet the MTA Design Criteria and Standards.
- 2.2 Permits, where required by the local jurisdiction, shall be the responsibility of the party. City of L.A. Dept. of Bldg. and Safety and the Bureau of Engineering permit review shall remain in effect. Party shall refer to MTA Third Party Administration policies and procedures, THD5 for additional information.
- 2.3 Monitoring of the temporary support of excavation structures for adjacent construction shall be required in all cases for excavations within the geotechnical zone of influence of MTA structures. The extent of the monitoring will vary from case to case.

- 2.4 Monitoring of the inside of MTA tunnels and structures shall be required when the adjacent excavation will unload or load the MTA structure or tunnel. Monitoring of vertical and horizontal distortions will include use of extensometers, inclinometers, settlement reference points, tiltmeters, groundwater observation wells, tape extensometer anchor points and load cells, as appropriately required. Acceptable limits of movement will depend on groundwater conditions, soil types and also the length of service the stations and tunnels have gone through. Escorts will be required for the survey parties entering the Metro operating system in accordance with MTA Operating Rules and Procedures. An MTA account number will be established and the costs for the escort monitoring and surveying service will be billed directly to the party or his agent as in section 1.2.
- 2.5 The calculations submitted for review shall include the following:
- A. A concise statement of the problem and the purpose of the calculation.
  - B. Input data, applicable criteria, clearly stated assumptions and justifying rationale.
  - C. References to articles, manuals and source material shall be furnished with the calculations.
  - D. Reference to pertinent codes and standards.
  - E. Sufficient sketches or drawing references for the work to be easily understood by an independent reviewer. Diagrams indicating data (such as loads and dimensions) shall be included along with adequate sketches of all details not considered standard by MTA.
  - F. The source or derivation of all equations shall be shown where they are introduced into the calculations.
  - G. Numerical calculations shall clearly indicate type of measurement unit used.
  - H. Identify results and conclusions.
  - I. Calculations shall be neat, orderly, and legible.
- 2.6 When computer programs are used to perform calculations, the following information shall accompany the calculation, including the following:
- A. Program Name.
  - B. Program Abstract.
  - C. Program Purpose and Applications.
  - D. Complete descriptions of assumptions, capabilities and limitations.
  - E. Instructions for preparing problem data.
  - F. Instructions for problem execution.
  - G. List (and explanation) of program acronyms and error messages.
  - H. Description of deficiencies or uncorrected errors.
  - I. Description of output options and interpretations.
  - J. Sample problem(s), illustrating all input and output options and hardware execution statements. Typically, these problems shall be verified problems.
  - K. Computer printout of all supporting calculations.



- L. The "User's Manual" shall also include a certification section. The certification section shall describe the methods and how they cover the permitted options and uses of the program.
- 2.7 Drawings shall be drawn, to scale, showing the location and relationship of proposed adjacent construction to existing MTA structures at various stages of construction along the entire adjacent alignment. The stresses and deflections induced in the existing MTA structures should be provided.
- 2.8 The short-term and long-term effects of the new loading due to the adjacent construction on the MTA structures shall be provided. The soil parameters and other pertinent geotechnical criteria contained in existing contract documents for the affected structure, plus any additional conditions shall be used to analyze the existing MTA structures.
- 2.9 MTA structures shall be analyzed for differential pressure loadings transferred from the adjacent construction site.

### 3.0 MECHANICAL CRITERIA

- 3.1 Existing services to MTA facilities, including chilled water and condenser water piping, potable and fire water, storm and sanitary sewer, piping, are not to be used, interrupted nor disturbed without written approval of MTA.
- 3.2 Surface openings of ventilation shafts, emergency exits serving MTA underground facilities, and ventilation system openings of surface and elevated facilities are not to be blocked or restricted in any manner. Construction dust shall be prevented from entering MTA facilities.
- 3.3 Hot or foul air, fumes, smoke, steam, etc., from adjacent new or temporary facilities are not to be discharged within 40 feet of existing MTA ventilation system intake shafts, station entrances or portals. Tunnel ventilation shafts are both intake and discharge structures.
- 3.4 Clear access for the fire department to the MTA fire department connections shall be maintained at all times. Construction signs shall be provided to identify the location of MTA fire department connections. No interruption to fire protection water service will be permitted at any time.
- 3.5 Modifications to existing MTA mechanical systems and equipment, including ventilation shafts, required by new connections into the MTA System, shall only be permitted with prior review and approval by MTA. If changes are made to MTA property as built drawings shall be provided reflecting these changes.

At the option of MTA, the adjacent construction party shall be required to perform the field tests necessary to verify the adequacy of the modified system and the equipment performance. This verification shall be performed within an agreed time period jointly determined by MTA and the Party on a case by case basis. Where a modification is approved, the party shall be held responsible to maintain original operating capacity of the equipment and the system impacted by the modification.

## 4.0 OPERATIONAL REQUIREMENTS

### 4.1 GENERAL

- A. Normal construction practices must be augmented to insure adequate safety for the general public entering Metro Stations and riding on Metro Trains and Buses. Design of a building, structure, or facility shall take into account the special safety considerations required for the construction of the facility next to or around an operating transit system.
- B. Projects which require working over or adjacent to MTA station entrances shall develop their construction procedures and sequences of work to meet the following minimum requirements:
  - 1. Construction operations shall be planned, scheduled and carried out in a way that will afford the Metro patrons and the general public a clean, safe and orderly access and egress to the station entrance during revenue hours.
  - 2. Construction activities which involve swinging a crane and suspended loads over pedestrian areas, MTA station entrances and escalators, tracks or Metro bus passenger areas shall not be performed during revenue hours. Specific periods or hours shall be granted on a case-by-case basis, **with the approval of Construction Work Plan by MTA Construction Safety Department.**
  - 3. All cranes must be stored and secured facing away from energized tracks, when appropriate.
  - 4. All activity must be coordinated through the MTA Track Allocation process in advance of work activity. **All members of the work crew will be required to attend MTA Safety Training.**
  - 5. **In order to provide a safe zone to maintain adjacent developments. All developments adjacent to Metro At-Grade Stations, Aerial Stations or Track Guideways shall provide a minimum 5 foot setback from the Metro and developer's shared property line to the outside face of the proposed structure at Metro or the developer's property for maintenance to be performed or installed from within the zone created by this setbacks.**

### 4.2 OVERHEAD PROTECTION - Station Entrances

- A. Overhead protection from falling objects shall be provided over MTA facilities whenever there is possibility, due to the nature of a construction operation, that an object could fall in or around MTA station entrances, bus stops, elevators, or areas designed for public access to MTA facilities. Erection of the overhead protection for these areas shall be done during MTA non-revenue hours.
  - 1. The design live load for all overhead protection shall be 150 pounds per square foot minimum. The design wind load on the temporary structures shall be 20 pounds per square foot, on the windward and leeward sides of the structure.
  - 2. The overhead protection shall be constructed of fire rated materials. Materials and equipment shall not be stored on the completed shield. The roof of the

shield shall be constructed and maintained watertight.

- B. Lighting in public areas and around affected MTA facilities shall be provided under the overhead protection to maintain a minimum level of twenty-five (25) footcandles at the escalator treads or at the walking surface. The temporary lighting shall be maintained by the Party.
- C. Wooden construction fencing shall be installed at the boundary of the areas with public access. The fencing shall be at least eight-feet high, and shall meet all applicable code requirements.
- D. An unrestricted public access path shall be provided at the upper landing of the entrance escalator-way in accordance with the following:
  - 1. A vertical clearance between the walking surface and the lowest projection of the shield shall be 8'-0".
  - 2. A clear pedestrian runoff area extending beyond the escalator newel shall be provided, the least dimension of which shall be twenty (20) feet.
  - 3. A fifteen (15) foot wide strip (other than the sidewalk) shall be maintained on the side of the escalator for circulation when the escalator is pointed away from a street corner.
  - 4. A clear path from any MTA emergency exit to the public street shall be maintained at all times.
- E. Temporary sidewalks or pedestrian ways, which will be in use more than 10 days, shall be constructed of four (4") inch thick Portland cement concrete or four (4") inches of asphaltic concrete placed **over a minimum four (4") inches of untreated base material**, and finished by a machine.

#### 4.3 OVERHEAD PROTECTION - Operating Right-of-Way Trackage

- A. MTA Rail Operations Control Center shall be informed of any intent to work above, on, or under the MTA right-of-way. Crews shall be trained and special flagging operations shall be directed by MTA Rail Operations Control Center. The party shall provide competent persons to serve as Flaggers. These Flaggers shall be trained and certified by MTA Rail Operations prior to any work commencing. All costs incurred by MTA shall be paid by the party.
- B. A construction project that will require work over, under or adjacent to the at grade and aerial MTA right-of-way should be aware that the operation of machinery, construction of scaffolding or any operation hazardous to the operation of the MTA facility shall require that the work be done during non-revenue hours and authorized through the MTA Track Allocation process.
- C. MTA flagmen or inspectors from MTA Operations shall observe all augering, pile driving or other work that is judged to be hazardous. Costs associated with the flagman or inspector shall be borne by the Party.

- D. The party shall request access rights or track rights to perform work during non-revenue hours. The request shall be made through the MTA Track Allocation process.-

#### 4.4 OTHER METRO FACILITIES

- A. Access and egress from the public streets to fan shafts, vent shafts and emergency exits must be maintained at all times. The shafts shall be protected from dust and debris. See Exhibit A for details.
- B. Any excavation in the vicinity of MTA power lines feeding the Metro System shall be through hand excavation and only after authorization has been obtained through the MTA Track Allocation process. MTA Rail Operations Control Center shall be informed before any operations commences near the MTA power system.
- C. Flammable liquids shall not to be stored over or within 25 feet horizontally of MTA underground facilities. If installed within 25 to 100 feet horizontally of the structure, protective encasement of the tanks shall be required in accordance with NFPA STD 130. Existing underground tanks located within 100 feet horizontally of MTA facilities and scheduled to be abandoned are to be disposed of in accordance with Appendix C of NFPA STD 130. NFPA STD 130 shall also be applied to the construction of new fuel tanks.

- D. Isolation of MTA Facilities from Blast

Subsurface areas of new adjacent private buildings where the public has access or that cannot be guaranteed as a secure area, such as parking garages and commercial storage and warehousing, will be treated as areas of potential explosion. NFPA 130, Standard for Fixed Guideway Transit Systems, life safety separation criteria will be applied that assumes such spaces contain Class I flammable, or Class II or Class III Combustible liquids. For structural and other considerations, isolation for blast will be treated the same as seismic separation, and the more restrictive shall be applied.

- E. Any proposed facility that is located within 20 feet radius of an existing Metro facility will require a blast and explosion study and recommendations to be conducted by a specialist who is specialized in the area of blast force attenuation. This study must assess the effect that an explosion in the proposed non-Metro facility will have on the adjacent Metro facility and provide recommendations to prevent any catastrophic damage to the existing Metro facility. Metro must approve the qualifications of the proposed specialist prior to commencement of any work on this specialized study.

#### 4.5 SAFETY REGULATIONS

- A. Comply with Cal/OSHA Compressed Air Safety Orders Title 8, Division 1, Chapter 4, Subchapter 3. Comply with California Code of Regulations Title 8, Title 29 Code of Federal Regulations; and/or the Construction Safety and Health Manual ( Part F ) of the contract whichever is most stringent in regulating the safety conditions to be maintained in the work environment as determined by the Authority. The Party recognizes that government promulgated safety regulations are minimum standards and that additional safeguards may be required

- B. Comply with the requirements of Chemical Hazards Safety and Health Plan, (per 29 CFR 1910.120 entitled, ( Hazardous Waste Operations and Emergency Response) with respect to the handling of hazardous or contaminated wastes and mandated specialty raining and health screening.
- C. Party and contractor personnel while within the operating MTA right-of-way shall coordinate all safety rules and procedures with MTA Rail Operations Control Center.
- D. When support functions and electrical power outages are required, the approval MUST be obtained through the MTA Track Allocation procedure. Approval of the support functions and power outages must be obtained in writing prior to shutdown.

## **5.0 CORROSION**

### **5.1 STRAY CURRENT PROTECTION**

- A. Because stray currents may be present in the area of the project, the Party shall investigate the site for stray currents and provide the means for mitigation when warranted.
- B. Installers of facilities that will require a Cathodic Protection (CP) system must coordinate their CP proposals with MTA. Inquiries shall be routed to the Manager, Third Party Administration.
- C. The Party is responsible for damage caused by its contractors to MTA corrosion test facilities in public right-of-way.

**End of Section**

RECORDING REQUESTED BY  
AND WHEN RECORDED MAIL TO:

LOS ANGELES COUNTY METROPOLITAN  
TRANSPORTATION AUTHORITY  
Real Estate Department  
Deputy Executive Officer - Real Estate  
P: 213-922-2415 F: 213-922-2400  
One Gateway Plaza, Mail Stop 99-18-4  
Los Angeles, CA 90012-2932

Space Above Line for Recorder's Use

---

[Recordation of this Public Document is Exempt from all Recording Fees and Taxes Pursuant to  
Government Code Section 6103]

Public Agency - No Tax Statement

**NOISE EASEMENT DEED**

For valuable consideration, receipt of which is hereby acknowledged, **(Name of Owner)**, a  
\_\_\_\_\_, for themselves, their heirs, administrators, executors,  
successors, assigns, tenants, and lessees do hereby grant, bargain, sell, and convey to the  
**LOS ANGELES COUNTY METROPOLITAN TRANSPORTATION AUTHORITY**, a public  
agency existing under the authority of the laws of the State of California ("Grantee"), its  
successors and assigns, for the use and benefit of the public and its employees, a perpetual,  
assignable easement in that certain real property in the City of Los Angeles, County of Los  
Angeles, State of California described in Exhibit "A" attached hereto and incorporated herein by  
this reference,

Said easement shall encompass and cover the entirety of the Grantors' Property  
having the same boundaries as the described Property and extending from the sub-  
surface upwards to the limits of the atmosphere of the earth, the right to cause in said  
easement area such noise, vibrations, fumes, dust, fuel particles, light, sonic  
disturbances, and all other effects that may be caused or may have been caused by  
the operation of public transit vehicles traveling along the Project right of way.

Grantor hereby waives all rights to protest, object to, make a claim or bring suit  
or action of any purpose, including or not limited to, property damage or personal  
injuries, against Grantee, its successors and assigns, for any necessary operating and  
maintenance activities and changes related to the Project which may conflict with  
Grantors' use of Grantors' property for residential and other purposes, and Grantors  
hereby grants an easement to the Grantee for such activities.

The granting of said Easement shall also establish the Grantors' right to further modify or  
develop the Property for any permitted use. However, Grantor's rights of development shall  
not interfere with the continued operation of Grantee's Project.

It is understood and agreed that these covenants and agreements shall be permanent, perpetual, will run with the land and that notice shall be made to and shall be binding upon all heirs, administrators, executors, successors, assigns, tenants and lessees of the Grantor. The Grantee is hereby expressly granted the right of third party enforcement of this easement.

IN WITNESS WHEREOF, the undersigned has caused its/their signature to be affixed this day of \_\_\_\_\_, 20\_\_\_\_

By: \_\_\_\_\_  
Name

By: \_\_\_\_\_  
Name

(ATTACH NOTARY SEAL AND CERTIFICATE HERE.)

**CALIFORNIA ALL-PURPOSE ACKNOWLEDGMENT****CIVIL CODE § 1189**

A notary public or other officer completing this certificate verifies only the identity of the individual who signed the document to which this certificate is attached, and not the truthfulness, accuracy, or validity of that document.

State of California )

County of \_\_\_\_\_ )

On \_\_\_\_\_ before me, \_\_\_\_\_,

Date

Here Insert Name and Title of the Officer

personally appeared \_\_\_\_\_

Name(s) of Signer(s)

who proved to me on the basis of satisfactory evidence to be the person(s) whose name(s) is/are subscribed to the within instrument and acknowledged to me that he/she/they executed the same in his/her/their authorized capacity(ies), and that by his/her/their signature(s) on the instrument the person(s), or the entity upon behalf of which the person(s) acted, executed the instrument.

I certify under PENALTY OF PERJURY under the laws of the State of California that the foregoing paragraph is true and correct.

WITNESS my hand and official seal.

Signature \_\_\_\_\_

Signature of Notary Public

Place Notary Seal Above

**OPTIONAL**

Though this section is optional, completing this information can deter alteration of the document or fraudulent reattachment of this form to an unintended document.

**Description of Attached Document**

Title or Type of Document: \_\_\_\_\_ Document Date: \_\_\_\_\_

Number of Pages: \_\_\_\_\_ Signer(s) Other Than Named Above: \_\_\_\_\_

**Capacity(ies) Claimed by Signer(s)**

Signer's Name: \_\_\_\_\_

☐ Corporate Officer — Title(s): \_\_\_\_\_☐ Partner — ☐ Limited ☐ General☐ Individual ☐ Attorney in Fact☐ Trustee ☐ Guardian or Conservator☐ Other: \_\_\_\_\_

Signer Is Representing: \_\_\_\_\_

Signer's Name: \_\_\_\_\_

☐ Corporate Officer — Title(s): \_\_\_\_\_☐ Partner — ☐ Limited ☐ General☐ Individual ☐ Attorney in Fact☐ Trustee ☐ Guardian or Conservator☐ Other: \_\_\_\_\_

Signer Is Representing: \_\_\_\_\_



## CERTIFICATE OF ACCEPTANCE

This is to certify that the interest in the real property conveyed by the foregoing Grant Deed from \_\_\_\_\_, a **California Limited Partnership**, ("Grantor") to **LOS ANGELES COUNTY METROPOLITAN TRANSPORTATION AUTHORITY**, a public agency existing under the authority of the laws of the State of California ("LACMTA"), is hereby accepted by the undersigned on behalf of the LACMTA pursuant to authority conferred by resolution of the Board of Directors of the LACMTA, and the Grantee hereby consents to the recordation of this Deed by its duly authorized officer.

Dated this \_\_\_\_ day of \_\_\_\_\_, 20\_\_

By: \_\_\_\_\_  
Velma C. Marshall  
Deputy Executive Officer - Real Estate



Appendix

## Appendix B. Updated Air Quality Modeling Data and SCAQMD Correspondence

## Appendix

*This page intentionally left blank.*

## Regional Construction Emissions Worksheet: Phase 2 Construction for Overlap w/Phase 1 Operation Scenario

### P2 Building Construction

		ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Onsite	<b>2021</b>						
	Off-Road	1.9009	17.4321	16.5752	0.0269	0.9586	0.9013
	Total	<b>1.9009</b>	<b>17.4321</b>	<b>16.5752</b>	<b>0.0269</b>	<b>0.9586</b>	<b>0.9013</b>
Offsite	Hauling	0	0	0	0	0	0
	Vendor	0.5042	15.3401	4.4362	0.0406	0.9791	0.3063
	Worker	1.8024	1.2328	15.2249	0.0432	3.9287	1.0708
	Total	<b>2.3066</b>	<b>16.5413</b>	<b>19.2352</b>	<b>0.0838</b>	<b>4.9078</b>	<b>1.3771</b>
	<b>TOTAL</b>	<b>4.2075</b>	<b>33.9734</b>	<b>35.8104</b>	<b>0.1107</b>	<b>5.8664</b>	<b>2.2784</b>
		ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Onsite	<b>2022</b>						
	Off-Road	1.7062	15.6156	16.3634	0.0269	0.809	0.7612
	Total	<b>1.7062</b>	<b>15.6156</b>	<b>16.3634</b>	<b>0.0269</b>	<b>0.809</b>	<b>0.7612</b>
Offsite	Hauling	0	0	0	0	0	0
	Vendor	0.4733	14.5882	4.1992	0.0402	0.975	0.3024
	Worker	1.6928	1.1134	14.0466	0.0417	3.9276	1.0699
	Total	<b>2.1661</b>	<b>15.6619</b>	<b>17.841</b>	<b>0.0819</b>	<b>4.9027</b>	<b>1.3723</b>
	<b>TOTAL</b>	<b>3.8723</b>	<b>31.2775</b>	<b>34.2044</b>	<b>0.1088</b>	<b>5.7117</b>	<b>2.1335</b>
		ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Onsite	<b>2023</b>						
	Off-Road	1.5728	14.3849	16.244	0.0269	0.6997	0.6584
	Total	<b>1.5728</b>	<b>14.3849</b>	<b>16.244</b>	<b>0.0269</b>	<b>0.6997</b>	<b>0.6584</b>
Offsite	Hauling	0	0	0	0	0	0
	Vendor	0.3516	11.069	3.7313	0.0389	0.9602	0.2882
	Worker	1.5948	1.007	12.9357	0.0401	3.9267	1.069
	Total	<b>1.9465</b>	<b>12.0257</b>	<b>16.3624</b>	<b>0.0791</b>	<b>4.8869</b>	<b>1.3572</b>
	<b>TOTAL</b>	<b>3.5193</b>	<b>26.4106</b>	<b>32.6064</b>	<b>0.1060</b>	<b>5.5866</b>	<b>2.0156</b>
		ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Onsite	<b>2024</b>						
	Off-Road	1.4716	13.4438	16.1668	0.027	0.6133	0.5769
	Total	<b>1.4716</b>	<b>13.4438</b>	<b>16.1668</b>	<b>0.027</b>	<b>0.6133</b>	<b>0.5769</b>
Offsite	Hauling	0	0	0	0	0	0
	Vendor	0.343	11.0267	3.6182	0.0387	0.96	0.288
	Worker	1.5134	0.9181	12.059	0.0389	3.9262	1.0685
	Total	<b>1.8564</b>	<b>11.8973</b>	<b>15.3814</b>	<b>0.0776</b>	<b>4.8862</b>	<b>1.3565</b>
	<b>TOTAL</b>	<b>3.3280</b>	<b>25.3411</b>	<b>31.5482</b>	<b>0.1046</b>	<b>5.4995</b>	<b>1.9334</b>
		ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Onsite	<b>2025</b>						
	Off-Road	1.3674	12.4697	16.0847	0.027	0.5276	0.4963
	Total	<b>1.3674</b>	<b>12.4697</b>	<b>16.0847</b>	<b>0.027</b>	<b>0.5276</b>	<b>0.4963</b>
Offsite	Hauling	0	0	0	0	0	0
	Vendor	0.3342	10.9331	3.5258	0.0385	0.9597	0.2877
	Worker	1.4416	0.8398	11.2001	0.0374	3.9256	1.0679
	Total	<b>1.7758</b>	<b>11.726</b>	<b>14.4372</b>	<b>0.0759</b>	<b>4.8853</b>	<b>1.3557</b>
	<b>TOTAL</b>	<b>3.1432</b>	<b>24.1957</b>	<b>30.5219</b>	<b>0.1029</b>	<b>5.4129</b>	<b>1.8520</b>

P2 Architectural Coating								
			ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Onsite		2022						
	Archit. Coating		3.2781	0	0	0	0	0
	Off-Road		0.2045	1.4085	1.8136	0.00297	0.0817	0.0817
	Total		3.4826	1.4085	1.8136	0.00297	0.0817	0.0817
Offsite								
	Hauling		0	0	0	0	0	0
	Vendor		0	0	0	0	0	0
	Worker		0.3404	0.2239	2.8242	0.00838	0.7897	0.2151
	Total		0.3404	0.2239	2.8242	0.00838	0.7897	0.2151
TOTAL			3.8230	1.6324	4.6378	0.0114	0.8714	0.2968
P2 Building Construction & Coating (2022)			7.6953	32.9099	38.8422	0.1202	6.5831	2.4303
		2023	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Onsite								
	Archit. Coating		3.2781	0	0	0	0	0
	Off-Road		0.1917	1.303	1.8111	0.00297	0.0708	0.0708
	Total		3.4697	1.303	1.8111	0.00297	0.0708	0.0708
Offsite								
	Hauling		0	0	0	0	0	0
	Vendor		0	0	0	0	0	0
	Worker		0.3207	0.2025	2.6008	0.00807	0.7895	0.2149
	Total		0.3207	0.2025	2.6008	0.00807	0.7895	0.2149
TOTAL			3.7904	1.5055	4.4119	0.0110	0.8603	0.2857
P2 Building Construction & Coating (2023)			7.3097	27.9161	37.0183	0.1170	6.4469	2.3013
		2024	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Onsite								
	Archit. Coating		3.2781	0	0	0	0	0
	Off-Road		0.1808	1.2188	1.8101	0.00297	0.0609	0.0609
	Total		3.4588	1.2188	1.8101	0.00297	0.0609	0.0609
Offsite								
	Hauling		0	0	0	0	0	0
	Vendor		0	0	0	0	0	0
	Worker		0.3043	0.1846	2.4246	0.00782	0.7894	0.2148
	Total		0.3043	0.1846	2.4246	0.00782	0.7894	0.2148
TOTAL			3.7631	1.4034	4.2347	0.0108	0.8503	0.2757
P2 Building Construction & Coating (2024)			7.0911	26.7445	35.7829	0.1154	6.3498	2.2091
		2025	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Onsite								
	Archit. Coating		3.2781	0	0	0	0	0
	Off-Road		0.1709	1.1455	1.8091	0.00297	0.0515	0.0515
	Total		3.4489	1.1455	1.8091	0.00297	0.0515	0.0515
Offsite								
	Hauling		0	0	0	0	0	0
	Vendor		0	0	0	0	0	0
	Worker		0.2898	0.1689	2.2519	0.00752	0.7893	0.2147
	Total		0.2898	0.1689	2.2519	0.00752	0.7893	0.2147
TOTAL			3.7387	1.3144	4.0610	0.0105	0.8408	0.2662
P2 Building Construction & Coating (2025)			6.8819	25.5101	34.5829	0.1134	6.2537	2.1182

P2 Paving							
		ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Onsite	2025						
	Off-Road	0.9152	8.5816	14.578	0.0228	0.4185	0.385
	Paving	0.1734	0	0	0	0	0
	Total	1.0885	8.5816	14.578	0.0228	0.4185	0.385
Offsite	Hauling	0	0	0	0	0	0
	Vendor	0	0	0	0	0	0
	Worker	0.0572	0.0333	0.4445	0.00148	0.1558	0.0424
	Total	0.0572	0.0333	0.4445	0.00148	0.1558	0.0424
TOTAL		1.1457	8.6149	15.0225	0.0243	0.5743	0.4274
P2 Coating & Paving (2025)		4.8844	9.9293	19.0835	0.0348	1.4151	0.6936
MAX DAILY		7.70	33.97	38.84	0.12	6.58	2.43
Regional Thresholds		75	100	550	150	150	55
Exceeds Thresholds?		No	No	No	No	No	No

## Regional Operation Emissions Worksheet: Phase 1

### Existing - 2021

#### Maximum Emissions

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	36.561	0.131	2.175	0.005	0.251	0.251
Energy	1.964	17.853	14.987	0.107	1.357	1.357
Mobile	27.150	144.914	427.855	1.540	131.683	35.847
<b>Total</b>	<b>65.675</b>	<b>162.897</b>	<b>445.017</b>	<b>1.652</b>	<b>133.291</b>	<b>37.455</b>

#### Regional Thresholds

Exceeds Thresholds?	55 Yes	55 Yes	550 No	150 No	150 No	55 No
---------------------	-----------	-----------	-----------	-----------	-----------	----------

### Phase 1 Buildout - Year 2021

#### Remaining Existing Buildings

#### Max Daily

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	34.087	0.107	0.694	0.001	0.011	0.011
Energy	1.871	17.006	14.275	0.102	1.293	1.293
Mobile	17.936	95.737	282.661	1.017	86.996	23.682
<b>Total</b>	<b>53.894</b>	<b>112.849</b>	<b>297.630</b>	<b>1.120</b>	<b>88.300</b>	<b>24.986</b>

#### New Buildings

#### Max Daily

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	12.050	0.001	0.126	0.000	0.000	0.000
Energy	0.626	5.689	4.779	0.034	0.432	0.432
Mobile	7.174	38.292	113.058	0.407	34.796	9.472
<b>Total</b>	<b>19.850</b>	<b>43.983</b>	<b>117.962</b>	<b>0.441</b>	<b>35.229</b>	<b>9.905</b>

#### Combined

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	46.137	0.108	0.820	0.001	0.012	0.012
Energy	2.497	22.695	19.054	0.136	1.725	1.725
Mobile	25.111	134.029	395.718	1.424	121.792	33.154
<b>Total</b>	<b>73.744</b>	<b>156.832</b>	<b>415.592</b>	<b>1.561</b>	<b>123.529</b>	<b>34.891</b>

### Net Difference

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	9.576	-0.023	-1.356	-0.005	-0.240	-0.240
Energy	0.533	4.842	4.067	0.029	0.368	0.368
Mobile	-2.039	-10.885	-32.137	-0.116	-9.891	-2.693
<b>Total</b>	<b>8.069</b>	<b>-6.066</b>	<b>-29.425</b>	<b>-0.091</b>	<b>-9.762</b>	<b>-2.564</b>

SCAQMD Significance Thresholds  
Exceeds Thresholds?

55 No	55 No	550 No	150 No	150 No	55 No
----------	----------	-----------	-----------	-----------	----------



## Phase 1 Operation/Phase 2 Construction Overlap

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Phase 1 Operation Daily Maximum	8.069	-6.066	-29.425	-0.091	-9.762	-2.564
Phase 2 Construction Daily Maximum	7.695	33.973	38.842	0.120	6.583	2.430
<b>Total</b>	<b>15.764</b>	<b>27.908</b>	<b>9.417</b>	<b>0.029</b>	<b>-3.179</b>	<b>-0.134</b>
SCAQMD Significance Thresholds	55	55	550	150	150	55
<b>Exceeds Thresholds?</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>

## Regional Operation Emissions Worksheet: Phase 2

### Existing - 2025

#### Maximum Emissions

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	36.561	0.131	2.173	0.005	0.251	0.251
Energy	1.964	17.853	14.987	0.107	1.357	1.357
Mobile	21.220	93.436	334.355	1.350	131.407	35.590
<b>Total</b>	<b>59.745</b>	<b>111.420</b>	<b>351.515</b>	<b>1.463</b>	<b>133.015</b>	<b>37.198</b>

#### Regional Thresholds

Exceeds Thresholds?	55 Yes	55 Yes	550 No	150 No	150 No	55 No
---------------------	-----------	-----------	-----------	-----------	-----------	----------

### Phase 2 Buildout - Year 2025

#### Remaining Existing Buildings

#### Max Daily

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	31.548	0.107	0.680	0.001	0.011	0.011
Energy	1.833	16.661	13.986	0.100	1.266	1.266
Mobile	13.182	58.045	207.712	0.839	81.634	22.110
<b>Total</b>	<b>46.563</b>	<b>74.812</b>	<b>222.377</b>	<b>0.939</b>	<b>82.912</b>	<b>23.387</b>

#### New Buildings

#### Max Daily

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	18.848	0.002	0.206	0.000	0.001	0.001
Energy	1.054	9.582	8.049	0.058	0.728	0.728
Mobile	9.227	40.629	145.390	0.587	57.141	15.476
<b>Total</b>	<b>29.129</b>	<b>50.214</b>	<b>153.645</b>	<b>0.645</b>	<b>57.870</b>	<b>16.205</b>

#### Combined

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	50.395	0.108	0.886	0.001	0.012	0.012
Energy	2.887	26.243	22.035	0.158	1.995	1.995
Mobile	22.410	98.675	353.102	1.426	138.775	37.586
<b>Total</b>	<b>75.692</b>	<b>125.026</b>	<b>376.022</b>	<b>1.584</b>	<b>140.781</b>	<b>39.592</b>

### Net Difference

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	13.835	-0.022	-1.287	-0.005	-0.239	-0.239
Energy	0.923	8.390	7.048	0.050	0.638	0.638
Mobile	1.190	5.239	18.746	0.076	7.367	1.996
<b>Total</b>	<b>15.947</b>	<b>13.606</b>	<b>24.507</b>	<b>0.121</b>	<b>7.766</b>	<b>2.394</b>

SCAQMD Significance Thresholds  
Exceeds Thresholds?

55 No	55 No	550 No	150 No	150 No	55 No
----------	----------	-----------	-----------	-----------	----------

## Stationary Equipment - Boiler

### Max Daily

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	0.00001	0.00000	0.00010	0.00000	0.00000	0.00000
Energy	0.000	0.000	0.000	0.000	0.000	0.000
Mobile	0.000	0.000	0.000	0.000	0.000	0.000
Stationary	0.711	1.450	12.662	0.078	0.982	0.982
<b>Total</b>	<b>0.711</b>	<b>1.450</b>	<b>12.663</b>	<b>0.078</b>	<b>0.982</b>	<b>0.982</b>

### Phase 2 Operation/Phase 3 Construction Overlap

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Phase 2 Operation	15.947	13.606	24.507	0.121	7.766	2.394
Phase 3 Construction Daily Maximum	6.176	28.495	27.062	0.066	9.009	5.300
<b>Total</b>	<b>22.123</b>	<b>42.102</b>	<b>51.569</b>	<b>0.188</b>	<b>16.775</b>	<b>7.694</b>

SCAQMD Significance Thresholds	55	55	550	150	150	55
<b>Exceeds Thresholds?</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>

## Regional Operation Emissions Worksheet: Phase 3

### Existing - 2030

#### Maximum Emissions

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	36.561	0.131	2.171	0.005	0.251	0.251
Energy	1.964	17.853	14.987	0.107	1.357	1.357
Mobile	17.587	81.996	269.131	1.195	131.161	35.368
<b>Total</b>	<b>56.111</b>	<b>99.980</b>	<b>286.290</b>	<b>1.307</b>	<b>132.770</b>	<b>36.976</b>
<b>Regional Thresholds</b>	<b>55</b>	<b>55</b>	<b>550</b>	<b>150</b>	<b>150</b>	<b>55</b>
Exceeds Thresholds?	Yes	Yes	No	No	No	No

### Phase 3 Buildout - Year 2030

#### Remaining Existing Buildings

#### Max Daily

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	28.090	0.106	0.663	0.001	0.011	0.011
Energy	1.657	15.059	12.640	0.090	1.145	1.145
Mobile	10.383	48.411	158.898	0.705	77.439	20.881
<b>Total</b>	<b>40.130</b>	<b>63.576</b>	<b>172.201</b>	<b>0.796</b>	<b>78.595</b>	<b>22.037</b>

#### New Buildings

#### Max Daily

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	27.029	0.002	0.240	0.000	0.001	0.001
Energy	1.478	13.433	11.284	0.081	1.021	1.021
Mobile	11.051	51.523	169.110	0.751	82.416	22.223
<b>Total</b>	<b>39.558</b>	<b>64.958</b>	<b>180.634</b>	<b>0.831</b>	<b>83.438</b>	<b>23.245</b>

#### Combined

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	55.120	0.109	0.904	0.001	0.012	0.012
Energy	3.134	28.492	23.924	0.171	2.166	2.166
Mobile	21.434	99.934	328.007	1.456	159.855	43.105
<b>Total</b>	<b>79.688</b>	<b>128.534</b>	<b>352.835</b>	<b>1.628</b>	<b>162.032</b>	<b>45.282</b>

### Net Difference

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Area	18.559	-0.022	-1.268	-0.005	-0.239	-0.239
Energy	1.170	10.639	8.937	0.064	0.809	0.809
Mobile	3.847	17.938	58.876	0.261	28.693	7.737
<b>Total</b>	<b>23.577</b>	<b>28.555</b>	<b>66.545</b>	<b>0.320</b>	<b>29.263</b>	<b>8.307</b>

SCAQMD Significance Thresholds  
Exceeds Thresholds?

55	55	550	150	150	55
No	No	No	No	No	No

### Phase 3 Operation/Phase 4 Construction Overlap

	ROG	NOx	CO	SO2	PM10 Total	PM2.5 Total
Phase 3 Operation	23.577	28.555	66.545	0.320	29.263	8.307
Phase 4 Construction Daily Maximum	4.519	14.287	23.578	0.073	8.359	4.736
<b>Total</b>	<b>28.096</b>	<b>42.842</b>	<b>90.123</b>	<b>0.394</b>	<b>37.621</b>	<b>13.043</b>
SCAQMD Significance Thresholds	55	55	550	150	150	55
<b>Exceeds Thresholds?</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>	<b>No</b>

## Nicole Morse

---

**From:** John Vang  
**Sent:** Wednesday, January 10, 2018 10:17 AM  
**To:** Nicole Morse; Ryan Banuelos; Jason Golding  
**Cc:** Nicole Vermilion; Michael Krause; Lijin Sun  
**Subject:** RE: City of Hope Campus Plan Draft EIR - Data Request

**Follow Up Flag:** Follow up  
**Flag Status:** Flagged

Good Morning All,

Ryan and I spoke and cleared up matters regarding the data files. He should have all the data files to move forward with his review.

Thank you,

**JOHN VANG, JD**  
Associate Planner

3 MacArthur Place, Suite 1100 | Santa Ana, California 92707  
714.966.9220 | placeworks.com

---

**From:** Nicole Morse  
**Sent:** Wednesday, January 10, 2018 9:54 AM  
**To:** Ryan Banuelos; Jason Golding  
**Cc:** Nicole Vermilion; Michael Krause; Lijin Sun; John Vang  
**Subject:** RE: City of Hope Campus Plan Draft EIR - Data Request



Hi Ryan and Jason,

We did not prepare an operational HRA. I've asked John Vang to call Ryan to address any missing data files or questions.

**NICOLE MORSE, Esq.**  
Associate Principal

3 MacArthur Place, Suite 1100 | Santa Ana, California 92707  
714.966.9220 | placeworks.com

---

**From:** Ryan Banuelos  
**Sent:** Tuesday, January 9, 2018 5:48 PM



**To:** Jason Golding  
**Cc:** Nicole Vermilion; Nicole Morse; Michael Krause; Lijin Sun  
**Subject:** RE: City of Hope Campus Plan Draft EIR - Data Request

Hi Jason,

Thanks for the follow-up e-mail. After conducting the initial review of the files we received last week, we found that the HRA files are missing the operational HRA analysis and related calculation files and mitigated construction HRA files. Typically, it requires a week, at a minimum, to review a complete set of files. Given the Planning Commission will consider this project on January 16, 2017, please provide to us the above-mentioned missing files at your earliest convenience.

Please note that our office is closed on Mondays.

Thank you,  
Ryan Bañuelos  
Air Quality Specialist, CEQA  
South Coast Air Quality Management District  
21865 Copley Drive  
Diamond Bar, CA 91765  
909.396.3479

---

**From:** Jason Golding  
**Sent:** Tuesday, January 9, 2018 5:34 PM  
**To:** Ryan Banuelos  
**Cc:** Nicole Vermilion ; [Nicole Morse](#) ; [Michael Krause](#) ; Lijin Sun  
**Subject:** [Re: City of Hope Campus Plan Draft EIR - Data Request](#)

Ryan,

Have you received the email from Placemarks below? Do we need to supply you any additional data in order to provide the City with a complete comment letter from SCAQMD? How much additional time do you need to provide those comments? Our Planning Commission is scheduled for next Tuesday night (1/16/18).

Please feel free to contact me if you have any questions.

Thanks,

---

**Jason Golding**  
Planning Division Manager

City of Duarte  
(626) 357-7931 x231

On Jan 5, 2018, at 4:22 PM, Nicole Morse wrote: [Good afternoon Ryan,](#)

We are in receipt of your comment letter submitted to the City of Duarte for the City of Hope EIR. Your comment letter requests an extension of the public review period. Please let us know if you are planning on submitting additional comments and, if so, how much additional time you need. I can work with the City to allow your agency submit comments beyond the public review period, if needed.

Thank you,

NICOLE MORSE, Esq.  
Associate Principal

<image002.jpg>

3 MacArthur Place, Suite 1100 | Santa Ana, California 92707  
714.966.9220 | placeworks.com

**From:** Ryan Banuelos  
**Subject:** City of Hope Campus Plan Draft EIR - Data Request  
**Date:** January 2, 2018 at 9:52:53 AM PST  
**To:** Jason Golding

Hi Jason,

Please provide all technical documents related to the air quality (air quality modeling, health risk assessment files, and emission estimates) and greenhouse gas analyses in electronic format. These include original emission calculation spreadsheets and modeling files (not Adobe PDF files). These files were requested to be sent with the draft EIR in a comment letter on the Notice of Preparation for the City of Hope Campus Plan on October 28, 2015 (SCAQMD Ref: LAC151016-02). Without all files and supporting air quality documentation, the SCAQMD will be unable to complete its review of the air quality analysis in a timely manner. Any delays in providing all supporting air quality documentation will require additional time for review beyond the end of the comment period.

If you have any questions, please feel free to contact me.

Thank you,

-Ryan

Ryan Bañuelos  
Air Quality Specialist, CEQA  
South Coast Air Quality Management District  
21865 Copley Drive  
Diamond Bar, CA 91765  
909.396.3479



## Nicole Morse

---

**From:** Jason Golding  
**Sent:** Tuesday, January 16, 2018 8:55 AM  
**To:** Lijin Sun  
**Cc:** Michael Krause; Ryan Banuelos; Nicole Vermilion; Nicole Morse  
**Subject:** Re: City of Hope Campus Plan Draft EIR - Data Request  
  
**Categories:** CODU-01 COH

Thanks you for your quick response and correspondence. We will add this email to our comments.

---

### Jason Golding

Planning Division Manager

City of Duarte  
(626) 357-7931 x231

On Jan 12, 2018, at 3:55 PM, Lijin Sun wrote:

Dear Mr. Golding,

Due to time constraints, SCAQMD staff conducted a cursory review of the HRA analysis based on the files provided to us. While we are concerned with some HRA modeling parameters and assumptions, we have no further comments at this time.

Thank you,  
Lijin Sun, J.D.  
Program Supervisor, CEQA IGR  
South Coast Air Quality Management District  
21865 Copley Drive, Diamond Bar, CA 91765  
Direct: (909) 396-3308  
Fax: (909) 396-3324

---

**From:** Jason Golding  
**Sent:** Wednesday, January 10, 2018 8:02 AM  
**To:** Ryan Banuelos  
**Cc:** Nicole Vermilion; Nicole Morse; Michael Krause; Lijin Sun  
**Subject:** Re: City of Hope Campus Plan Draft EIR - Data Request

---

Thanks for your response Ryan. Placeworks will be working with you to get any missing files needed for your evaluation. We'd appreciate anything that can be done to provide us revised comments as soon as possible.

---

**Jason Golding**

Planning Division Manager

City of Duarte  
(626) 357-7931 x231

On Jan 9, 2018, at 5:48 PM, Ryan Banuelos wrote:

Hi Jason,

Thanks for the follow-up e-mail. After conducting the initial review of the files we received last week, we found that the HRA files are missing the operational HRA analysis and related calculation files and mitigated construction HRA files. Typically, it requires a week, at a minimum, to review a complete set of files. Given the Planning Commission will consider this project on January 16, 2017, please provide to us the above-mentioned missing files at your earliest convenience.

Please note that our office is closed on Mondays.

Thank you,

Ryan Bañuelos  
Air Quality Specialist, CEQA  
South Coast Air Quality Management District  
21865 Copley Drive  
Diamond Bar, CA 91765  
909.396.3479

---

**From:** Jason Golding

**Sent:** Tuesday, January 9, 2018 5:34 PM

**To:** Ryan Banuelos

**Cc:** Nicole Vermilion ; [Nicole Morse](#) ; [Michael Krause](#) ; Lijin Sun

**Subject:** [Re: City of Hope Campus Plan Draft EIR - Data Request](#)

Ryan,

Have you received the email from Placeworks below? Do we need to supply you any additional data in order to provide the City with a complete comment letter from SCAQMD? How much additional time do you need to provide those comments? Our Planning Commission is scheduled for next Tuesday night (1/16/18).

Please feel free to contact me if you have any questions.

Thanks,

---

**Jason Golding**  
Planning Division Manager

City of Duarte  
(626) 357-7931 x231

On Jan 5, 2018, at 4:22 PM, Nicole Morse wrote:

Good afternoon Ryan,

We are in receipt of your comment letter submitted to the City of Duarte for the City of Hope EIR. Your comment letter requests an extension of the public review period. Please let us know if you are planning on submitting additional comments and, if so, how much additional time you need. I can work with the City to allow your agency submit comments beyond the public review period, if needed.

Thank you,

**NICOLE MORSE, Esq.**  
Associate Principal

[<image002.jpg>](#)

3 MacArthur Place, Suite 1100 | Santa Ana, California 92707  
714.966.9220 | [placeworks.com](http://placeworks.com)

**From:** Ryan Banuelos  
**Subject:** City of Hope Campus Plan Draft EIR - Data Request  
**Date:** January 2, 2018 at 9:52:53 AM PST  
**To:** Jason Golding

Hi Jason,

Please provide all technical documents related to the air quality (air quality modeling, health risk assessment files, and emission estimates) and greenhouse gas analyses in electronic format. These include original emission calculation spreadsheets and modeling files (not Adobe PDF files). These files were requested to be sent with the draft EIR in a comment letter on the Notice of Preparation for the City of Hope Campus Plan on October 28, 2015 (SCAQMD Ref: LAC151016-02). Without all files and supporting air quality documentation, the

SCAQMD will be unable to complete its review of the air quality analysis in a timely manner. Any delays in providing all supporting air quality documentation will require additional time for review beyond the end of the comment period.

If you have any questions, please feel free to contact me.

Thank you,

-Ryan

Ryan Bañuelos  
Air Quality Specialist, CEQA  
South Coast Air Quality Management District  
21865 Copley Drive  
Diamond Bar, CA 91765  
909.396.3479

## Appendix

# Appendix C. City of Hope Specific Plan Errata Sheet

## Appendix

*This page intentionally left blank.*

Updated Specific Plan Sections	Page(s)	Description of Updates
Inside Cover	Inside Cover	Add Logo
1.2.1 Specific Plan Authority	2	Text Edits: or changed to of, Plan was changed to Plan will be adopted
1.3.1 Specific Plan Area Location	4	Text Edits: The changed to the, remove (%), of changed to from
1.3.2 Surrounding Uses	7	Text Edits: two -story changed to two-story
1.4.2 Pre-Existing Irwindale General Plan & Zoning	12	Bold Commercial ( C )
1.6.1 Community Meetings	16	Text Edit: COD Community Meeting #1. "In (rather than On) October of 2013..."
1.6.1 Community Meetings	17	Text Edit: COD Community Meeting #2. First sentence, instead of TBA, its should be "in November 2013."
1.6.1 Community Meetings	17	Add Text: Draft EIR Public Comment Meeting. Add meeting date of Dec. 6, 2017.
1.6.2 Community Input Process For Environmental Impact Report	17	Add Text: Duarte PC Meeting. Add Jan 16, 2018.
1.6.2 Community Input Process For Environmental Impact Report	17	Add Text: Duarte CC Meeting. Add at last sentence "...and certify the EIR document..."
1.6.2 Community Input Process For Environmental Impact Report	17	Add Text: January 16, 2018
1.6.3 City of Irwindale Approval Process	17	Add Text: City of Irwindale Process. Add as 1st sentence. "Once the City of Duarte certifies the EIR and introduces the entitlement ordinances, the City of Irwindale Planning..." AND Delete "After the second reading, the Specific Plan will go into effect."
3.2 Campus Land Use Plan	24	Text Edits: one changed to two, district changed to districts
3.2.1 Land Use Districts	25	Text Edits: Transitio changed to Transitional
3.2.2 Illustrative Development Scenerio	26	Text Deletion: Procedures for modifying square footage between Phases, land uses, and land use districts are located in Section 7.2 of this Specific Plan.
Table 2: Permitted Uses	28	Text Insertion: district located in- district it is located in
4.3 Circulation Access	42	Adjust spacing between and and are
Figure 15: Proposed Vehicular Circulation and Access System	43	Text Edit: Cinco Robles Rd. changed to Cinco Robles Dr.
Figure 18: Transit, Bicycle, and Pedestrian Network	48	Text Edit: Cinco Robles Rd. changed to Cinco Robles Dr.
Figure 19: Proposed Parking System	52	Text Edit: Cinco Robles Rd. changed to Cinco Robles Dr.
Figure 28: Water System	84	Text Edit: Cinco Robles Rd. changed to Cinco Robles Dr.
Figure 29: Sanitary Sewer System	86	Text Edit: Cinco Robles Rd. changed to Cinco Robles Dr.
Figure 30: Drainage System	90	Text Edit: Cinco Robles Rd. changed to Cinco Robles Dr.
Figure 31: Stormwater Mitigation	92	Text Edit: Cinco Robles Rd. changed to Cinco Robles Dr.
Figure 32: Campus Electrial Lines	94	Text Edit: Cinco Robles Rd. changed to Cinco Robles Dr.
7.2.1 Purpose & Overview	97	Adjust paragraph spacing
Table 12. Implementation Action Plan	121	Text Edit: Sewage row, 2nd column. Change stormwater to sewage.





Appendix

Appendix D. EIR Tables 1-3, 5.6-7, 5.10-9, 5.10-10,  
and 5.10-11

## Appendix

*This page intentionally left blank.*

**Table 1-3 Summary of Environmental Impacts, Mitigation Measures and Levels of Significance After Mitigation**

Environmental Impact	Level of Significance Before Mitigation	Mitigation Measures	Level of Significance After Mitigation
<b>5.1 AESTHETICS</b>			
<b>Impact 5.1-1:</b> Implementation of the Campus Plan would alter the visual appearance and character of the project site.	Potentially Significant	Mitigation Measures AQ-1 and N-1 in Sections 5.2, <i>Air Quality</i> , and 5.10, <i>Noise</i> , respectively, apply.	Less Than Significant
<b>Impact 5.1-2:</b> Implementation of the Campus Plan could cause shade and shadow impacts on surrounding uses.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.1-3:</b> Buildout of the proposed Campus Plan would generate additional light and glare at the project site.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impact</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.2 AIR QUALITY</b>			
<b>Impact 5.2-1:</b> The proposed project would be consistent with the South Coast Air Quality Management District's Air Quality Management Plan.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.2-2:</b> Construction activities associated with the proposed project would not generate short-term emissions in exceedance of SCAQMD's regional threshold criteria.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.2-3:</b> Long-term operation of the project would not generate additional emissions in exceedance of SCAQMD's regional significance thresholds.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.2-4:</b> Construction of the proposed project during Phase I would exceed the SCAQMD screening-level LST for PM <sub>2.5</sub> and potentially expose sensitive receptors to substantial pollutant concentrations.	Potentially Significant	AQ-1 During construction, the construction contractor shall water open exposed surfaces a minimum of three times per day or apply other soil stabilizers on inactive construction areas consistent with the Best Available Control Measures identified in South Coast Air Quality Management District (SCAQMD) Rule 403 to minimize fugitive dust emissions generated from ground disturbing activities. Prior to issuance of any permit allowing physical to construction activities in the specific plan area to commence permits, the construction contractor shall note the watering and/or soil stabilization requirement on all construction plans submitted to the entity with jurisdiction over the project, i.e., either the City of Duarte, City of Irwindale, and/or Office of Statewide Health Planning and Development.	Less Than Significant

<b>Impact 5.2-5:</b> Project-related construction activities could result in potentially significant cancer risk impacts to nearby off-site residences.	<b>Potentially Significant</b>	AQ-2 The project construction contractor(s) shall use construction equipment fitted with Level 3 Diesel Particulate Filters (DPF) for all construction equipment of 50 horsepower or more. Prior to any construction, the construction contractor(s) shall ensure that all construction plans submitted to the entity with jurisdiction over the project, i.e., either the City of Duarte, City of Irwindale, and/or Office of Statewide Health Planning and Development, clearly show the requirement for Level 3 DPF for construction equipment over 50 horsepower. During construction, the construction contractor(s) shall maintain a list of all operating equipment in use on the project site for verification by the entity with jurisdiction over the project, i.e., either the City of Duarte, City of Irwindale, and/or Office of Statewide Health Planning and Development. The construction equipment list shall state the makes, models, and number of construction equipment on site. Equipment shall be properly serviced and maintained in accordance with manufacturer recommendations. The construction contractor(s) shall ensure that all non-essential idling of construction equipment is restricted to five minutes or less in compliance with California Code of Regulations Title 13, Article 4.8, Chapter 9, Section 2449.	Less Than Significant
<b>Impact 5.2-6:</b> Implementation of the proposed City of Hope Campus Plan would not expose sensitive receptors to substantial pollutant concentrations.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impact</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.3 BIOLOGICAL RESOURCES</b>			
<b>Impact 5.3-1:</b> Implementation of the Campus Plan would not impact habitat for sensitive wildlife or plant species; however, construction noise could impact adjacent sensitive wildlife.	<b>Potentially Significant</b>	Mitigation Measure N-1 in Section 5.10, <i>Noise</i> , applies.	Less Than Significant
<b>Impact 5.3-2:</b> Implementation of the Campus Plan would not cause the loss of riparian habitats or sensitive natural communities.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.3-3:</b> Implementation of the Campus Plan would not impact jurisdictional waters or wetlands jurisdictional to the Corps, CDFW, or LARWQCB.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.3-4:</b> Tree removal during the course of Campus Plan buildout could cause loss of active bird nests.	<b>Potentially Significant</b>	BIO-1 Prior to issuance of permits for any construction activity, the project applicant shall demonstrate compliance with the federal MBTA and submit required nesting bird surveys to the City of Duarte. Construction outside the nesting season (between September 1st and February 15th) does not require pre-removal nesting bird surveys. If construction is proposed between February 16th and August 31st, a qualified biologist must conduct a nesting bird survey(s) no more than three (3) days prior to initiation of grading to document	Less Than Significant

		<p>the presence or absence of nesting birds within or directly adjacent (100 feet) to the project site.</p> <p>The preconstruction survey(s) shall focus on identifying any raptors and/or passerines nests that may be directly or indirectly affected by construction activities. If active nests are documented, species-specific measures shall be prepared by a qualified biologist and implemented to prevent abandonment of the active nest. At a minimum, grading in the vicinity of a nest shall be postponed until the young birds have fledged. A minimum exclusion buffer shall be maintained during construction, depending on the species and location per the discretion of the qualified biologist. The perimeter of the nest setback zone shall be fenced or adequately demarcated with stakes and flagging at 20-foot intervals, and construction personnel and activities restricted from the area. A survey report by a qualified biologist verifying that no active nests are present or that the young have fledged, shall be submitted to the City of Duarte prior to initiation of grading in the nest-setback zone. The qualified biologist shall serve as a biological monitor during those periods when construction activities occur near active nest areas to ensure that no inadvertent impacts on these nests occur. A final report of the findings, prepared by a qualified biologist, shall be submitted to the City of Duarte prior to construction-related activities that have the potential to disturb any active nests during the nesting season. Any nest permanently vacated for the season would not warrant protection pursuant to the MBTA.</p>	
<b>Cumulative Impact</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.4 CULTURAL RESOURCES</b>			
<b>Impact 5.4-1:</b> Buildout of the Campus Plan could impact an identified historic resource.	<b>Potentially Significant</b>	<p>CUL-1 Prior to the issuance of any permits allowing development within the Specific Plan area that involves demolition or alteration to properties (buildings, structures, and landscape areas) that are at least 45 years of age at the time of such activity, and that were not previously identified for evaluation in the 2016 historical resources survey (GPA 2016), the City of Duarte or City of Irwindale, as applicable, shall require the applicant to prepare a Historical Resources Evaluation Report (HRER) to evaluate such properties. The HRER shall be prepared by a qualified architectural historian or historian who meets the Secretary of the Interior's Professional Qualifications Standards in architectural history or history. The qualified architectural historian or historian shall conduct an intensive-level evaluation in accordance with the guidelines and best practices promulgated by the State Office of Historic Preservation to identify any potential historical resources within the proposed development area. All evaluated properties shall be documented on Department of Parks and Recreation Series 523 Forms. For all properties determined to qualify as potential historical resources, the HRER shall include a discussion of those properties' character defining features. The character-defining features documented will include site plan features, overall massing, scale, and spatial</p>	Less Than Significant

		<p>relationships between buildings and landscaping/circulation corridors, architectural details and design composition, and all contributing materials, features, and finishes. Properties with interiors that were historically accessible to the public will also be evaluated for potential historic significance. The HRER shall be submitted to the City of Duarte or City of Irwindale, as applicable, for review and concurrence.</p> <ul style="list-style-type: none"> <li>Secretary's Standards Project Review Memorandum: For all properties identified as potential historical resources in the HRER, during the planning phase for the development in the Campus Plan area that may impact such properties (prior to any construction activities), input shall be sought from a California architectural historian or historic architect meeting the Secretary of the Interior's Professional Qualifications Standards to ensure that the development complies with the Secretary's Standards for the Treatment of Historic Properties (Standards). The findings and recommendations of the architectural historian or historic architect shall be documented in a Secretary's Standards Project Review Memorandum (Memorandum), at the schematic design phase. This Memorandum shall analyze all components of the development for compliance with the Standards. Components to be analyzed shall include direct and indirect changes to historical resources and their setting. Should design modifications be necessary to bring the development into compliance with the Standards, the Memorandum will document those recommendations. The intent of the Memorandum is to ensure that the development complies with the Standards in order to avoid significant adverse direct or indirect impacts to historic resources, such that no further environmental review is required. The Memorandum shall be submitted to the City of Duarte or City of Irwindale, as applicable, for review.</li> <li>To avoid impacts to the two historical resources identified in the 2016 historical resources survey (the City of Hope Visitor's Center and the House of Hope/Temple Beth Hatikvah), any alterations to either property shall comply with the Standards and be carried forward for analysis and documentation through a Secretary's Standards Project Review Memorandum, as discussed above. No new additions shall be added to these buildings except for any potential changes for complying with applicable accessibility requirements. A minimum 20-foot buffer shall be maintained around the two historical resources. This will preserve the immediate setting and spatial relationships between the properties. No new construction shall be completed between the buildings and open space shall be maintained to preserve their immediate setting.</li> </ul>	
Impact 5.4-2: Buildout of the Campus Plan could impact archaeological resources.	Potentially Significant	<p>CUL-2 Prior to issuance of any permits allowing ground-disturbing activities within the Campus Plan area, the City of Duarte and/or City of Irwindale, as appropriate, shall ensure that an archeologist who meets the Secretary of the Interior's Standards for professional archaeology has been retained for the project and</p>	Less Than Significant

		<p>will be on call during all grading and other significant ground-disturbing activities. The Qualified Archaeologist shall ensure that the following measures are followed for the project:</p> <ul style="list-style-type: none"> <li>• Prior to any ground disturbance, the Qualified Archaeologist, or their designee, shall provide Worker Environmental Awareness Protection (WEAP) training to construction personnel regarding regulatory requirements for the protection of cultural (prehistoric and historic) resources. As part of this training, construction personnel shall be briefed on proper procedures to follow should unanticipated cultural resources be made during construction. Workers will be provided contact information and protocols to follow in the event that inadvertent discoveries are made. The WEAP training can be in the form of a video or PowerPoint presentation. Printed literature (handouts) can accompany the training and can also be given to new workers and contractors to avoid the necessity of continuous training over the course of the project.</li> <li>• In the event that unanticipated cultural material is encountered during any phase of project construction, all construction work within 50 feet (15 meters) of the find shall cease and the Qualified Archaeologist shall assess the find for importance. Construction activities may continue in other areas. If, in consultation with the appropriate City, the discovery is determined to not be important, work will be permitted to continue in the area. <ul style="list-style-type: none"> <li>• If a find is determined to be important, additional work may be warranted, or the find can be preserved in place and construction allowed to proceed.</li> <li>• Additional work can include scientific recording and excavation of that portion of the find making the find important.</li> <li>• If excavation of a find occurs, the Qualified Archaeologist shall draft a report within 60 days of conclusion of excavation that identifies the find and summarizes the analysis conducted. The completed report shall be approved by the City and filed with the County and with the South Central Coastal Information Center at California State University, Fullerton.</li> <li>• Excavated finds shall be curated at a repository determined by the Qualified Archaeologist and approved by the City.</li> </ul> </li> </ul>	
Impact 5.4-3: Buildout of the Campus Plan could impact paleontological resources or a unique geologic feature.	Potentially Significant	<p>CUL-3 Prior to the issuance of any permits allowing ground-disturbing activities within the Campus Plan area, the City of Duarte and/or City of Irwindale, as appropriate, shall ensure that a paleontological monitor has been retained for the project. If ground-disturbing activities will exceed a depth of 6 feet below the ground surface, prior to the issuance of grading permits, the City of Duarte and/or City of Irwindale, as appropriate, shall ensure that a qualified paleontologist has been retained for the project. The paleontologist shall</p>	Less Than Significant

		<p>prepare a paleontological monitoring program. All grading and other significant ground-disturbing activities more than 6 feet below the ground surface will be monitored by a paleontological monitor. If any evidence of paleontological resources is discovered, the following measures shall be taken:</p> <ul style="list-style-type: none"> <li>• All below-grade work shall stop within a 50-foot radius of the discovery. Work shall not continue until the discovery has been evaluated by a qualified paleontologist.</li> <li>• A qualified paleontologist in coordination with the City shall assess the find(s) and determine if they are scientifically important. If the find(s) are of value then: <ul style="list-style-type: none"> <li>• Scientifically important fossils shall be prepared by the paleontologist and/or his/her designee(s) to the point of identification, identified to the lowest taxonomic level possible, and curated in a museum repository with permanent, retrievable storage.</li> <li>• Significant paleontological resources found shall be preserved as determined necessary by the paleontological monitor.</li> <li>• Excavated finds shall be offered to the Los Angeles County Museum of Natural History or its designee for curation on a first-refusal basis. After which, finds shall be offered to an accredited and permanent scientific institution for the benefit of current and future generations.</li> <li>• Within 60 days of completion of the end of earth-moving activities, the paleontologist shall draft a report summarizing the finds and shall include the inspection period, an analysis of any resources found, and the present repository of the items.</li> <li>• The paleontologist's report shall be approved by the City. Any resulting reports shall also be filed with the permanent scientific institution where the resources are curated.</li> </ul> </li> </ul>	
<b>Cumulative Impact</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.5 GEOLOGY AND SOILS</b>			
<b>Impact 5.5-1:</b> Project workers, visitors, and structures would be subject to strong ground shaking.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.5-2:</b> Project workers, visitors, and structures would not be subjected to substantial hazards from ground subsidence, or collapsible or expansive soils.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant



## 5.6 GREENHOUSE GAS EMISSIONS

<p><b>Impact 5.6-1:</b> Buildout of City of Hope Campus Plan would generate a substantial increase in GHG emissions compared to existing conditions and would have a significant impact on the environment.</p>	<p><b>Potentially Significant</b></p>	<p>GHG-1 Prior to the issuance of building permits for new development projects under the City of Hope Specific Plan, the City of Hope shall adhere to and comply with the following sustainable development features for all components of the project that are not subject to the jurisdiction of the Office of Statewide Health Planning and Development (OSHPD):</p> <ul style="list-style-type: none"> <li>• Future Alternative Energy Production, Roof Layout Plan. Building orientation and layout shall be designed to facilitate future alternative energy production on-site. The City of Hope shall provide a roof layout plan that illustrates how future installation of a photovoltaic system could be accommodated, including plans that identify installation of conduit from the roof to the electrical room—or to electrical panels if no electrical room is provided—to accommodate future photovoltaic system or other collector/power generation installation.</li> <li>• Energy Efficient Appliances. Projects shall incorporate energy-efficient appliances, such as tankless or solar water heaters and energy-efficient heating and cooling systems.</li> <li>• Transit Stop Improvements. Building entrances and pedestrian walkways shall be designed to provide safe and efficient access to nearby public transit stops. Buildings that abut a transit stop shall install a bus pad, turnouts, benches, trash receptacles (and service), shade/shelter, security lighting, bike racks, water features, and/or landscaping. When practical, the bus stop shall be built into the project and be compatible with the development.</li> <li>• Alternative Fuel Vehicles. The City of Hope shall provide preferential parking for alternative-fuel vehicles in the parking structures. The alternative-fuel vehicle parking space shall be provided with a sign that identifies the parking space as designated for use by alternative fuel vehicles. Preferential parking spaces shall be as close as possible to the primary entrance without conflicting with parking provided to meet the Americans with Disability Act requirements or preferential parking provided for carpool/vanpools.</li> <li>• Energy Efficiency, Medium Sized Projects (i.e., nonresidential new construction or modifications of 25,000 to 49,999 square feet of gross floor area). At minimum, the City of Hope shall design medium-sized projects to meet the Tier 1 energy performance standard (Section A5.203.1.2.1) of the 2016 California Green Building Standards Code. If there are applicable local or state standards in effect at the time of project development that would provide higher building energy efficiency than the aforementioned CALGreen Tier 1 performance standard, development projects shall meet those local or state standards.</li> <li>• Energy Efficiency, Large Sized Projects (i.e., nonresidential new construction or modifications of 50,000 or more square feet of gross floor</li> </ul>	<p><b>Significant and Unavoidable</b></p>
---	---------------------------------------	--	---

		<p>area). At minimum, the City of Hope shall design large-sized projects to meet the Tier 2 energy performance standard (Section A5.203.1.2.2) of the 2016 California Green Building Standards Code. If there are applicable local or state standards in effect at the time of project development that would provide higher building energy efficiency than the aforementioned CALGreen Tier 2 performance standard, development projects shall meet those local or state standards.</p> <ul style="list-style-type: none"> <li>• Energy Efficient Outdoor Lighting. The City of Hope shall provide overnight security and safety lighting or outdoor lighting on timers or motion detection sensors, or otherwise have the capacity to switch to a dimmer, less energy-intensive mode during hours of reduced activity.</li> <li>• Shading, Medium and Large Size Projects. The City of Hope shall require medium- and large-sized projects to incorporate window shading devices into project design. Window shading devices could include any single or combination of elements, such as extended roof overhangs (i.e., greater than 12 inches), window awnings, decorative sail shades, trellises, or similar elements. Nonglare window tinting may, in appropriate circumstances, function as shading.</li> <li>• Leadership in Energy and Environmental Design (LEED) Certification. The City of Hope shall design small projects (i.e., nonresidential new construction or modifications of less than 25,000 square feet of gross floor area) and medium projects so that they are built to achieve LEED certification (or its equivalent for design features). The City of Hope shall design large projects so that they are built to achieve LEED Silver compliance (or its equivalent for design features).</li> <li>• Heat Island Effect. The City of Hope shall use lighter-colored paving or open-grid paving materials for surface parking areas, or break up large expanses of paved area with shade trees or shade structures, or use light colored roofing materials.</li> <li>• All project design features related to the above listed sustainable development features shall be noted on all building plans of future specific projects submitted to the City of Duarte or City of Irwindale, based on the location of the specific project. Adherence to and implementation of all applicable sustainable development features shall be verified by the City of Duarte or City of Irwindale prior to the issuance of a certificate of occupancy.</li> </ul> <p>GHG-2 Components of future development projects within the City of Hope Specific Plan that are subject to the jurisdiction of the Office of Statewide Health Planning and Development (OSHPD) shall be required to comply with Mitigation Measure GHG-1 unless the requirements in these two mitigation measures are in direct conflict with the applicable regulations and building code requirements specific to components/facilities under OSHPD jurisdiction.</p>	
Impact 5.6-2: Implementation of the proposed	Less Than Significant	No mitigation measures are required.	Less Than Significant

City of Hope Campus Plan would not conflict with plans adopted for the purpose of reducing GHG emissions.			
<b>Cumulative Impacts</b>	<b>Potentially Significant</b>	Mitigation Measures GHG-1 and GHG-2 apply.	<b>Significant and Unavoidable</b> <del>Less Than Significant</del>

## 5.7 HAZARDS AND HAZARDOUS MATERIALS

<b>Impact 5.7-1:</b> Project construction and operations would involve the transport, use, and/or disposal of hazardous materials.	<b>Potentially Significant</b>	HAZ-1 Prior to the initiating any ground-disturbing activities pursuant to the Campus Plan, the project applicant shall prepare and submit a Phase I Environmental Site Assessment (ESA) for the entire Campus Plan area to the City of Duarte and City of Irwindale, to assess the existing environmental conditions of the Campus Plan area and evaluate the potential for contamination to be present. The Phase I ESA shall be prepared by an Environmental Professional in accordance with the American Society for Testing and Materials (ASTM) Standard E 1527.13, "Standard Practice for Environmental Site Assessments: Phase I Environmental Site Assessment Process." Prior to issuance of a grading permit or building permit for new construction in the Campus Plan area, an Environmental Professional shall review the relevant portions of the site-wide Phase I ESA and may visit the individual development site to evaluate whether any recognized environmental conditions (RECs) related to soils or groundwater identified in the Phase I ESA are present at the site. If no RECs are identified for that individual development site, no further assessment or remediation shall be required. If RECs are identified for that individual development site, the project applicant shall take additional action, which shall include either (i) a Phase II subsurface investigation for that site, or (ii) localized soil removal/remediation activities in accordance with all applicable regulatory requirements. If a Phase II subsurface investigation is conducted, soil, soil gas, and/or groundwater sampling shall be performed. If contamination is confirmed at concentrations exceeding applicable regulatory thresholds, the project applicant shall perform a screening level risk assessment to evaluate if remedial actions are necessary. The project applicant will also consider the need to consult with the appropriate regulatory agency (e.g., California Department of Toxic Substances Control, Regional Water Quality Control Board, Los Angeles County Fire Department, etc.). All contaminated soils and/or material encountered that is confirmed by sampling to be hazardous under California or federal law shall be disposed of appropriately at a regulated site and in accordance with applicable laws and regulations prior to the completion of grading. The Phase I ESA conducted pursuant to this Mitigation Measure also shall include an assessment of the possible existence of lead-based paint and asbestos-containing materials in the Campus Plan area. Each individual development site that involves demolition activities shall include an inspection for lead-based paint conducted by a licensed or certified lead inspector/assessor and a survey for asbestos-containing materials conducted by a California Certified Asbestos Consultant. Prior to the issuance of a grading permit or a building permits, a report documenting the completion, results,	Less Than Significant
--	--------------------------------	--	-----------------------

		and follow-up remediation on the recommendations, if any, shall be provided to the City of Duarte Community Development Director and/or City of Inwindale Community Development Director, as appropriate, evidencing that all site remediation activities have been completed.	
<b>Impact 5.7-2:</b> The project site is on a list of hazardous materials sites	<b>Potentially Significant</b>	Mitigation Measure HAZ-1 applies.	Less Than Significant
<b>Impact 5.7-3:</b> Implementation of the Campus Plan would not interfere with an adopted emergency response plan or emergency evacuation plan.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.7-4:</b> A designated fire hazard zone in the Santa Fe Flood Control Basin abuts the southeast site boundary. Project buildout would not expose people or structures to substantial wildfire hazards.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.8 HYDROLOGY AND WATER QUALITY</b>			
<b>Impact 5.8-1:</b> Implementation of the Campus Plan would not violate any water quality standards or waste discharge requirements or otherwise degrade water quality.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.8-2:</b> Implementation of the Campus Plan would not substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.8-3:</b> Implementation of the Campus Plan would not substantially alter the existing drainage pattern to result in adverse flooding impacts, create or contribute runoff water that would exceed the capacity of existing or planned stormwater systems, or provide substantial additional sources of polluted runoff.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.8-4:</b> Implementation of the Campus Plan would not expose people or structures to a significant risk of loss, injury, or death involving flooding, as a result of the failure of a levee or dam.	Less Than Significant	No mitigation measures are required.	Less Than Significant

Cumulative Impacts	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.9 LAND USE AND PLANNING</b>			
Impact 5.9-1: Campus Plan implementation would not conflict with applicable plans adopted for the purpose of avoiding or mitigating an environmental effect.	Less Than Significant	No mitigation measures are required.	Less Than Significant
Cumulative Impacts	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.10 NOISE</b>			
Impact 5.10-1: Implementation of the Campus Plan would result in temporary noise increases in the vicinity of construction activities.	Potentially Significant	<p>N-1 Prior to issuance of <del>any permit allowing physical permits to perform</del> construction activities in the specific plan area to commence, a construction noise mitigation plan shall be prepared, reviewed, and approved by the City of Duarte Community Development Director or the Irwindale Community Development Director, as applicable. The plan shall be implemented during project construction per the following methods:</p> <ol style="list-style-type: none"> <li>1. At least 90 days prior to the start of construction activities, residents within 250 feet of the project site shall be notified of the planned construction activities. The notification shall include a brief description of the project, the activities that would occur, the duration and hours when construction would occur. The notification should include the telephone number of the City's authorized representative to respond in the event of a vibration or noise complaint.</li> <li>2. At least 10 days prior to the start of construction activities, a sign shall be posted at the entrance to the job site, clearly visible to the public, which contains a contact name and telephone number of the City's authorized representative to respond in the event of a vibration or noise complaint. If the authorized representative receives a complaint, he/she shall investigate, take appropriate corrective action, and report the action to the City.</li> <li>3. During the entire active construction period and to the extent feasible, limit construction-related trips (including worker commuting, material deliveries, and debris/soil hauling) from residential areas around the project site. For example, such construction-related trips should maximize site access along Village Road (from either Duarte Road from the north or from Buena Vista Street from the south), while minimizing trips along either Cinco Robles Road (south of Duarte Road) or Buena Vista Street (north of Village Road) since both these segments are adjacent to residential/ school receptors).</li> <li>4. During the entire active construction period, all heavy construction equipment used on the proposed project shall be maintained in good operating condition, with all internal combustion, engine-driven equipment fitted with intake and exhaust mufflers, air intake silencers,</li> </ol>	Significant and Unavoidable

		<p>and engine shrouds no less effective than as originally equipped by the manufacturer.</p> <ol style="list-style-type: none"> <li>5. During the entire active construction period and to the extent feasible, use electrically powered equipment instead of pneumatic or internal combustion powered equipment, since the former are generally quieter than the latter. For example, operating temporary lighting masts using construction-dedicated power blocks/outlets would be preferable to lighting masts that were powered by an on-board, gasoline-fueled generator. Likewise, electric drills (either battery- or outlet-powered) are generally quieter than air-driven drills.</li> <li>6. During the entire active construction period and to the extent feasible, all stationary noise-generating equipment shall be located as far away as possible from neighboring property lines, onsite sensitive receptors (i.e. hospital and hospitality uses), and the Santa Fe Flood Control Basin (which generally delineates the noise-sensitive biological resources to the southeast of the Specific Plan Area)</li> <li>7. During the entire active construction period and to the extent feasible, limit all internal combustion engine idling both on the site and at nearby queuing areas to no more than five minutes for any given vehicle or machine (as is consistent with state air quality requirements per In-Use Off-Road Diesel Idling Restriction [Code of Regulations Title 13, Article 4.8, Chapter 9, Section 2449] and as required by Mitigation Measure AQ-2). Signs shall be posted at the job site and along queueing lanes to reinforce the prohibition of unnecessary engine idling.</li> <li>8. During the entire active construction period and to the extent feasible, the use of noise producing signals, including horns, whistles, alarms, and bells will be for safety warning purposes only. Use smart back-up alarms, which automatically adjust the alarm level based on the background noise level, or switch off back-up alarms and replace with human spotters.</li> <li>9. Erect a temporary noise barrier/curtain between residential receptors that (a) share a boundary with the project site and any project construction zones within 100 feet of the shared boundary and (b) when such a nearby construction zone will use any equipment items rated at 80 dBA or above per FTA Manual Table 12-1. A temporary noise barrier/curtain shall also be placed between a construction zone within 100 feet (or a distance recommended by a qualified biologist) of the southeast boundary and the Santa Fe Flood Control Basin to minimize construction noise impacts to sensitive biological resources in the basin. The temporary sound barrier would block line of sight noise levels to adjacent properties and substantially reduce noise levels at the Santa Fe Flood Control Basin due to its elevation which is lower than the project site. The sound barrier shall have a minimum height of 12 feet and be free of gaps and holes and must achieve a Sound Transmission Class</li> </ol>	
--	--	---	--

		<p>(STC) of 35 or greater. The barrier can be (a) a ¾-inch-thick plywood wall or (b) a hanging blanket/curtain with a surface density of at least 2 pounds per square foot. For either configuration, the construction side of the barrier shall have an exterior lining of sound absorption material with a Noise Reduction Coefficient (NRC) rating of at least 0.7.</p> <p>10. During the entire active construction period and to the extent feasible, high noise-producing activities shall be scheduled so as to minimize disruption at both onsite and offsite sensitive land uses.</p> <p>The above conditions shall be implemented by the construction contractor(s) via a designated health, safety and environmental coordinator or a similar person. The details of the construction noise mitigation plan, including those listed above, shall be included as part of the permit application drawing set and as part of the construction drawing set. Verification shall be performed by the City building inspection staff.</p>	
<b>Impact 5.10-2:</b> Campus Plan implementation would result in long-term operation-related noise that would not exceed local standards.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.10-3:</b> Implementation of the Campus Plan would create short-term groundborne vibration and groundborne noise.	Potentially Significant	<p>N-2 Prior to issuance of permits to perform demolition, construction, grading, foundation, and erection activities that would use vibration-producing equipment, a construction vibration mitigation plan shall be prepared, reviewed, and approved by the City of Duarte Community Development Director or the Irwindale Community Development Director, as applicable. The plan shall be implemented during project construction per the following methods:</p> <ol style="list-style-type: none"> <li>1. Prior to the start of construction activities, the construction contractor shall document the pre-construction baseline conditions by inspecting and reporting on the then-current foundation and structural condition of the buildings and/or structures with ground-based foundations (including pools, hot-tubs, and spas) within 50 feet of any construction site boundaries. Such inspections and documentation may be needed at offsite, private properties. In such cases, the Contractor shall make a good-faith, reasonable effort to contact the owners of these private properties and request their permission to conduct such inspection/documentation efforts (to establish the pre-construction baseline). If such good-faith, reasonable efforts be rejected by any given property owner (or if such contact attempts are met with no cooperation or silence from the property owner), the implementation at such a property shall be considered as not feasible at that given property.</li> <li>2. During the entire active construction period and to the extent feasible, vibratory rollers shall not be operated within 30 feet of buildings or other structures, and large bulldozers and loaded trucks shall not be operated within 15 feet of buildings or other structures. This measure ensures that</li> </ol>	Less Than Significant

		<p>vibratory rollers or large bulldozers do not exceed the potential damage threshold and eliminates the source of any potentially significant vibration impact.</p> <p>3. During the entire active construction period, if any vibration levels cause cosmetic or structural damage to the offsite buildings within 50 feet of the project site and that were previously inspected and documented [per point 1 above], City staff shall immediately issue "stop-work" orders to the construction contractor to prevent further damage. Such cosmetic or structural damage shall include, but not limited to, cracks in walls or ceilings [particularly around doors and windows], sticking/rubbing doors or openable windows, fallen or displaced ceiling tiles, and/or items displaced from shelving. Work shall not restart until the buildings are stabilized and/or preventive measures are implemented to relieve further damage to the building(s).</p> <p>The above conditions shall be implemented by the construction contractor(s) via a designated health, safety and environmental coordinator or a similar person. The details of the construction vibration mitigation plan, including those listed above, shall be included as part of the permit application drawing set and as part of the construction drawing set. Verification shall be performed by the City building inspection staff.</p>	
Cumulative Impacts	<u>Less Than Significant</u> <b>Potentially Significant</b>	<u>No mitigation measures are required.</u>	<u>Less Than Significant</u> <b>Significant and Unavoidable</b>
<b>5.11 POPULATION AND HOUSING</b>			
<b>Impact 5.11-1:</b> Implementation of the Campus Plan could result in population growth in the project area.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.11-2:</b> Project implementation could result in the replacement of housing for other uses allowed within the Campus Plan.	Less Than Significant	No mitigation measures are required.	Less Than Significant
Cumulative Impacts	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.12 PUBLIC SERVICES</b>			
<b>FIRE PROTECTION AND EMERGENCY SERVICES</b>			
<b>Impact 5.12-1:</b> Implementation of the Campus Plan would introduce new structures, workers, patients, and visitors into the LACFD service boundaries. The LACFD estimates that it can serve the completed project with existing firefighting resources in and near the project site.	Less Than Significant	No mitigation measures are required.	Less Than Significant



<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>POLICE PROTECTION</b>			
<b>Impact 5.12-2:</b> Implementation of the Campus Plan would introduce new structures, workers, patients, and visitors into the service area of the LACSD and IPD, thereby increasing the demand on police protection facilities and personnel.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>OTHER SERVICES</b>			
<b>Impact 5.12-3:</b> The proposed project would not generate new residents that would impact school or library facilities or services	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.13 RECREATION</b>			
<b>Impact 5.13-1:</b> Implementation of Campus Plan would generate additional employees that would increase the use of existing park and recreational facilities.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.14 TRANSPORTATION/TRAFFIC</b>			
<b>Impact 5.14-1:</b> Project-related trip generation would impact levels of service for the existing area roadway system.	<b>Potentially Significant</b>	<p><b>TRAF-1</b> Prior to the issuance of the first certificate of occupancy for a new building constructed pursuant to the City of Hope Campus Plan, the project applicant shall install signals for the intersections listed below or prepare a signal warrant study pursuant to Caltrans' California Manual on Uniform Traffic Control Devices. If a signal warrant study prepared in coordination with the responsible agency, shows that signalization is warranted, the project applicant shall install the required signal(s). If signalization is not warranted, an updated signal warrant study for each of the unsignalized intersections identified below shall be prepared every five years until project buildout. Signal installation and/or signal warrant analyses shall be conducted for the following intersections<sup>1</sup>:</p> <ul style="list-style-type: none"> <li>• 8. I-605 Northbound Off-Ramp &amp; Live Oak Avenue</li> <li>• 16. Buena Vista Street &amp; Village Road</li> <li>• 17. I-210 Westbound Off-Ramp &amp; Central Avenue</li> </ul>	<b>Significant and Unavoidable</b>

<sup>1</sup> Intersections # 16, 17, 19, and 22 meet peak hour signal warrant criteria under the future baseline scenario; intersection #8 meets warrant criteria at a 43 percent net increase in population.

		<ul style="list-style-type: none"> <li>• 19. Village Road &amp; Duarte Road</li> <li>• 22. Circle Road &amp; Duarte Road</li> </ul> <p>TRAF-2 Prior to the issuance of building permits, the project applicant shall make fair-share payments to the City of Irwindale toward the construction of traffic improvements to Avenida Barbosa at Arrow Highway (#6) as follows:</p> <ul style="list-style-type: none"> <li>• Modify the eastbound approach on Arrow Highway to provide a second eastbound left-turn lane within the existing roadway width.</li> <li>• Restriping the approach to change from one left-turn lane and two through lanes into two left-turn lanes and two through lanes.</li> </ul> <p>TRAF-3 Prior to issuance of <del>permits for any permit allowing physical</del> construction activities in the specific plan area to commence activity, the project applicant shall prepare a construction management plan. The Construction Management Plan shall be approved by the Cities of Duarte and Irwindale Public Works Department. The construction management plan shall identify construction hours, truck routes, travel patterns for haul routes, staging and parking areas, staggered worker arrival times, and safety procedures for pedestrians and bicyclists. The construction management plan shall prohibit the use of heavy construction vehicles during peak hours; establish requirements for the loading, unloading, and storage of materials on the project site; and establish requirements for the temporary removal of parking spaces, time limits for the reduction of travel lanes, and closing or diversion of pedestrian facilities to ensure the safety of pedestrian and access to local businesses. The plan shall also require the construction contractor to implement the following measures during construction activities, which shall be discussed at the pre-grading conference/meeting:</p> <ul style="list-style-type: none"> <li>• A flagman shall be placed at the truck entry and exit from the project site onto Duarte Road and Buena Vista Street to control the flow of exiting trucks.</li> <li>• The preferred haul route to and from the project site shall be Duarte Road, Buena Vista Street (south of Village Road), Avenida Barbosa, and Arrow Highway for inbound and outbound trucks to north I-605. Trucks shall not be permitted to travel along local residential streets.</li> <li>• Deliveries and pick-ups of construction materials shall be scheduled during non-peak travel periods and coordinated to reduce the potential of trucks waiting to load or unload for protracted periods of time.</li> <li>• Access shall remain unobstructed for land uses in proximity to the project site during construction.</li> <li>• In the event of a lane or sidewalk closure, a worksite traffic control plan, shall be implemented to route traffic or pedestrians around any such lane or sidewalk closures.</li> <li>• Coordinate with the Cities and emergency service providers to ensure</li> </ul>	
--	--	--	--

		adequate access is maintained to the project site and neighboring businesses. <ul style="list-style-type: none"> <li>Schedule vehicle movements to minimize vehicles waiting off-site and impeding public traffic flow on the surrounding streets.</li> </ul>	
<b>Impact 5.14-2:</b> Project-related trip generation in combination with existing and proposed cumulative development would not result in designated road and/or highways exceeding county congestion management agency service standards.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.14-3:</b> Project circulation improvements would not create hazardous conditions (sharp curves, etc.), potential conflicting uses, and emergency access.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.14-4:</b> The proposed project would not result in inadequate emergency access.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.14-5:</b> The proposed project complies with adopted policies, plans, and programs for alternative transportation.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impacts</b>	<b>Potentially Significant</b>	Mitigation Measures <u>TRAF-1</u> and <u>TRAF-2</u> applies.	<b>Significant and Unavoidable</b>
<b>5.15 TRIBAL CULTURAL RESOURCES</b>			
<b>Impact 5.15-1:</b> Grading activities associated with implementation of the Campus Plan have the potential to encounter tribal cultural resources.	<b>Potentially Significant</b>	Mitigation Measure CUL-2 in Section 5.4, <i>Cultural Resources</i> , applies.	Less Than Significant
<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.16 UTILITIES AND SERVICE SYSTEMS</b>			
<b>WASTEWATER TREATMENT AND COLLECTION</b>			
<b>Impact 5.16-1:</b> Wastewater generated by buildout of the proposed Campus Plan would be adequately conveyed by existing infrastructure and adequately treated by the wastewater service provider for the project site.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>WATER SUPPLY AND DISTRIBUTION SYSTEMS</b>			
<b>Impact 5.16-2:</b> Adequate water supply is available to meet water demands of the	<b>Potentially Significant</b>	USS-1 Prior to issuance of building permits for a new building that increases water demand in the project area, the project applicant shall provide a conditional	Less Than Significant

proposed project; however additional water infrastructure is required to increase groundwater production capacity.		"will serve" letter from the water provider to the City of Duarte and City of Irwindale, as applicable, evidencing that upon compliance with all rules and regulations of the California Public Utilities Commission (CPUC), and all applicable water provider tariffs on file with the CPUC there will be adequate water supply and/or well capacity to serve the demands of that building. Prior to the issuance of a certificate of occupancy for such a new building, the project applicant shall provide a final "will serve" letter from the water provider to the City of Duarte and/or City of Irwindale, as applicable, confirming that all conditions set forth in the conditional "will serve" letter have been satisfied.	
<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>SOLID WASTE</b>			
<b>Impact 5.16-3:</b> Existing and proposed facilities would accommodate project-generated solid waste and comply with related solid waste regulations.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>5.17 ENERGY</b>			
<b>Impact 5.17-1:</b> Existing and planned electricity and natural gas supplies would be able to accommodate project-generated utility demands.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Impact 5.17-2:</b> The proposed project would not result in inefficient, wasteful and unnecessary consumption of energy.	Less Than Significant	No mitigation measures are required.	Less Than Significant
<b>Cumulative Impacts</b>	Less Than Significant	No mitigation measures are required.	Less Than Significant

**Table 5.6-7 Annual Operational Phase GHG Emissions**

Sector	GHG Emissions MTCO <sub>2</sub> e/Year						
	Existing	Phase 1	Phase 2	Phase 3	Full Buildout	Change from Existing	Percent Change from Existing
<b>Land Uses</b>							
Area	2	2	2	2	2	<1	(-19%)
Energy <sup>1</sup>	13,276	18,349	21,373	30,423	31,336	18,061	136%
On-Road Transportation <sup>2</sup>	28,524	23,010	23,125	23,703	25,496	-3,028	(-11%)
Solid Waste Disposal	5,499	4,921	7,577	8,280	8,466	2,967	54%
Water/Wastewater <sup>3</sup>	778	953	1,043	1,104	1,220	442	57%
Amortized Construction <sup>4</sup>	NA	191	366	465	557	557	NA
<b>Total</b>	<b>48,080</b>	<b>47,427</b>	<b>53,487</b>	<b>63,978</b>	<b>67,078</b>	<b>18,998</b>	<b>40%</b>
SCAQMD Bright-Line Threshold	—	—	—	—	—	3,000	—
Exceed Threshold?	—	—	—	—	—	Yes	—
Full Buildout Service Population (SP) <sup>5</sup>	6,448	—	—	—	9,393	2,945	—
MTCO <sub>2</sub> e/SP	7.4	—	—	—	7.1	-0.4	—
2035 Per Service Population Threshold <sup>6</sup>	—	—	—	—	2.3	—	—
Exceed Threshold?	—	—	—	—	Yes	—	—
<b>New Potential Stationary Sources</b>							
<i>Central Utilities Plant – Boiler<sup>7</sup></i>	<i>14,354</i>	<i>14,354</i>	<i>16,970</i>	<i>16,970</i>	<i>19,587</i>	—	—

Source: CalEEMod 2016.3.1. Based on IPCC's AR4 GWPs.

Notes: Totals may not add to 100 percent due to rounding.

<sup>1</sup> Existing residential and nonresidential building energy use modeled using historical energy demand rates in CalEEMod. New buildings would achieve the 2016 Building Energy Efficiency Standards which are 5 percent more energy efficient for nonresidential structures compared to the 2013 Building Energy Efficiency Standards. For purposes of this analysis and per the City of Hope, the proposed data center is assumed to have a non-Title 24 electricity usage rate of 800 kWh per square foot per year.

<sup>2</sup> Transportation emissions are based on trip generation and VMT data provided by Fehr & Peers. Assumed vehicle fleet mix based on the annual average daily trips identified by Caltrans for the segment of Interstate 210 west of interstate 605 (Caltrans 2016a).

<sup>3</sup> Water use is based on the water demand rates provided by KPFF.

<sup>4</sup> Total construction emissions during the buildout period are amortized over a 30-year project lifetime in accordance with SCAQMD guidance and incorporated into the operational emissions analysis.

<sup>5</sup> Service population based on inpatients, outpatients, and full- and part-time employees (Fehr & Peers 2016).

<sup>6</sup> Based on the SCAQMD 2020 per capita target of 4.8 MTCO<sub>2</sub>e per service population and extrapolating it for the mid-term year 2030 GHG reduction target of SB 32 and the long term GHG reduction goals of Executive Order S-03-05 for 2050.

<sup>7</sup> ~~Shown for informational purposes:~~ For purposes of this analysis, it is assumed a new boiler would be installed at the City of Hope central utilities plant in Phase 2 and Phase 4 for a total of two new boiler units. Per CalEEMod methodology, the Energy sector emissions calculated for land uses encompasses emissions associated with boilers, ~~thus boiler emissions shown are not additive.~~ In addition, installation of new or additional boilers and other stationary equipment such as an emergency generator would require a permit to operate from SCAQMD and would be subject to SCAQMD Regulation XIII, New Source Review.



**Table 5.10-9 Existing Conditions Traffic Noise Levels**

Roadway	Segment	Daily Traffic Volumes	Noise Level at 50 Feet (dBA CNEL)	Distance to Noise Contour (feet)		
				70 dBA CNEL	65 dBA CNEL	60 dBA CNEL
Huntington Dr	Mountain Ave to Buena Vista St	21,040	70.9	57	123	264
Huntington Dr	Buena Vista St to Highland Ave	20,240	70.7	56	120	258
Huntington Dr	Highland Ave to Mt Olive Dr	26,680	71.9	67	144	310
Huntington Dr	Mt. Olive Dr to Crestfield Dr	22,380	71.1	59	128	276
Central Ave	I-210 WB On-Ramp to Mountain Ave	9,880	65.4	25	53	114
Central Ave	Mountain Ave to Buena Vista St	12,580	66.4	29	62	134
Central Ave	Buena Vista St to I-210 WB Off-Ramp	11,370	66.0	27	58	125
Central Ave	I-210 WB Off-Ramp to Highland Ave	9,100	65.0	23	50	108
Central Ave	Highland Ave to Santo Domingo Ave	9,820	65.3	24	53	113
Evergreen St	I-210 EB Off-Ramp to Mountain Ave	7,050	63.9	20	42	91
Evergreen St	Mountain Ave to Buena Vista St	7,200	64.0	20	43	92
Evergreen St	Duncannon Ave to Highland Ave	1,980	58.4	8	18	39
Evergreen St	Highland Ave to Santo Domingo Ave	1,130	55.9	6	12	27
Three Ranch Rd	Bradbury Ave to Buena Vista St	410	48.2	2	4	8
Three Ranch Rd	Buena Vista St to Duncannon Ave	1,120	52.6	3	7	16
Business Center Dr	Fairdale Ave to Highland Ave	430	48.4	2	4	8
Business Center Dr	Highland Ave to Santo Domingo Ave	990	52.0	3	7	15
Duarte Rd	California Ave to Mountain Ave	9,900	67.6	34	74	160
Duarte Rd	Mountain Ave to Buena Vista St	10,850	68.0	37	79	170
Duarte Rd	Buena Vista St to Cinco Robles Roberts Dr	13,450	68.9	42	91	196
Duarte Rd	Cinco Robles Roberts Dr to Village Rd	12,380	68.5	40	86	186
Duarte Rd	Village Rd to Hope Dr	10,890	68.0	37	79	170
Duarte Rd	Hope Dr to Circle Rd	9,380	67.3	33	72	154
Duarte Rd	Circle Rd to Highland Ave	10,670	67.9	36	78	168
Arrow Hwy	Longden Ave to Live Oak Ave	32,250	74.0	92	199	428
Arrow Hwy	Live Oak Ave to Avenida Barbosa	23,830	72.7	75	162	350
Arrow Hwy	Avenida Barbosa to I-605 SB Off-Ramp	28,460	73.4	85	183	393
Arrow Hwy	I-605 SB Off-Ramp to I-605 NB On-Ramp	26,140	73.1	80	173	372
Live Oak Ave	Arrow Hwy to I-605 SB On-ramp	19,670	75.0	107	231	497
Live Oak Ave	I-605 SB On-Ramp to I-605 NB Off-Ramp	21,080	75.3	112	242	521
Live Oak Ave	I-605 NB Off-Ramp to Rivergrade Rd	21,860	75.4	115	248	534
Mountain Ave	Huntington Dr to Central Ave	14,240	69.2	44	95	204
Mountain Ave	Central Ave to Evergreen St	13,360	68.9	42	91	195
Mountain Ave	Evergreen St to Duarte Rd	10,790	68.0	37	79	169
Mountain Ave	Duarte Rd to Hurstview	7,040	66.1	27	59	127
Buena Vista St	Royal Oaks Dr to Huntington Dr	7,340	64.5	21	46	99
Buena Vista St	Huntington Dr to Central Ave	10,210	65.9	27	57	124
Buena Vista St	Central Ave to I-210 WB On-Ramp	14,230	67.3	33	72	154
Buena Vista St	I-210 WB On-Ramp to Evergreen St	12,630	66.8	31	66	143

**Table 5.10-9 Existing Conditions Traffic Noise Levels**

Roadway	Segment	Daily Traffic Volumes	Noise Level at 50 Feet (dBA CNEL)	Distance to Noise Contour (feet)		
				70 dBA CNEL	65 dBA CNEL	60 dBA CNEL
Buena Vista St	Evergreen St to Three Ranch Rd	12,300	66.7	30	65	140
Buena Vista St	Three Ranch Rd to Duarte Rd	12,510	66.8	31	66	142
Buena Vista St	Duarte Rd to Village Rd	8,710	65.2	24	52	111
Buena Vista St	Village Rd to Avenida Barbosa	8,420	65.1	23	51	109
Avenida Barbosa	Buena Vista St to Arrow Hwy	12,390	69.8	49	105	226
Duncannon Ave	Central Ave to Evergreen St	1,340	53.4	4	8	18
Duncannon Ave	Evergreen St to Three Ranch Rd	1,380	53.5	4	9	18
Highland Ave	Royal Oaks Dr to Huntington Dr	4,610	62.4	16	34	73
Highland Ave	Huntington Dr to Central Ave	9,650	65.7	26	55	119
Highland Ave	Central Ave to Evergreen St	12,300	66.7	30	65	140
Highland Ave	Evergreen St to Business Center Dr	11,050	66.2	28	61	130
Highland Ave	Business Center Dr to Duarte Rd	10,610	66.1	27	59	127

Source: FHWA Highway Traffic Noise Prediction Model based on traffic volumes provided by Fehr and Peers in 2016. Calculations included in Appendix I.



**Table 5.10-10 Campus Plan Existing Conditions Traffic Noise Increases**

Roadway	Segment	dBA CNEL @ 50 ft.		
		Existing	Existing Plus Project	Project Contribution
Huntington Dr	Mountain Ave to Buena Vista St	70.9	70.9	0.0
Huntington Dr	Buena Vista St to Highland Ave	70.7	70.7	0.0
Huntington Dr	Highland Ave to Mt Olive Dr	71.9	72.0	0.1
Huntington Dr	Mt. Olive Dr to Crestfield Dr	71.1	71.2	0.1
Central Ave	I-210 WB On-Ramp to Mountain Ave	65.4	65.4	0.0
Central Ave	Mountain Ave to Buena Vista St	66.4	66.6	0.2
Central Ave	Buena Vista St to I-210 WB Off-Ramp	66.0	66.1	0.1
Central Ave	I-210 WB Off-Ramp to Highland Ave	65.0	65.0	0.0
Central Ave	Highland Ave to Santo Domingo Ave	65.3	65.3	0.0
Evergreen St	I-210 EB Off-Ramp to Mountain Ave	63.9	63.9	0.0
Evergreen St	Mountain Ave to Buena Vista St	64.0	64.0	0.0
Evergreen St	Duncannon Ave to Highland Ave	58.4	58.4	0.0
Evergreen St	Highland Ave to Santo Domingo Ave	55.9	55.9	0.0
Three Ranch Rd	Bradbury Ave to Buena Vista St	48.2	48.2	0.0
Three Ranch Rd	Buena Vista St to Duncannon Ave	52.6	52.6	0.0
Business Center Dr	Fairdale Ave to Highland Ave	48.4	48.4	0.0
Business Center Dr	Highland Ave to Santo Domingo Ave	52.0	52.0	0.0
Duarte Rd	California Ave to Mountain Ave	67.6	67.7	0.1
Duarte Rd	Mountain Ave to Buena Vista St	68.0	68.1	0.1
Duarte Rd	Buena Vista St to Cinco Robles Roberts Dr	68.9	69.7	0.8
Duarte Rd	Cinco Robles Roberts Dr to Village Rd	68.5	69.4	0.9
Duarte Rd	Village Rd to Hope Dr	68.0	68.6	0.6
Duarte Rd	Hope Dr to Circle Rd	67.3	67.7	0.4
Duarte Rd	Circle Rd to Highland Ave	67.9	68.2	0.3
Arrow Hwy	Longden Ave to Live Oak Ave	74.0	74.0	0.0
Arrow Hwy	Live Oak Ave to Avenida Barbosa	72.7	72.8	0.1
Arrow Hwy	Avenida Barbosa to I-605 SB Off-Ramp	73.4	73.5	0.1
Arrow Hwy	I-605 SB Off-Ramp to I-605 NB On-Ramp	73.1	73.1	0.0
Live Oak Ave	Arrow Hwy to I-605 SB On-ramp	75.0	75.1	0.1
Live Oak Ave	I-605 SB On-Ramp to I-605 NB Off-Ramp	75.3	75.3	0.0
Live Oak Ave	I-605 NB Off-Ramp to Rivergrade Rd	75.4	75.4	0.0
Mountain Ave	Huntington Dr to Central Ave	69.2	69.2	0.0
Mountain Ave	Central Ave to Evergreen St	68.9	68.9	0.0
Mountain Ave	Evergreen St to Duarte Rd	68.0	68.0	0.0

**Table 5.10-10 Campus Plan Existing Conditions Traffic Noise Increases**

Roadway	Segment	dBA CNEL @ 50 ft.		
		Existing	Existing Plus Project	Project Contribution
Mountain Ave	Duarte Rd to Hurstview	66.1	66.1	0.0
Buena Vista St	Royal Oaks Dr to Huntington Dr	64.5	64.5	0.0
Buena Vista St	Huntington Dr to Central Ave	65.9	66.1	0.2
Buena Vista St	Central Ave to I-210 WB On-Ramp	67.3	67.6	0.3
Buena Vista St	I-210 WB On-Ramp to Evergreen St	66.8	67.3	0.5
Buena Vista St	Evergreen St to Three Ranch Rd	66.7	67.5	0.8
Buena Vista St	Three Ranch Rd to Duarte Rd	66.8	67.6	0.8
Buena Vista St	Duarte Rd to Village Rd	65.2	66.0	0.8
Buena Vista St	Village Rd to Avenida Barbosa	65.1	65.6	0.5
Avenida Barbosa	Buena Vista St to Arrow Hwy	69.8	70.2	0.4
Duncannon Ave	Central Ave to Evergreen St	53.4	53.4	0.0
Duncannon Ave	Evergreen St to Three Ranch Rd	53.5	53.5	0.0
Highland Ave	Royal Oaks Dr to Huntington Dr	62.4	62.5	0.1
Highland Ave	Huntington Dr to Central Ave	65.7	65.9	0.2
Highland Ave	Central Ave to Evergreen St	66.7	66.9	0.2
Highland Ave	Evergreen St to Business Center Dr	66.2	66.5	0.3
Highland Ave	Business Center Dr to Duarte Rd	66.1	66.3	0.2

Source: FHWA Highway Traffic Noise Prediction Model based on traffic volumes provided by Fehr & Peers (April 2017). Calculations in Appendix I.

**Table 5.10-11 Campus Plan Buildout Traffic Noise Increases**

Roadway	Segment	dBA CNEL @ 50 ft.		
		Existing	Future Plus Project	Overall Increase
Huntington Dr	Mountain Ave to Buena Vista St	70.9	71.8	0.9
Huntington Dr	Buena Vista St to Highland Ave	70.7	72.1	1.4
Huntington Dr	Highland Ave to Mt Olive Dr	71.9	73.1	1.2
Huntington Dr	Mt. Olive Dr to Crestfield Dr	71.1	71.9	0.8
Central Ave	I-210 WB On-Ramp to Mountain Ave	65.4	65.8	0.4
Central Ave	Mountain Ave to Buena Vista St	66.4	67.5	1.1
Central Ave	Buena Vista St to I-210 WB Off-Ramp	66.0	66.9	1.0
Central Ave	I-210 WB Off-Ramp to Highland Ave	65.0	65.9	0.9
Central Ave	Highland Ave to Santo Domingo Ave	65.3	65.8	0.5
Evergreen St	I-210 EB Off-Ramp to Mountain Ave	63.9	64.6	0.7
Evergreen St	Mountain Ave to Buena Vista St	64.0	64.7	0.7
Evergreen St	Duncannon Ave to Highland Ave	58.4	59.6	1.2
Evergreen St	Highland Ave to Santo Domingo Ave	55.9	56.4	0.5
Three Ranch Rd	Bradbury Ave to Buena Vista St	48.2	49.2	1.0
Three Ranch Rd	Buena Vista St to Duncannon Ave	52.6	53.2	0.7
Business Center Dr	Fairdale Ave to Highland Ave	48.4	48.9	0.4
Business Center Dr	Highland Ave to Santo Domingo Ave	52.0	52.6	0.5
Duarte Rd	California Ave to Mountain Ave	67.6	68.4	0.9
Duarte Rd	Mountain Ave to Buena Vista St	68.0	69.0	1.0
Duarte Rd	Buena Vista St to Cinco Robles Roberts Dr	68.9	71.0	2.0
Duarte Rd	Cinco Robles Roberts Dr to Village Rd	68.5	70.7	2.2
Duarte Rd	Village Rd to Hope Dr	68.0	70.1	2.1
Duarte Rd	Hope Dr to Circle Rd	67.3	69.4	2.1
Duarte Rd	Circle Rd to Highland Ave	67.9	69.7	1.8
Arrow Hwy	Longden Ave to Live Oak Ave	74.0	74.9	0.9
Arrow Hwy	Live Oak Ave to Avenida Barbosa	72.7	74.3	1.6
Arrow Hwy	Avenida Barbosa to I-605 SB Off-Ramp	73.4	74.9	1.5
Arrow Hwy	I-605 SB Off-Ramp to I-605 NB On-Ramp	73.1	74.5	1.5
Live Oak Ave	Arrow Hwy to I-605 SB On-ramp	75.0	76.4	1.4
Live Oak Ave	I-605 SB On-Ramp to I-605 NB Off-Ramp	75.3	76.4	1.1
Live Oak Ave	I-605 NB Off-Ramp to Rivergrade Rd	75.4	76.4	1.0
Mountain Ave	Huntington Dr to Central Ave	69.2	69.7	0.6
Mountain Ave	Central Ave to Evergreen St	68.9	69.4	0.6
Mountain Ave	Evergreen St to Duarte Rd	68.0	68.5	0.6
Mountain Ave	Duarte Rd to Hurstview	66.1	66.6	0.5

**Table 5.10-11 Campus Plan Buildout Traffic Noise Increases**

Roadway	Segment	dBA CNEL @ 50 ft.		
		Existing	Future Plus Project	Overall Increase
Buena Vista St	Royal Oaks Dr to Huntington Dr	64.5	66.0	1.5
Buena Vista St	Huntington Dr to Central Ave	65.9	67.8	1.9
Buena Vista St	Central Ave to I-210 WB On-Ramp	67.3	68.9	1.5
Buena Vista St	I-210 WB On-Ramp to Evergreen St	66.8	68.6	1.8
Buena Vista St	Evergreen St to Three Ranch Rd	66.7	68.8	2.1
Buena Vista St	Three Ranch Rd to Duarte Rd	66.8	68.8	2.0
Buena Vista St	Duarte Rd to Village Rd	65.2	66.7	1.5
Buena Vista St	Village Rd to Avenida Barbosa	65.1	66.3	1.2
Avenida Barbosa	Buena Vista St to Arrow Hwy	69.8	71.2	1.4
Duncannon Ave	Central Ave to Evergreen St	53.4	54.9	1.5
Duncannon Ave	Evergreen St to Three Ranch Rd	53.5	53.9	0.4
Highland Ave	Royal Oaks Dr to Huntington Dr	62.4	63.2	0.7
Highland Ave	Huntington Dr to Central Ave	65.7	67.1	1.4
Highland Ave	Central Ave to Evergreen St	66.7	68.0	1.3
Highland Ave	Evergreen St to Business Center Dr	66.2	67.7	1.5
Highland Ave	Business Center Dr to Duarte Rd	66.1	67.7	1.6

Source: FHWA Highway Traffic Noise Prediction Model based on traffic volumes provided by Fehr & Peers (April 2017). Calculations in Appendix I.