FIRSTCARBON SOLUTIONS™

Fresno Warehouse Project Initial Study/Mitigated Negative Declaration City of Fresno, Fresno County, California

Project Applicant:

Seefried Industrial Properties, Inc.

2321 Rosecrans Avenue, Suite 2220 El Segundo, CA 90245

Contact: Jason Quintel, Senior Vice President, West Region

Prepared for: City of Fresno

Planning and Development Department 2600 Fresno Street, Room 3065 Fresno, CA 93721 559.621.8003

Contact: Jennifer Clark, Planning and Development Director

Prepared by: FirstCarbon Solutions 7726 N. First Street, #413 Fresno, CA 93720

Contact: Mary Bean, Project Director Angela Wolfe, Project Manager

Date: June 30, 2021

714.508.4100





Table of Contents

Acronyms and	Abbreviations	vii
Section 1: Intr	oduction	1
1.1 - P	urpose	1
1.2 - P	roject Location	1
1.3 - E	nvironmental Setting	1
1	.3.1 - Existing Uses	1
1	.3.2 - Historic Uses	2
1	.3.3 - Land Use and Zoning	2
1.4 - P	roject Description	3
1	.4.1 - Building and Design	3
1	.4.2 - Site Access	3
1	.4.3 - Parking and Loading	3
1	.4.4 - Off-site Improvements	4
1	.4.5 - Lighting	4
1	.4.6 - Signage	5
1	.4.7 - Landscaping	5
1	.4.8 - Utilities	5
1	.4.9 - Phasing, Demolition, and Construction	5
1	.4.10 - Operation	6
1	.4.11 - Project Design Features	7
1.5 - R	equired Discretionary Approvals	7
	alifornia Native American Tribal Consultation	
1.7 - Ir	ntended Uses of this Document	8
Section 2: Env	ironmental Checklist and Environmental Evaluation	19
2.1	Aesthetics	20
2.2	Agriculture and Forestry Resources	24
2.3	Air Quality	28
2.4	Biological Resources	
2.5	Cultural Resources and Tribal Cultural Resources	55
2.6	Energy	62
2.7	Geology and Soils	67
2.8	Greenhouse Gas Emissions	74
2.9	Hazards and Hazardous Materials	92
2.10	Hydrology and Water Quality	99
2.11	Land Use and Planning	104
2.12	Mineral Resources	106
2.13	Noise	108
2.14	Population and Housing	117
2.15	Public Services	120
2.16	Recreation	124
2.17	Transportation	126
2.18	Utilities and Service Systems	132
2.19	Wildfire	137
2.20	Mandatory Findings of Significance	140
C	of Preparers	143

Appendix A: Air Quality, Greenhouse Gas Emissions, and Energy Supporting Information	
Appendix B: Biological Resources Supporting Information B.1 - Biological Resources Assessment B.2 - Arborist Report	
Appendix C: Phase I Cultural and Historic Resources Assessment	
Appendix D: Geology and Soils Supporting Information D.1 - Geotechnical Exploration D.2 - Paleontological Records Search Results	
Appendix E: Hazards and Hazardous Materials Supporting Information E.1 - Phase I Environmental Site Assessment E.2 - Hazardous Materials Survey	
Appendix F: Hydrology and Water Quality Supporting Information F.1 - Preliminary Drainage Memo F.2 - Water Supply Assessment	
Appendix G: Noise Impact Analysis Report	
Appendix H: Public Services Supporting Information H.1 - Public Service Letters H.2 - Public Service Letters Responses	
Appendix I: Traffic Supporting Information I.1 - Trip Generation Validation Memorandum I.2 - Vehicle Miles Traveled Analysis	
List of Tables	
Table 1: Existing On-site and Off-site Land Uses	2
Table 2: Parking and Loading	4
Table 3: Construction Air Pollutant Emissions	.32
Table 4: Operational Air Pollutant Emissions (2022)	.33
Table 5: Maximum On-site Daily Air Pollutant Emissions During Construction (Unmitigated)	.35
Table 6: Maximum On-site Daily Air Pollutant Emissions During Construction (Mitigated)	.36
Table 7: Maximum On-site Daily Air Pollutant Emissions During Operations	.37
Table 8: Estimated Health Risks and Hazards During Project Construction (Unmitigated)	.42
Table 9: Estimated Health Risks and Hazards During Project Construction After Incorporation of Mitigation Measure AIR-1	.42
Table 10: Screening Levels for Potential Odor Sources	.43
Table 11: Estimated Annual Project Energy Consumption	.63

Table 13: Summary of Appliable Greenhouse Gas Regulations	79
Table 14: Project Operational Greenhouse Gases 2022	80
Table 15: Project Operational Greenhouse Gases 2030	81
Table 16: Consistency with SB 32 2017 Scoping Plan Update	89
Table 17: Asbestos-containing Material Survey Results	94
Table 18: Typical Construction Equipment Maximum Noise Levels, L _{max}	110
Table 19: Residential Development Capacity Under Horizon and Buildout	117
Table 20: Proposed Project Trip Generation	126
Table 21: Landfill Facility Detail	134
List of Exhibits	
Exhibit 1: Regional Location Map	9
Exhibit 2: Local Vicinity Map	11
Exhibit 3: Existing General Plan Land Use	13
Exhibit 4: Existing Zoning	15
Exhibit 5: Site Plan	17



ACRONYMS AND ABBREVIATIONS

μg/m³ micrograms per cubic meter

°F degrees Fahrenheit

°C degrees Celsius (Centigrade)

AB Assembly Bill

ABM Activity Based Model

ACCM asbestos-containing construction material

ACM asbestos-containing materials

ADT Average Daily Traffic

AFY acre-feet per year

AQMP Air Quality Management Plan

AQP Air Quality Plan

ARB California Air Resources Board

BERD California Built Environment Resource Directory

BMP Best Management Practice

BRA Biological Resources Assessment

CalEEMod California Emissions Estimator Model

CAL FIRE California Department of Forestry and Fire Protection

CalRecycle California Department of Recycling and Recovery
CAPCOA California Air Pollution Control Officers Association

Cal/OSHA California Occupational Safety and Health Administration

Caltrans California Department of Transportation

CBC California Building Standards Code

CDC Centers for Disease Control and Prevention
CDFW California Department of Fish and Wildlife

CEQA California Environmental Quality Act
CNDDB California Natural Diversity Database
CNEL Community Noise Equivalent Level

CNPS California Native Plant Society

CNPSEI California Native Plant Society Electronic Inventory

CO carbon monoxide
CO₂ carbon dioxide

COG Council of Governments

CRHR California Register of Historical Resources

dB decibel

dBA A-weighted decibel

FirstCarbon Solutions vii

DBH diameter at breast height DPM diesel particulate matter

DPU Department of Public Utilities

DTSC California Department of Toxic Substances Control

EOP Emergency Operations Plan

EPA United States Environmental Protection Agency

EVA Emergency Vehicle Access

FAR floor area ratio

FCS FirstCarbon Solutions

FEMA Federal Emergency Management Agency

FHSZ Fire Hazard Severity Zone
FMC Fresno Municipal Code

FMMP Farmland Mapping and Monitoring Program

FTA Federal Transit Administration
FUSD Fresno Unified School District

GAMAQI Guide for Assessing and Mitigating Air Quality Impacts

GPD gallons per day gpm gallons per minute

HCP Habitat Conservation Plan

HI hazard index

HRA Health Risk Assessment

HVAC heating, ventilation, and air conditioning

IL Light Industrial In/sec inch per second

IS/MND Initial Study/Mitigated Negative Declaration

ITE Institute of Transportation Engineers

kBTU kilo-British Thermal Unit

Kimley-Horn and Associates, Inc.

kWh kilowatt-hour LBP lead-based paint

L_{dn} day/night average sound level

L_{eq} equivalent continuous sound level

L_{max} maximum noise/sound level

LOS Level of Service

LRA Local Responsibility Area

MEIR Master Environmental Impact Report

mgd million gallons per day

MHMP Multi-Jurisdictional Local Hazzard Mitigation Plan

MM Mitigation Measure

mph miles per hour

MRZ Mineral Resource Zone

NAHC Native American Heritage Commission

NCCP Natural Community Conservation Plan

NESHAP National Emissions Standards for Hazardous Air Pollutants

NFWRF North Fresno Wastewater Reclamation Facility

NO₂ nitrogen dioxide NO_x oxides of nitrogen

NPDES National Pollutant Discharge Elimination System

NRHP National Register of Historic Places

OEHHA California Office of Environmental Health Hazard Assessment

OSHA Occupational Safety and Health Administration

PCE Passenger Car Equivalent

PG&E Pacific Gas and Electric Company

PM₁₀ particulate matter, including dust, 10 micrometers or less in diameter PM_{2.5} particulate matter, including dust, 2.5 micrometers or less in diameter

ppm parts per million

PPV peak particle velocity

RACM Regulated Asbestos-containing Materials

REL Reference Exposure Level

ROG reactive organic gas

RTP/SCS Regional Transportation Plan/Sustainable Communities Strategy

RWRF Regional Wastewater Reclamation Facility

RWQCB Regional Water Quality Control Boar

SB Senate Bill

SMARA California Surface Mining and Reclamation Act

SO₂ sulfur dioxide SO_x sulfur oxide

SRA State Responsibility Area

SSJVIC Southern San Joaquin Valle Information Center
State Water Board California State Water Resources Control Board

SWPPP Storm Water Pollution Prevention Plan

TAC toxic air contaminants
TCR Tribal Cultural Resource

UCMP University of California Museum of Paleontology

USGS United States Geological Survey

UCMP University of California Museum of Paleontology

UWMP Urban Water Management Plan

Valley Air District San Joaquin Valley Air Pollution Control District

VMT Vehicle Miles Traveled

VOC volatile organic compound

WMD Wastewater Management Division

WMP Water Master Plan

WSA Water Supply Assessment

WSCP Water Shortage Contingency Plan

XRF X-Ray Fluorescence

SECTION 1: INTRODUCTION

1.1 - Purpose

The purpose of this Draft Initial Study/Mitigated Negative Declaration (Draft IS/MND) is to identify any potential environmental impacts that would result from implementation of the Fresno Warehouse Project (proposed project) in the City of Fresno, California. Pursuant to California Environmental Quality Act (CEQA) Guidelines Section 15367, City of Fresno has discretionary authority over the proposed project and is the Lead Agency in the preparation of this Draft IS/MND and additional environmental documentation required for the project. The intended use of this document is to determine whether the proposed project may have a significant effect on the environment pursuant to CEQA, identify potential feasible mitigation measures, and to provide the basis for input from public agencies, organizations, and interested members of the public.

The remainder of this section provides a brief description of the project location and the primary project characteristics. Section 2 includes an environmental checklist that provides an overview of the potential impacts that may result from project implementation, elaborates on the information contained in the environmental checklist, and provides justification for each checklist response. References cited in this Draft IS/MND are included in Section 3, and Section 4 contains the List of Preparers.

1.2 - Project Location

The proposed project site is located in Fresno, California. Fresno is surrounded by the City of Clovis to the north, the City of Sanger to the east, the City of Hanford to the south, and the City of Kerman to the west (Exhibit 1). The 43.59-gross-acre project site is located south of East Olive Avenue, between North Minnewawa Avenue and North Clovis Avenue, and encompasses Assessor's Parcel Numbers (APNs) 456-030-18 and 456-030-56 (Exhibit 2). The project site is located within Township 13S, Range 21E, Sections 28, 29, 30, 31, 32, and 33 of the *Clovis, California,* United States Geological Survey (USGS) 7.5-minute Topographic Quadrangle Map.

The project site is surrounded by a vacant lot, East Olive Avenue, an Arco gas station, an existing AT&T building, and Fresno Metropolitan Flood District offices to the north, E & J Gallo Winery to the east, single-family homes and California State Route (SR) 180 to the south, and single-family homes to the west. A detention pond is located southwest of the project site, just outside the project boundary.

1.3 - Environmental Setting

1.3.1 - Existing Uses

The majority of the 43.59 acre project site is currently vacant, while the northern portion contains an existing paved parking area with eucalyptus trees that is utilized for a weekly swap meet. The northwestern portion of the project site contains an occupied single-family residence and swimming pool. Table 1 shows the breakdown of existing uses within the project site and adjoining off-site improvement areas. Further description of the proposed off-site roadway improvements is included below in Section 1.4.4.

APN	Existing Land Uses	Acre(s)
456-030-18	Single-family residence	2.2
456-030-56	Paved parking lot	10.65
456-030-56	Vacant fields	30.74
Off-site Improvements	Existing roadway	0.90

1.3.2 - Historic Uses

Historical aerials indicate that the existing single-family residence has occupied APN 456-030-18 since 1957. APN 456-030-56 has been used for agricultural purposes since 1946, when orchards, row crops, and a cluster of buildings were present in the southern portion of the parcel. Agricultural uses ceased on-site in the early 1980s. Small structures appeared in the eastern portion of this parcel by 1984, and the northern portion of the parcel appears to have been cleared and possibly graded. The structures in the southern portion are no longer present by 1984, and it was indicated in an interview with the current owner that these burned down. In 1998, the northern portion of the site was converted into a paved parking lot. The structures in the eastern portion of the site are no longer present as of 2018.¹

Based on historical aerials, the area to the north, east, and appear to have been used for agriculture purposes as early as 1962. However, aerial photography from 1962 shows residential homes to the west and what appears to be E & J Gallo Winery to the east.²

1.3.3 - Land Use and Zoning

The project site parcels are designated as Light Industrial (IL) by the Fresno General Plan (Exhibit 3),³ and the site is zoned IL as depicted on the City of Fresno Official Zoning Map (Exhibit 4).⁴

The IL land use designation allows for a range of light industrial uses, including limited manufacturing and processing, fabrication, research and development, utility equipment and service yards, wholesaling, warehousing, and distribution activities. Small scale retail and ancillary uses are also permitted. The maximum floor area ratio (FAR) allowed under the IL designation is 1.5.⁵

The land use designations for the parcels surrounding the project site include the following:

- North: Light Industrial
- South: Medium High Density Residential, Regional Commercial, and Ponding Basin

2

¹ Geosyntec Consultants. 2020. Phase I Environmental Site Assessment. November 30.

² Historic Aerials. 2020. Website: https://www.historicaerials.com/viewer#. Accessed December 3, 2020.

³ City of Fresno. 2017. Land Use and Circulation Map. Website: https://www.fresno.gov/publicworks/wp-content/uploads/sites/17/2017/10/5-City-of-Fresno-General-Plan-Land-Use-and-Circulation-Map.pdf. Accessed October 9, 2020.

City of Fresno. 2020. Official City Zoning Map. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2020/09/Official-Zoning-Map-20200923.pdf. Accessed October 9, 2020.

⁵ City of Fresno. 2014. General Plan. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2019/07/Consolidated-GP-7-2019.pdf. Accessed October 9, 2020.

3

• East: Heavy Industrial

• West: Medium Low Density Residential

The project site is located within the Roosevelt Community Plan area. The Roosevelt Community Plan was adopted by the City in April 1992⁶.

1.4 - Project Description

The project applicant, Seefried Industrial Properties, proposes to demolish the existing single-family residence at the northwestern portion of the site and construct a delivery station building totaling up to 184,000 square feet, which would include an approximately 161,300-square-foot warehouse, office space totaling up to 22,000 square feet, 17 dock-high doors, and 18 grade-level doors (Exhibit 5). Proposed project features, including building and design, site access, parking and loading, roadway improvements, lighting, signage, and landscaping are discussed below.

1.4.1 - Building and Design

The proposed delivery station would be composed of tilt-up wall concrete panels with pre-finished metal components on the exterior to mark the building access and contribute to the overall building aesthetic. The building would also incorporate other materials, including wood, plastics, composites, and glass. The overall project design would adhere to the design standards determined by the project tenant and approved by the City of Fresno.

1.4.2 - Site Access

Regional access to the site is available via SR-180 at the North Clovis Avenue exit. Local access to the site is provided via East Olive Avenue, North Clovis Avenue, and North Minnewawa Avenue. Access to the site would be provided via two 30-foot driveways and one 24-foot driveway along East Olive Avenue, one 36-foot driveway along North Clovis Avenue, and one 20-foot driveway along North Minnewawa Avenue. The driveway along North Minnewawa Avenue would be designated for Emergency Vehicle Access (EVA) only, and the driveway along North Clovis Avenue would be a designated Associate Only entrance/exit. Additionally, the proposed project design would provide a minimum 25-foot fire lane around the building to allow for emergency access.

1.4.3 - Parking and Loading

The proposed project would provide a total of 1,443 parking spaces on-site, which includes 564 automobile parking spaces, 868 van spaces, and 11 American with Disabilities Act (ADA) accessible automobile/van spaces. The proposed project would also include 13 trailer spaces, 17 loading dock spaces, 90 Utility Tractor Rig (UTR)/van loading spaces, and 90 van staging spaces. Van loading and staging areas would be located to the north and south of the delivery station building. Designated van parking areas would be located west, northwest, north, and south of the delivery station building, and associate parking would be located east of the building, along North Clovis Avenue. The breakdown of each parking and loading space is summarized in Table 2 below.

FirstCarbon Solutions

⁶ City of Fresno. 1992. Roosevelt Community Plan. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2016/11/RooseveltCommunityPlan.pdf. Accessed October 9, 2020.

Table 2: Parking and Loading

Parking Space Type	Number of Spaces
Automobile Spaces	564
ADA Spaces	11
Van Spaces	868
Total Parking Spaces	1,443
Trailer Spaces	13
Loading Dock Spaces	17
UTR/Van Loading Spaces	90
Van Staging Spaces	90
Notes: ADA = American with Disabilities Act UTR = Utility Tractor Rig	

1.4.4 - Off-site Improvements

Along North Minnewawa Avenue, the proposed project would construct half-width improvements consisting of pavement, curb and gutter, parkway, and sidewalk improvements on the east side of the centerline. A curb return would be constructed on the southeast corner of North Minnewawa Avenue and East Olive Avenue. A single commercial driveway would be constructed to provide EVA to the site from North Minnewawa Avenue. There is no anticipated right-of-way dedication required along North Minnewawa Avenue.

Along East Olive Avenue, the proposed project would construct sidewalk and landscape improvements on the south side of the centerline (northwest corner of proposed project site). Three commercial driveway would be constructed to provide project site access from East Olive Avenue. Existing sidewalk along the south side of centerline would be upgraded for ADA compliance. No right-of-way dedication along East Olive Avenue would be required.

Along North Clovis Avenue, one commercial driveway would be constructed Existing sidewalk along the west side of the centerline would be upgraded for ADA compliance. In addition, the proposed project would include a 26-foot-wide easement for bike, pedestrian, and landscape purposes. The proposed project would not require any improvements within the California Department of Transportation (Caltrans) right-of-way located immediately south of the project site.

1.4.5 - Lighting

Exterior lighting would be designed to meet applicable Fresno Municipal Code (FMC) requirements. Given that the proposed project would operate 24 hours a day, 7 days a week and store consumer

goods on-site, lighting would be designed to maximize employee safety and security while complying with FMC standards, including Section 15-2508, Lighting and Glare, ⁷ to address adjacency issues.

1.4.6 - Signage

Signage in and around the site would be specific to the tenant and would comply with all applicable FMC requirements. This would include compliance with the provisions outlined in Article 26, Signs, related to sign design, type, measurement, illumination, height, and clearance.⁸

1.4.7 - Landscaping

The proposed project would include approximately 443,000 square feet of landscaping consisting of grass, groundcover, shrubs, and trees. Landscape design and plant species would be selected to ensure low-maintenance installation, and irrigation would comply with FMC Section 6-522, Water Efficient Landscape Standards. Landscaping would be included throughout the project site to break up parking areas and reduce heat absorption on-site, and would comply with the requirements outlined in FMC Article 23, Landscape, related to design, maintenance, irrigation, installation, and maintenance. Landscape in the project site to break up parking areas and reduce heat absorption on-site, and would comply with the requirements outlined in FMC Article 23, Landscape, related to design, maintenance, irrigation, installation, and maintenance.

1.4.8 - Utilities

The proposed project is currently served by the following utility providers:

- Electricity: Pacific Gas and Electric Company (PG&E)
- Natural Gas: PG&E
- Sewer and Wastewater: City of Fresno Department of Public Utilities (DPU) Wastewater Management Division (WMD)
- Potable Water: Bakman Water Company
- Trash Disposal and Recycling: City of Fresno Solid Waste Management Division, Mid-Valley Disposal
- Telecommunications: AT&T

1.4.9 - Phasing, Demolition, and Construction

For the purposes of this environmental analysis, the following construction schedule was assumed. Demolition of the single-family residence in the northwestern portion of the site would occur in July

FirstCarbon Solutions 5

City of Fresno. 2020. Fresno Municipal Code (FMC). Section 15-2508, Lighting and Glare. Website: https://library.municode.com/ca/fresno/codes/code_of_ordinances?nodeId=MUCOFR_CH15CIDECOINRE_PTIIIREAPSOALDI_ART25 PEST_S15-2508LIGL. Accessed December 9, 2020.

⁸ City of Fresno. 2020. Fresno Municipal Code (FMC). Chapter 15, Article 26, Signs. Website: https://library.municode.com/ca/fresno/codes/code_of_ordinances?nodeId=MUCOFR_CH15CIDECOINRE_PTIIIREAPSOALDI_ART26 SI. Accessed December 9, 2020.

⁹ City of Fresno. 2020. Fresno Municipal Code (FMC). Section 6-522, Water Efficient Landscape Standards. Website: https://library.municode.com/ca/fresno/codes/code_of_ordinances?nodeld=MUCOFR_CH6MUSEUT_ART5WARE_S6-522WAEFLAST. Accessed November 12, 2020.

City of Fresno. 2020. Fresno Municipal Code (FMC). Chapter 15, Article 23, Landscape. Website: https://library.municode.com/ca/fresno/codes/code_of_ordinances?nodeld=MUCOFR_CH15CIDECOINRE_PTIIIREAPSOALDI_ART23 LA. Accessed December 9, 2020.

2021. Grading of the proposed project site would start in August 2021. Grading of the site would take approximately 20 days. Construction would be completed in one phase, beginning in September 2021, and concluding in June 2022. The proposed project is expected to be operational in the third quarter of 2022.

1.4.10 - Operation

The proposed project would be occupied by a single tenant with the purpose of fulfilling internet purchases. The proposed project would operate 24 hours a day/7 days a week and would employ approximately 545 total employees over a 24-hour period for each operation, which includes on-site delivery station employees, delivery drivers, and flex employees.

Delivery Station

The proposed delivery station would serve as a "last mile" connection between the user's fulfillment centers and their customers, enabling a faster and more efficient means of shipping. Packages would be transported to the delivery stations via line-haul trucks (18-wheeler trailer trucks) from neighboring fulfillment/sorting centers, where they would be further sorted, picked, and loaded into small delivery vehicles (typically vans) and delivered to customers.

The proposed delivery station would operate 24 hours a day/7 days a week to support delivery of packages to customer locations between 11:00 a.m. and 9:00 p.m.

It is anticipated that 25 line-haul trucks would deliver shipments from nearby distribution centers to the delivery station on a daily basis between 10:00 p.m. and 8:00 a.m. Packages would be sorted, assigned to the delivery routes, placed onto movable racks, and staged for dispatch. The proposed project would employ approximately 221 employees within the delivery station, divided into the following shifts:

- 115 employees working 2:00 a.m. to 12:30 p.m.
- 35 employees working 6:00 a.m. to 2:30 p.m.
- 35 employees working 1:30 p.m. to 10:00 p.m.
- 36 employees working 12:00 p.m. to 10:30 p.m.

Package Delivery

Delivery Drivers

The delivery operations would utilize 254 delivery employees who would commute to the delivery station daily via private vehicles. Each delivery employee would pick up their assigned delivery van, load a day's worth of packages, make those deliveries, return to the project site, drop off the delivery van, and exit the site in personal vehicles. Delivery operations would begin at 10:00 a.m. and end at 11:30 a.m., and delivery employees would return to the delivery station between 7:00 p.m. and 9:00 p.m.

Flex Employees

The proposed project would also employ approximately 70 flex employees, which are private contractors who use personal vehicles for deliveries. Flex employees would be contacted via an application downloaded to a mobile device and instructed when to arrive at the delivery station where they would load vehicles and be routed to their assigned delivery zones in a similar manner to the delivery van process described above. Flex employee arrivals would be staggered, with employees arriving at the facility between 4:00 p.m. and 4:30 p.m. to load their vehicles for deliveries. These employees would not return to the delivery station at the end of their delivery shifts.

1.4.11 - Project Design Features

The project applicant has proposed and incorporated the following project design features (PDFs) in accordance with technical recommendations:

Greenhouse Gas Emissions

- 1. The project shall incorporate infrastructure for electric vehicle charging stations into a minimum of 8 percent of all vehicle parking spaces (including parking for trucks), consistent with the applicable California Green Building Standards Code Tier 1 Non-residential Mandatory Measure (Section A5.106.5.3). Electric vehicle charging spaces must provide electrical vehicle charging infrastructure to support future installation of electric vehicle supply equipment and shall meet the design space requirements of California Green Building Standards Code Section 5.106.5.3.2.
- 2. The project building shall be designed to provide infrastructure to support the use of electric-powered equipment, exterior yard trucks, and/or other on-site vehicles. The project building shall also be constructed with the appropriate infrastructure (e.g., electrical conduits) to facilitate sufficient electric charging for trucks to plug in, in anticipation of future technology that allows trucks to operate partially on electricity.

1.5 - Required Discretionary Approvals

As mentioned previously, the City of Fresno has discretionary authority over the proposed project and is the CEQA Lead Agency for the preparation of this Draft IS/MND. In order to implement the project, the applicant would need to secure the following permits/approvals:

- Approval of the IS/MND
- Development Plan review and approval
- Comprehensive Application for Development and Land Use approval
- Grading and Building permits
- Tree Removal Permit
- Demolition Permit

FirstCarbon Solutions 7

1.6 - California Native American Tribal Consultation

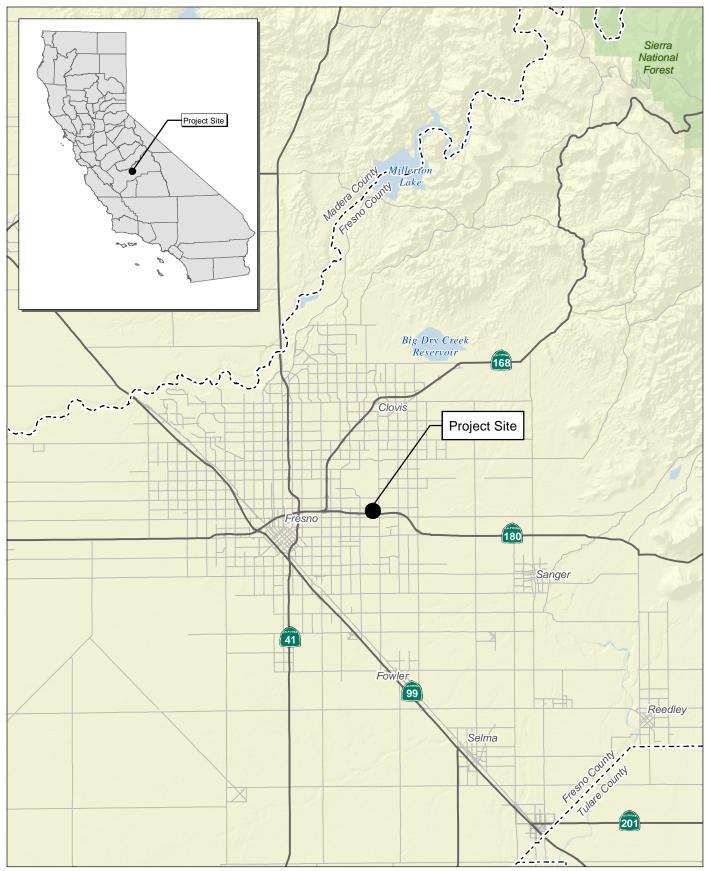
Have California Native American tribes traditionally and culturally affiliated with the project area requested consultation pursuant to Public Resources Code Section 21080.3.1? If so, is there a plan for consultation that includes, for example, the determination of significance of impacts to tribal cultural resources, procedures regarding confidentiality, etc.?

In accordance with Assembly Bill (AB) 52, the City of Fresno sent out AB-52 consultation letters to all requesting tribes on April 13, 2021. The City did not receive any responses during the 30-day consultation period. Please refer to Section 2.5, Cultural Resources and Tribal Cultural Resources.

1.7 - Intended Uses of this Document

This Draft IS/MND has been prepared to determine the appropriate scope and level of detail required in completing the environmental analysis for the proposed project. This document will also serve as a basis for soliciting comments and input from members of the public and public agencies regarding the proposed project. The Draft IS/MND will be circulated for a minimum of 30 days, during which comments concerning the analysis contained in the Draft IS/MND should be sent to:

Jennifer Clark, Planning and Development Director City of Fresno Planning and Development Department 2600 Fresno Street, Room 3065 Fresno, CA 93721 559.621.8003



Source: Census 2000 Data, The California Spatial Information Library (CaSIL).

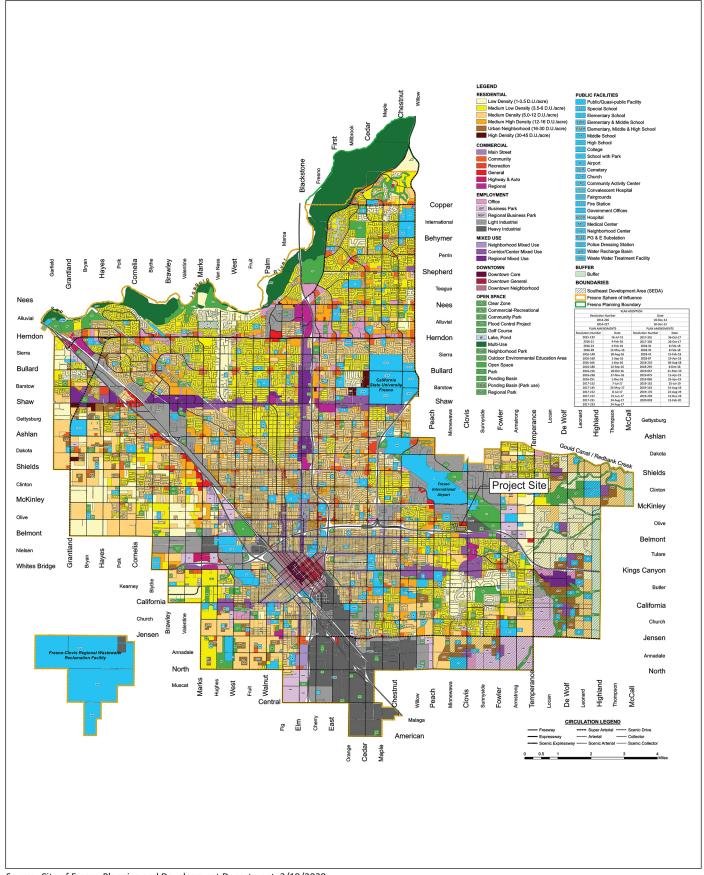




Source: Google Earth Aerial Imagery, 2019. Kimley-Horn, 2020.

Exhibit 2 Local Vicinity Map



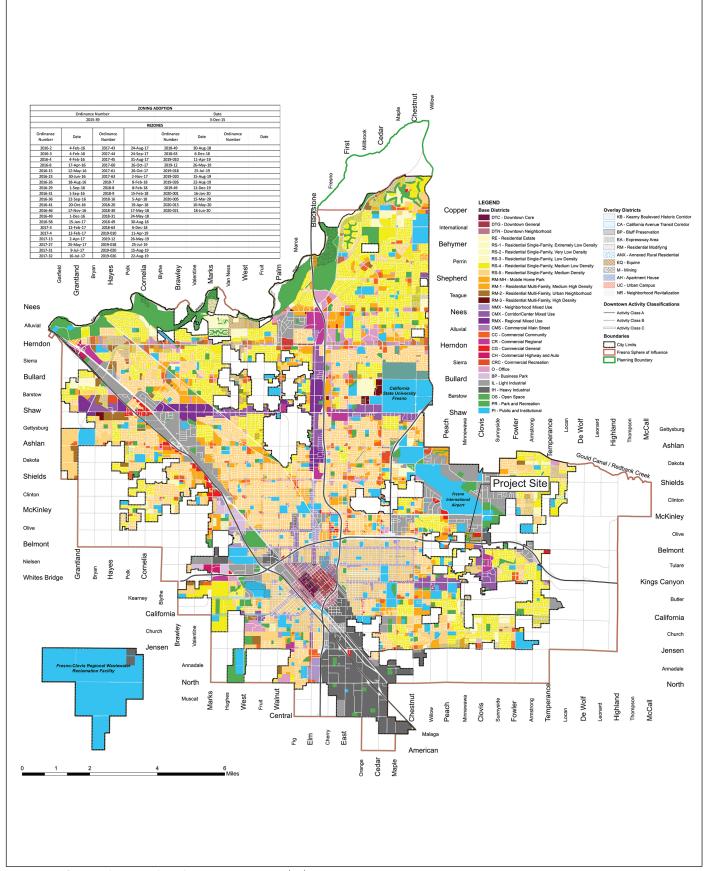


Source: City of Fresno Planning and Development Department, 3/19/2020.



Exhibit 3 Existing General Plan Land Use



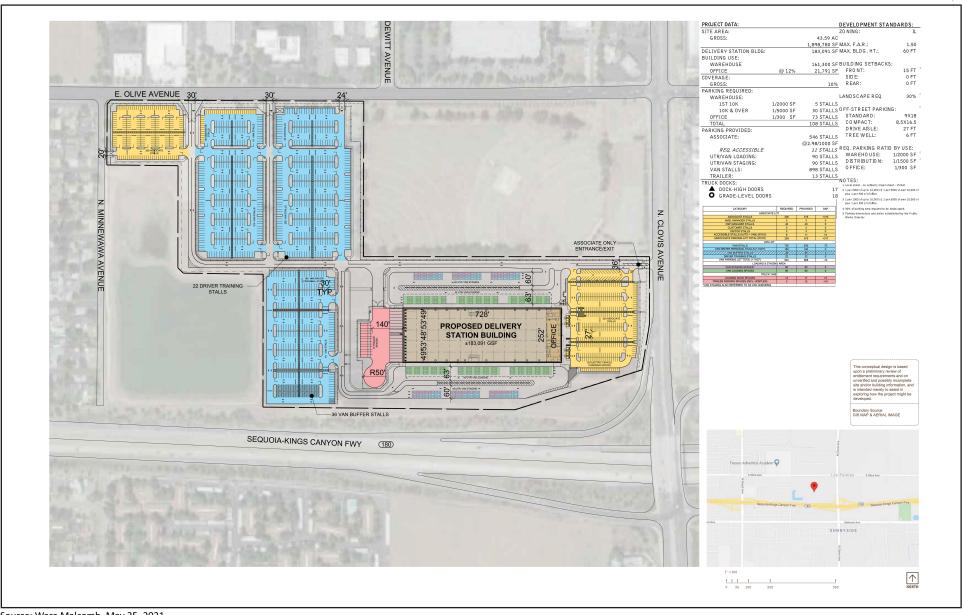


Source: City of Fresno Planning and Development Department, 9/23/2020.



Exhibit 4 Existing Zoning





Source: Ware Malcomb, May 25, 2021.



Exhibit 5 Site Plan



SECTION 2: ENVIRONMENTAL CHECKLIST AND ENVIRONMENTAL EVALUATION

Environmental Factors Potentially Affected						
The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a "Potentially Significant Impact" as indicated by the checklist on the following pages.						
	Aesthetics		Agriculture and Forestry Resources	\boxtimes	Air Quality	
\boxtimes	Biological Resources		Cultural Resources		Energy	
	Geology/Soils		Greenhouse Gas Emissions	\boxtimes	Hazards/Hazardous Materials	
	Hydrology/Water Quality		Land Use/Planning		Mineral Resources	
	Noise		Population/Housing		Public Services	
	Recreation		Transportation		Tribal Cultural Resources	
	Utilities/Services Systems		Wildfire	\boxtimes	Mandatory Findings of Significance	
			Environmental Determination			
On t	he basis of this initial evalua	tion:				
 I find that the proposed project COULD NOT have a significant effect on the environment, and a NEGATIVE DECLARATION will be prepared. I find that although the proposed project could have a significant effect on the environment, there will not be a significant effect in this case because revisions in the project have been made by or agreed to by the project proponent. A MITIGATED NEGATIVE DECLARATION will be prepared. 						
I find that the proposed project MAY have a "potentially significant impact" or "potentially significant unless mitigated" impact on the environment, but at least one effect 1) has been adequately analyzed in an earlier document pursuant to applicable legal standards, and 2) has been addressed by mitigation measure based on the earlier analysis as described on attached sheets. An ENVIRONMENTAL IMPACT REPORT is required, but it must analyze only the effects that remain to be addressed.						
I find that although the proposed project could have a significant effect on the environment, because all potentially significant effects (a) have been analyzed adequately in an earlier EIR or NEGATIVE DECLARATION pursuant to applicable standards, and (b) have been avoided or mitigated pursuant to that earlier EIR or NEGATIVE DECLARATION, including revisions or mitigation measures that are imposed upon the proposed project, nothing further is required. Date: 06/08/2011 Signed: Roll How						

Environmental Issues 2.1 Aesthetics Except as provided in Public Resources Code Section 2	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a) Have a substantial adverse effect on a scenic vista?				\boxtimes
b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic building within a State Scenic Highway?				
c) In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?				
d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?				

Environmental Evaluation

Setting

This section provides a description of existing visual conditions at, and near, the project site and an assessment of changes to those conditions that would occur from implementation of the project. Review of the City of Fresno General Plan provides a basis for the description and analysis in this section.

A project's effect on the visual environment is generally defined in the following terms: (1) a project's physical characteristics and potential visibility, (2) the extent to which the project's presence would change the perceived visual character and quality of the environment where it would be located, and (3) the expected level of sensitivity that the viewing public may have in areas where project facilities would alter existing views.

The aesthetic quality of a community is composed of visual resources, which are physical features that make up the visible landscape including land, water, vegetation, and the built environment (e.g., buildings, roadways, and structures).

The City of Fresno is located in the San Joaquin Valley, and is surrounded by the San Joaquin River (north) and agricultural and rural residential land uses.

Visual Setting

Views of the project site from SR-180 are partially obstructed by a small hill, while views from North Minnewawa Avenue are mostly obstructed by trees and vegetation. Views of the project site from other nearby roadways, such as East Olive Avenue and North Clovis Avenue, are completely unobstructed. There are no significant views in or around the project site.

Regulatory Setting

The Fresno General Plan does not identify scenic vistas or protected visual resources. The Fresno General Plan Objectives contain suggested policies related to building design standards, lighting and glare, increased scenic opportunities, and the preservation and enhancement of vegetation and wildlife.

The FMC lighting and glare standards in Section 15-2508 state that light must be deflected away from adjacent propeties and streets and cannot exceed 0.5 foot-candle when cast on properties with residential zoning and uses. It also states that glare must be mitigated to prevent disruption of surrounding properties

Would the project:

a) Have a substantial adverse effect on a scenic vista?

No impact. The Fresno General Plan does not identify scenic vistas or protected visual resources. ¹¹ As previously described, there are no significant views from the project site. As a result, the proposed project would not have a substantial adverse effect on a scenic vista, therefore, no impact would occur.

b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic building within a State Scenic Highway?

Less than significant impact. According to the Caltrans State Scenic Highways Lists, the City of Fresno does not have any officially designated State Scenic Highways. ¹² The nearest officially designated highway is approximately 55 miles east near the General Grant Grove Section of Kings Canyon National Park. ¹³ This condition precludes the potential for substantial damage to scenic resources within view of a State Scenic Highway. Therefore, no impact would occur.

The Fresno General Plan designates scenic corridors and drives as scenic resources. The nearest scenic corridor begins approximately 1 mile from the project site at North Minnewawa Avenue and Belmont Avenue and does not intersect with the project site nor is it visible from the project site. As a result, the proposed project would not substantially damage scenic resources. Therefore, impacts would be less than significant.

_

City of Fresno. 2014. City of Fresno General Plan. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2019/07/ConsolidatedGP6182020.pdf Accessed: January 19, 2021.

California Department of Transportation (Caltrans). July 2019. Scenic Highway Systems Lists. Website: https://dot.ca.gov/programs/design/lap-landscape-architecture-and-community-livability/lap-liv-i-scenic-highways. Accessed December 10, 2020.

¹³ Ibid.

c) In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?

Less than significant impact. Neither the project site nor other properties in the project vicinity provide substantial views of any water bodies, mountains, hilltops, or any other significant visual resources. The proposed project is consisent with the existing visual character of the area. As detailed previously, the area to the north of site is composed of the Fresno Metropolitan Flood District; to the west and south are residential homes; and to the east is E & J Gallo Winery. The project site is adjacent to SR 180, the main east-west roadway in the City of Fresno. The project site is located within a vacant lot in an IL land use designation, which allows for light industrial uses including warehousing and distribution activities, and allows for a 1.5 maximum FAR. The project site has an FAR of approximately 0.10. As a result, the proposed project would be well within the zoning requirements. Aditionally, the proposed project would conform to all applicable development standards and design guidelines of the Fresno General Plan that regulate scenic quality. As discussed in Impact 2.1(b), the Fresno General Plan designates scenic corridors and drives as scenic resources. The nearest scenic corridor begins approximately 1 mile away from the project site at North Minnewa Avenue and Belmont Avenue and does not interact with the project site. ¹⁴ Because of the distance to the nearest scenic corridor and the intervening toporaphy, there are no public views of the site or of its surroundings. As a result, the proposed project would not conflict with applicable regulations governing scenic quality. Therefore, impacts would be less than significant.

d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?

Less than significant impact. Sources of daytime glare include direct beam sunlight and reflections from windows, architectural coatings, glass, and other reflective surfaces. Nighttime illumination and associated glare are generally divided into two sources: stationary and mobile. Stationary sources include structure lighting and decorative landscaping, lighted signs, and streetlights. Mobile sources are primarily headlights from motor vehicles. Existing light and glare near the project come from the residential homes to the west of the project site, from the E & J Gallo Winery to the east of the project site, and from the Arco gas station and fast food restaurant on East Olive Avenue.

Additionally, existing light and glare come from the street lights and traffic lights along North Clovis Avenue and East Olive Avenue.

The proposed project would operate 24 hours a day/7 days a week, and would result in new sources of daytime and nighttime lighting such as street lights, and exterior and interior lighting. Although, the proposed project would result in new sources of light and glare, the site is located in an industrial area that already contains existing sources of light and glare. Exterior lighting would be designed to meet applicable FMC requirements, including Section 15-2508, Lighting and Glare, to address adjacency issues. Furthermore, the proposed project would be required to implement

-

City of Fresno. 2014. Fresno General Plan. Mobility and Transportation. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2019/07/ConsolidatedGP6182020.pdf Accessed: January 19, 2021.

General Plan Master Environmental Impact Report (MEIR) mitigation measure (MM) MM AES-1, MM AES-3, and MM AES-4. Implementation of these measures would reduce light spillover onto adjacent properties. The proposed project would be primarily constructed of tilt wall concrete panels that minimize glare, which would ensure consistency with General Plan MEIR MM AES-5. As a result, the proposed project would not create a significant new source of lighting and glare. Therefore, impacts would be less than significant.

Mitigation Measures

Applicable General Plan MEIR Mitigation Measures

MEIR MM AES-1

Lighting systems for street and parking areas shall include shields to direct light to the roadway surfaces and parking areas. Vertical shields on the light fixtures shall also be used to direct light away from adjacent light sensitive land uses such as residences.

MEIR MM AES-3

Lighting systems for non-residential uses, not including public facilities, shall provide shields on the light fixtures and orient the lighting system away from adjacent properties. Low intensity light fixtures shall also be used if excessive spillover light onto adjacent properties will occur.

MEIR MM AES-4

Lighting systems for freestanding signs shall not exceed 100 foot Lamberts (FT-L) when adjacent to streets which have an average light intensity of less than 2.0 horizontal foot-candles and shall not exceed 500 FT-L when adjacent to streets which have an average light intensity of 2.0 horizontal foot-candles or greater.

FirstCarbon Solutions 23

	Environmental Issues	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact			
2.2	2.2 Agriculture and Forestry Resources In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Dept. of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection regarding the State's inventory of forest land, including the Forest and Range Assessment Project and the Forest Legacy Assessment project; and forest carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board. Would the project:							
	Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?							
-	Conflict with existing zoning for agricultural use, or a Williamson Act contract?				\boxtimes			
	Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code Section 12220(g)), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g))?							
,	Result in the loss of forest land or conversion of forest land to non-forest use?							
	Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?							

Environmental Evaluation

In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Department of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection (CAL FIRE) regarding the State's inventory of forest land, including the Forest and Range Assessment Project and the Forest Legacy Assessment project; and forest carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board (ARB).

Setting

The California Department of Conservation Farmland Mapping and Monitoring Program (FMMP) was established by the State Legislature in 1982 to assess the location, quality, and quantity of agricultural lands and conversion of them over time. The FMMP has established five farmland categories:

- Prime Farmland is farmland with the best combination of physical and chemical features able
 to sustain long-term agricultural production. This land must have been used for irrigated
 agricultural production at some time during the last 4 years before the mapping date and have
 the ability to store moisture in soil well.
- Farmland of Statewide Importance is similar to Prime Farmland but contains greater slopes and a lesser ability to store soil moisture.
- Unique Farmland is usually irrigated, but may include non-irrigated orchards or vineyards as found in some climate zones in California. This land must still have been cropped some time during 4 years prior to the mapping date.
- Farmland of Local Importance is important to the local agricultural economy as determined by each county's board of supervisors and local advisory committee.
- Grazing Land is land on which the existing vegetation is suited to the grazing livestock. This
 category was developed in cooperation with the California Cattlemen's Association, University
 of California Cooperative Extension, and other groups interested in the extent of grazing
 activities.

The FMMP classifies the project site as Farmland of Local Importance, and Vacant or Disturbed Land. 15 The City of Fresno has not designated the site for agricultural use.

Williamson Act

The Williamson Act, classified in 1965 as the California Land Conversation Act, allows local governments to enter into contracts with private landowners, offering tax incentives in exchange for an agreement that the land will remain undeveloped or related open space use only for a period of 10 years. There are no properties under a Williamson Act contract on the project site or in the project vicinity. ¹⁶

Forest Resources

CEQA requires the evaluation of forest and timber resources where those resources are present. However, the project site is located within an urban area of Fresno, and there is no forest land as described in Public Resources Code Section 12220(g), timberland as defined by Public Resources Code

FirstCarbon Solutions 25

Department of Conservation. 2016. California Important Farmland Finder. Website: https://maps.conservation.ca.gov/dlrp/ciff/. Accessed October 19, 2020.

County of Fresno. 2020. Parcel Map Lookup. Website: https://www.co.fresno.ca.us/departments/assessor/mapping/parcel-map-lookup?locale=en. Accessed February 22, 2020.

Section 4526, or property zoned for Timberland Production as defined by Government Code Section 51104(g) on the site or in its vicinity. 17,18,19

Would the project:

a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?

No Impact. The proposed project consists of the construction of a delivery station building. As mentioned above, the project site is designated as Farmland of Local Importance, and Vacant or Disturbed Land. Therefore, the proposed project would not convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland) to non-agricultural use. No impact would occur.

b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?

No impact. The proposed project consists of the construction of a delivery station building. As mentioned above, the project site is designated as Farmland of Local Importance and Vacant or Disturbed Land. The project site is zoned as IL by the City of Fresno Official Zoning Map.²⁰ Furthermore, the project site does not contain an existing Williamson Act contract. As such, the proposed project would not conflict with existing zoning for agricultural use or a Williamson Act contract. No impact would occur.

c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code Section 12220(g)), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g))?

No Impact. The proposed project consists of the construction of a delivery station building. As mentioned above, the project site is designated as Farmland of Local Importance, and Vacant or Disturbed Land but the California Important Farmland Finder, and zoned as IL. The site is partially developed and located in an urban and developed area of the City of Fresno. There is no forest land within the project site. Therefore, the proposed project would not result in the loss or conversion of forest land to non-forest use. No impact would occur.

_

26

¹⁷ State of California. 2007. Public Resources Code 12220(g).

State of California. 2011. Public Resources Code 4526. Website: https://leginfo.legislature.ca.gov/faces/codes_displaySection.xhtml?lawCode=PRC§ionNum=4526#:~:text=%E2%80%9CTimberl and%E2%80%9D%20means%20land%2C%20other,forest%20products%2C%20including%20Christmas%20trees. Accessed January 19, 2021.

State of California. 1976. Government Code 51104(g). Website: https://leginfo.legislature.ca.gov/faces/codes_displaySection.xhtml?sectionNum=51104.&lawCode=GOVhttps://leginfo.legislature.ca.gov/faces/codes_displaySection.xhtml?sectionNum=51104.&lawCode=GOV Accessed January 19, 2021.

²⁰ City of Fresno. 2020. Official City Zoning Map. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2020/09/Official-Zoning-Map-20200923.pdf. Accessed October 16, 2020.

d) Result in the loss of forest land or conversion of forest land to non-forest use?

No impact. The proposed project consists of the construction of a delivery station building. The proposed project is located in an urban and developed area of Fresno, surrounded by existing development. As described previously, the existing condition of the site does not meet the State's definition of forest land. As such, the proposed project would not result in the loss of or conversion of forest land to non-forest use and no impact would occur.

e) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to nonforest use?

No impact. The proposed project consists of the construction of a delivery station building. While historical site documents and aerial photographs indicate that the majority of the site was used for agricultural purposes (orchards and row crops) from at least 1923 through the early 1980s, agricultural operations ceased in the early 1980s and the site is not currently used for agricultural production. Additionally, the site is not classified as forest land. Therefore, the proposed project would not result in the conversion of Farmland to non-agricultural use or the conversion of forest land to on-forest use. As such, no impact would occur.

Mitigation Measures

None required.

Environmental Issues 2.3 Air Quality Where available, the significance criteria established air pollution control district may be relied upon to mo Would the project:	 • •	_	No Impact district or
a) Conflict with or obstruct implementation of the applicable air quality plan?			
b) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or State ambient air quality standard?			
c) Expose sensitive receptors to substantial pollutant concentrations?			
d) Result in other emissions (such as those leading to odors or) adversely affecting a substantial number of people?			

Environmental Evaluation

The analysis in this section is based, in part, on the project-specific air quality analysis and emissions modeling completed using California Emissions Estimator Model (CalEEMod) Version 2016.3.2. Appendix A of this Draft IS/MND presents the Air Quality, Greenhouse Gas (GHG) Emissions, and Energy Analysis Report in its entirety.

Setting

Air pollutants relevant to the CEQA checklist questions for Air Quality are briefly described below.

- Ozone is a gas that is formed when reactive organic gases (ROG) and oxides of nitrogen
 (NO_x)—both byproducts of internal combustion engine exhaust—undergo slow
 photochemical reactions in the presence of sunlight. Ozone concentrations are generally
 highest during the summer months when direct sunlight, light wind, and warm temperature
 conditions are conducive to its formation. Heath effects can include, but are not limited to
 irritated respiratory system, reduced lung function, and aggravated chronic lung diseases.
- ROG, or volatile organic compounds (VOCs), are defined as any compound of carbon—
 excluding carbon monoxide (CO), carbon dioxide (CO₂), carbonic acid, metallic carbides or
 carbonates, and ammonium carbonate—that participates in atmospheric photochemical
 reactions. Although there are slight differences in the definition of ROG and VOCs, the two
 terms are often used interchangeably.
- Nitrogen dioxide (NO₂) forms quickly from NO_X emissions. Health effects from NO₂ can include the following: potential to aggravate chronic respiratory disease and respiratory symptoms in

sensitive groups; risk to public health implied by pulmonary and extra-pulmonary biochemical and cellular changes and pulmonary structural changes; contribution to atmospheric discoloration; increased visits to hospital for respiratory illnesses.

- CO is a colorless, odorless gas produced by the incomplete combustion of fuels. CO
 concentrations tend to be the highest during the winter morning, with little to no wind, when
 surface-based inversions trap the pollutant at ground levels. Because CO is emitted directly from
 internal combustion engines—unlike ozone—and motor vehicles operating at slow speeds are a
 primary source of CO in the Fresno County region, the highest ambient CO concentrations are
 generally found near congested transportation corridors and intersections. Potential health
 effects from CO depends on exposure and can include slight headaches; nausea; aggravation of
 angina pectoris (chest pain) and other aspects of coronary heart disease; decreased exercise
 tolerance in persons with peripheral vascular disease and lung disease; impairment of central
 nervous system functions; possible increased risk to fetuses; or death.
- Sulfur dioxide (SO₂) is a colorless, pungent gas. At levels greater than 0.5 parts per million (ppm), the gas has a strong odor, similar to rotten eggs. Sulfur oxides (SO_X) include SO₂ and sulfur trioxide. Sulfuric acid is formed from sulfur dioxide, which can lead to acid deposition and can harm natural resources and materials. Although SO₂ concentrations have been reduced to levels well below state and federal standards, further reductions are desirable because SO₂ is a precursor to sulfate and PM₁₀.
- Respirable particulate matter (PM₁₀) and Fine Particulate Matter (PM_{2.5}) consist of extremely small, suspended particles or droplets 10 microns and 2.5 microns or smaller in diameter. Some sources of particulate matter, like pollen and windstorms, are naturally occurring. However, in populated areas, most particulate matter is caused by road dust, diesel soot, combustion products, abrasion of tires and brakes, and construction activities. Health effects from short-term exposure (hours/days) can include the following: irrigation of the eyes, nose, throat; coughing; phlegm; chest tightness; shortness of breath; aggravate existing lung disease, causing asthma attacks and acute bronchitis; those with heart disease can suffer heart attacks and arrhythmias. Health effects from long-term exposure can include the following: reduced lung function; chronic bronchitis; changes in lung morphology; or death.
- Toxic air contaminants (TACs) refer to a diverse group of air pollutants that can affect human health but have not had ambient air quality standards established for them. Diesel particulate matter (DPM) is a toxic air contaminant that is emitted from construction equipment and diesel fueled vehicles and trucks. Some short-term (acute) effects of DPM exposure include eye, nose, throat, and lung irritation, coughs, headaches, light-headedness, and nausea. Studies have linked elevated particle levels in the air to increased hospital admissions, emergency room visits, asthma attacks, and premature deaths among those suffering from respiratory problems. Human studies on the carcinogenicity of DPM demonstrate an increased risk of lung cancer, although the increased risk cannot be clearly attributed to diesel exhaust exposure.

While the final determination of whether a project is significant is within the purview of the Lead Agency pursuant to Section 15064(b) of the CEQA Guidelines, the San Joaquin Valley Air Pollution District (Valley Air District) recommends that its quantitative air pollution thresholds be used to

determine the significance of project emissions. If a Lead Agency finds that a project has the potential to exceed these air pollution thresholds, the project should be considered to have significant air quality impacts. The applicable Valley Air District thresholds and methodologies are contained under each impact statement below.

Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations.

Would the project:

a) Conflict with or obstruct implementation of the applicable air quality plan?

Less than significant impact. This document proposes the following criteria for determining project consistency with the current Air Quality Plans (AQPs):

- 1. Will the project conform to the growth assumptions in the AQPs?
- 2. Will the project comply with applicable control measures in the AQPs?

The use of the criteria listed above is a standard approach for CEQA analysis of projects in the District's jurisdiction, as well as within other air districts, for the following reasons:

- AQP emissions inventories and attainment modeling are based on growth assumptions for the area within the air district's jurisdiction.
- AQPs rely on a set of air district-initiated control measures as well as implementation of federal and State measures to reduce emissions within their jurisdictions, with the goal of attaining the air quality standards.

AQPs are plans for reaching attainment of air quality standards. The assumptions, inputs, and control measures are analyzed to determine if the San Joaquin Valley Air Basin (Air Basin) can reach attainment for the ambient air quality standards. In order to show attainment of the standards, the Valley Air District analyzes the growth projections in the valley, contributing factors in air pollutant emissions and formations, and existing and adopted emissions controls. The Valley Air District then formulates a control strategy to reach attainment that includes both State and Valley Air District regulations and other local programs and measures.

Consistency with Assumptions in AQPs

A method for determining consistency with the AQP's assumptions is determining consistency with the applicable General Plan to ensure that the project's population density and land use are consistent with the growth assumptions used in the AQPs for the Air Basin.

The development of emission burdens used in AQPs to demonstrate compliance with ambient air quality standards is based, in part, on land use patterns established within local general plans. Therefore, it is reasonable to conclude that if a project is consistent with the applicable general plan land use designation, and the general plan was adopted prior to the applicable AQMP, then the growth of Vehicle Miles Traveled (VMT) and/or population generated by the proposed project would

be consistent with the growth in VMT and population assumed within the AQP. The applicable General Plan in this case is the Fresno General Plan.

The project site parcels are designated as Light Industrial (IL) by the Fresno General Plan, ²¹ and the site is zoned IL as depicted on the City of Fresno Official Zoning Map. ²² The IL land use designation allows for a range of light industrial uses, including limited manufacturing and processing, fabrication, research and development, utility equipment and service yards, wholesaling, warehousing, and distribution activities. The proposed project does not require a general plan amendment or rezone for development.

Based on the General Plan land use designation of the site, emissions related to development of the proposed project would have been included in growth forecasts for the current AQPs as Light Industrial development. As such, it follows that the proposed project would not result in growth and associated emissions unforeseen in any local or regional plans. Therefore, the proposed project impacts would not be found significant regarding this criterion.

Control Measures

The AQP contains a number of control measures, which are enforceable requirements through the adoption of rules and regulations. A detailed description of rules and regulations that apply to this project is provided in Appendix A. The proposed project would comply with all applicable District rules and regulations. Therefore, the proposed project complies with this criterion and would not conflict with or obstruct implementation of the applicable air quality attainment plan for this criterion.

Impact Summary

The proposed project would not adversely affect growth assumptions within the AQP; therefore, the proposed project would result in a less than significant impact based on this criterion. The proposed project would comply with the applicable AQP control measures; therefore, the proposed project would be less than significant for this criterion.

b) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or State ambient air quality standard?

Less than significant impact with mitigation incorporated. Regional and localized impacts from construction and operations of the proposed project are addressed separately below.

Regional Emissions

Air pollutant emissions have regional effects and localized effects. This analysis assesses the regional effects of the proposed project's criteria pollutant emissions in comparison to Valley Air District thresholds of significance for short-term construction activities and long-term operation of the proposed project.

²¹ City of Fresno. 2017. Land Use and Circulation Map. Website: https://www.fresno.gov/publicworks/wp-content/uploads/sites/17/2017/10/5-City-of-Fresno-General-Plan-Land-Use-and-Circulation-Map.pdf. Accessed October 9, 2020.

²² City of Fresno. 2020. Official City Zoning Map. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2020/09/Official-Zoning-Map-20200923.pdf. Accessed October 9, 2020.

The primary pollutants of concern during project construction and operation are ROG, NO_x, PM₁₀, and PM_{2.5}. The Valley Air District Guide for Assessing and Mitigating Air Quality Impacts (GAMAQI) adopted in 2015 contains thresholds for CO, NO_x, ROG, SO_x, PM₁₀, and PM_{2.5}.

Ozone is a secondary pollutant that can be formed miles from the source of emissions, through reactions of ROG and NO_x emissions in the presence of sunlight. Therefore, ROG and NO_x are termed ozone precursors. The Air Basin often exceeds the State and national ozone standards. Therefore, if the proposed project emits a substantial quantity of ozone precursors, the project may contribute to an exceedance of the ozone standard. The Air Basin also exceeds air quality standards for PM_{10} , and $PM_{2.5}$; therefore, substantial project emissions may contribute to an exceedance for these pollutants. The Valley Air District's annual emission significance thresholds used for the project define the substantial contribution for both operational and construction emissions as follows:

- 100 tons per year CO
- 10 tons per year NO_X
- 10 tons per year ROG
- 27 tons per year SO_X
- 15 tons per year PM₁₀
- 15 tons per year PM_{2.5}

The proposed project does not contain sources that would produce substantial quantities of SO₂ emissions during construction and operation. Modeling conducted for the project show that SO₂ emissions are well below the Valley Air District GAMAQI thresholds, as shown in the modeling results contained in Appendix A. No further analysis of SO₂ is required.

Construction Emissions

Construction emissions associated with the project are shown for the years 2021 and 2022 in Table 3. For the assumptions used in estimating these emissions, please refer to Appendix A. As shown in Table 3, the emissions are below the significance thresholds in each construction year. Therefore, the emissions are less than significant on a project basis.

Table 3: Construction Air Pollutant Emissions

	Emissions (tons per year) ¹					
Year	ROG	NO _x	со	SO _x	PM ₁₀	PM _{2.5}
2021 Construction						
Demolition	0.04	0.48	0.26	0.00	0.08	0.03
Site Preparation	0.06	0.61	0.32	0.00	0.15	0.10
Grading	0.16	1.83	1.19	0.00	0.23	0.13
Building Construction (2021)	0.45	4.09	3.49	0.01	0.49	0.23
Paving	0.07	0.37	0.42	0.00	0.02	0.02
Off-site Improvements	0.00	0.03	0.03	0.00	0.00	0.00

	Emissions (tons per year) ¹					
Year	ROG	NO _x	со	SO _x	PM ₁₀	PM _{2.5}
2021 Construction Subtotal	0.78	4.41	5.71	0.01	0.98	0.51
2022 Construction	2022 Construction					
Building Construction (2022)	0.61	5.61	5.06	0.01	0.70	0.32
Architectural Coating	1.14	0.05	0.15	0.00	0.04	0.01
2022 Construction Subtotal	1.75	5.66	5.21	0.02	0.74	0.33
Entire Construction Duration (2021-2	022)					
Maximum Annual Construction Emissions	1.75	7.41	5.71	0.02	0.98	0.51
Significance threshold (tons/year)	10	10	100	27	15	15
Exceed threshold—significant impact?	No	No	No	No	No	No

CO = carbon monoxide

NO_x = nitrogen oxides

 PM_{10} and $PM_{2.5}$ = particulate matter

ROG = reactive organic gases

 SO_X = sulfur oxide

Source of Emissions: Appendix A.

Source of Thresholds: San Joaquin Valley Air Pollution Control District (Valley Air District). 2015. Guidance for Assessing and Mitigating Air Quality Impacts. February 19. Website: https://www.valleyair.org/transportation/GAMAQI-2015/FINAL-DRAFT-GAMAQI.PDF. Accessed November 13, 2020.

Operational Emissions

Operational emissions occur over the lifetime of the project and are from two main sources: area sources and motor vehicles, or mobile sources. Construction is scheduled to be completed in a single phase. To provide a conservative estimate, operations were modeled assuming complete buildout in 2022. The Valley Air District considers construction and operational emissions separately when making significance determinations.

For assumptions in estimating the emissions, please refer to Appendix A. The emissions modeling results for project operation are summarized in Table 4.

Table 4: Operational Air Pollutant Emissions (2022)

	Emissions (tons per year)					
Source	ROG	NO _x	со	SO _x	PM ₁₀	PM _{2.5}
Area	0.74	0.00	0.01	0.00	0.00	0.00
Energy	0.02	0.16	0.13	0.00	0.01	0.01
Mobile (Passenger Vehicles)	0.23	0.29	2.95	0.01	1.08	0.29

 $^{^{1}}$ PM $_{10}$ and PM $_{2.5}$ emissions are from the mitigated output to reflect compliance with Regulation VIII—Fugitive PM $_{10}$ Prohibitions.

	Emissions (tons per year)					
Source	ROG	NO _x	со	SO _x	PM ₁₀	PM _{2.5}
Mobile (Vans)	0.22	0.35	2.92	0.01	0.59	0.16
Mobile (Trucks)	0.74	0.00	0.01	0.00	0.00	0.00
Total	1.34	4.84	6.70	0.04	2.09	0.58
Significance threshold	10	10	100	27	15	15
Exceed threshold—significant impact?	No	No	No	No	No	No

CO = carbon monoxide

NO_x = nitrogen oxides

 PM_{10} and $PM_{2.5}$ = particulate matter

ROG = reactive organic gases

SO_X= sulfur oxide

Area source emissions include emissions from natural gas, landscape, and painting.

Source of Emissions: Appendix A.

Source of Thresholds: San Joaquin Valley Air Pollution Control District (Valley Air District). 2015. Guidance for Assessing

and Mitigating Air Quality Impacts. February 19. Website: https://www.valleyair.org/transportation/GAMAQI-

2015/FINAL-DRAFT-GAMAQI.PDF. Accessed November 13, 2020.

As shown in Table 4, regional operational emissions would not exceed Valley Air District's threshold of significance for any pollutant assessed; related impacts would be less than significant.

Localized Pollutant Analysis

Emissions occurring at or near the project site have the potential to create a localized impact, also referred to as an "air pollutant hotspot." Localized emissions are considered significant if when combined with background emissions, they would result in exceedance of any health-based air quality standard. In locations that already exceed standards for these pollutants, significance is based on a significant impact level that represents the amount that is considered a cumulatively considerable contribution to an existing violation of an air quality standard.

The Valley Air District's GAMAQI includes screening thresholds for identifying projects that need detailed analysis for localized impacts. Projects with on-site emission increases from construction activities or operational activities that exceed the 100 pounds per day screening level of any criteria pollutant after compliance with Rule 9510 and implementation of all enforceable mitigation measures would require preparation of an ambient air quality analysis. The criteria pollutants of concern for localized impact in the Air Basin are PM₁₀, PM_{2.5}, NO₂, and CO. CO violations require heavy traffic volumes and extreme traffic congestion that would not occur at or near the project site; therefore, operational CO emission hotspots are highly unlikely.

An analysis of maximum daily emissions during construction and operation was conducted to determine if emissions would exceed the 100 pounds per day screening threshold for any pollutant of concern. The results of the analysis are presented in Table 5, Table 6, and Table 7.

Table 5: Maximum On-site Daily Air Pollutant Emissions During Construction (Unmitigated)

	On-site	Emissions (pounds pe	er day)¹
Source	NO _x	PM ₁₀	PM _{2.5}
Demolition	31.44	6.08	2.13
Site Preparation	40.50	10.17	6.35
Grading	174.00	22.08	12.92
Building Construction (2021)	62.91	3.46	3.25
Building Construction (2022)	56.36	2.92	2.75
Paving	12.92	0.68	0.62
Architectural Coating	1.41	0.08	0.08
Off-site Improvements	7.82	0.75	0.57
Overlap Demolition of Site Preparation (2021)	71.94	16.25	8.48
Overlap Demolition of Grading (2021)	205.44	28.16	15.04
Overlap Building Construction and Paving (2021)	75.83	4.14	3.88
Overlap Building Construction and Off-site Improvements (2021)	70.73	4.21	3.83
Overlap Building Construction and Architectural Coating (2022)	57.77	3.00	2.83
Maximum Daily Emissions	205.44	28.16	15.04
Screening threshold	100	100	100
Exceed screening threshold?	Yes	No	No

NO_x = nitrogen oxides

 PM_{10} and $PM_{2.5}$ = particulate matter

Source of Emissions: Appendix A.

Source of Thresholds: San Joaquin Valley Air Pollution Control District (Valley Air District). 2015. Guidance for Assessing and Mitigating Air Quality Impacts. February 19. Website: https://www.valleyair.org/transportation/GAMAQI-2015/FINAL-DRAFT-GAMAQI.PDF. Accessed November 13, 2020.

As noted in Table 5, emissions of NO_X would exceed the applicable screening threshold prior to the application of mitigation. Implementation of Mitigation Measure (MM) AIR-1 would reduce this impact to a less-than-significant level. MM AIR-1 requires the applicant provide documentation to the City of Fresno demonstrating that all off-road diesel-powered construction equipment greater than 75 horsepower meets the United States Environmental Protection Agency (EPA) or ARB Tier 4 Final off-road emissions standards. Equipment tiers refer to a generation of emission standards established by the EPA and ARB that apply to diesel engines in off-road equipment. The "tier" of an engine depends

 $^{^{1}}$ PM $_{10}$ and PM $_{2.5}$ emissions are from the mitigated output to reflect compliance with Regulation VIII—Fugitive PM $_{10}$ Prohibitions.

on the model year and horsepower rating; generally, the newer a piece of equipment is, the higher the tier level the equipment is likely to have. Excluding engines greater than 750 horsepower, Tier 1 engines were manufactured generally between 1996 and 2003. Since Tier 1 emission standards were established by the EPA in 1994, increasingly more stringent Tier 2, Tier 3, and Tier 4 (interim and final) standards were adopted by the EPA, as well as the ARB. An analysis of maximum daily emissions during construction after incorporation of MM AIR-1 was conducted to determine if emissions would exceed the 100 pounds per day screening threshold for any pollutant of concern. As shown in the summarized results presented in Table 6, the project's construction emissions would not exceed the appliable daily emission thresholds during construction for any pollutant of concern after incorporation of MM AIR-1. Emissions presented in the table were modeled assuming all diesel equipment greater than 75 horsepower would meet Tier 4 Interim off-road emissions standards.

Table 6: Maximum On-site Daily Air Pollutant Emissions During Construction (Mitigated)

	On-site Emissions (pounds per day) ¹		
Source	NO _x	PM ₁₀	PM _{2.5}
Demolition	13.56	4.59	0.75
Site Preparation	12.16	8.19	4.53
Grading	72.27	15.03	6.45
Building Construction (2021)	38.85	0.40	0.40
Building Construction (2022)	38.69	0.37	0.37
Paving	10.04	0.04	0.04
Architectural Coating	1.06	0.00	0.00
Off-site Improvements	5.11	0.36	0.20
Overlap Demolition of Site Preparation (2021)	25.72	12.78	5.28
Overlap Demolition of Grading (2021)	85.82	19.60	7.20
Overlap Building Construction and Paving (2021)	48.89	0.44	0.44
Overlap Building Construction and Off-site Improvements (2021)	43.96	0.76	0.61
Overlap Building Construction and Architectural Coating (2022)	39.75	0.37	0.37
Maximum Daily Emissions	85.82	19.62	7.20
Screening threshold	100	100	100
Exceed screening threshold?	No	No	No

	On-site Emissions (pounds per day) ¹			
Source	NO _x	PM ₁₀	PM _{2.5}	

NO_x = nitrogen oxides

 PM_{10} and $PM_{2.5}$ = particulate matter

 1 PM $_{10}$ and PM $_{2.5}$ emissions are from the mitigated output to reflect compliance with Regulation VIII—Fugitive PM $_{10}$ Prohibitions.

Source of Emissions: Appendix A.

Source of Thresholds: San Joaquin Valley Air Pollution Control District (Valley Air District). 2015. Guidance for Assessing and Mitigating Air Quality Impacts. February 19. Website: https://www.valleyair.org/transportation/GAMAQI-2015/FINAL-DRAFT-GAMAQI.PDF. Accessed November 13, 2020.

Operational emissions include emissions generated on-site by area sources such as natural gas combustion and landscape maintenance, and on-site travel from motor vehicles accessing the project. Maximum daily on-site emissions during project emissions are shown below in Table 7.

Table 7: Maximum On-site Daily Air Pollutant Emissions During Operations

	On-site Emissions (pounds per day) ¹			
Source	NO _x	PM ₁₀	PM _{2.5}	
Area	0.00	0.00	0.00	
Energy	0.85	0.06	0.06	
Mobile (Passenger Vehicles)	0.39	0.61	0.17	
Mobile (Vans)	0.47	0.31	0.09	
Mobile (Trucks)	5.12	0.04	0.01	
Total	6.84	1.03	0.33	
Screening threshold	100	100	100	
Exceed screening threshold?	No	No	No	

Notes:

NO_x = nitrogen oxides

 PM_{10} and $PM_{2.5}$ = particulate matter

Source of Emissions: Appendix A.

Source of Thresholds: San Joaquin Valley Air Pollution Control District (Valley Air District). 2015. Guidance for Assessing and Mitigating Air Quality Impacts. February 19. Website: https://www.valleyair.org/transportation/GAMAQI-2015/FINAL-DRAFT-GAMAQI.PDF. Accessed November 13, 2020.

The proposed project would not exceed the Valley Air District screening thresholds for requiring additional ambient air quality modeling; therefore, the proposed project's localized criteria pollutant impacts are less than significant.

Impact Summary

Regional emissions generated by the proposed project would not exceed any applicable thresholds after compliance with all rules, regulations, and project design features during either construction or

operations. Localized construction emissions would be less than significant after incorporation of MM AIR-1, which requires the use of Tier 4 on-site, off-road equipment during project construction. Localized operational emissions would be less than significant. In summary, the overall impact would be less than significant with incorporation of mitigation.

c) Expose sensitive receptors to substantial pollutant concentrations?

Less than significant impact with mitigation incorporated.

Sensitive Receptors

Those who are sensitive to air pollution include children, the elderly, and persons with preexisting respiratory or cardiovascular illness. The Valley Air District considers a sensitive receptor to be a location that houses or attracts children, the elderly, people with illnesses, or others who are especially sensitive to the effects of air pollutants. Examples of sensitive receptors include hospitals, residences, convalescent facilities, and schools.

Construction: ROG

ROG is emitted during the application of architectural coatings (painting). The amount emitted is dependent on the amount of ROG (or VOC) in the paint. ROG emissions are typically an indoor air quality health hazard concern rather than an outdoor air quality health hazard concern. Therefore, exposure to ROG during architectural coatings is a less than significant health impact.

There are three types of asphalt that are typically used in paving: asphalt cements, cutback asphalts, and emulsified asphalts. However, Valley Air District Rule 4641 prohibits the use of the following types of asphalt: rapid cure cutback asphalt; medium cure cutback asphalt; slow cure asphalt that contains more than 0.5 percent of organic compounds that evaporate at 500°F or lower; and emulsified asphalt containing organic compounds, in excess of 3 percent by volume, that evaporate at 500°F or lower. An exception to this is medium cure asphalt when the National Weather Service official forecast of the high temperature for the 24-hour period following application is below 50°F.

The acute (short-term) health effects from worker direct exposure to asphalt fumes include irritation of the eyes, nose, and throat. Other effects include respiratory tract symptoms and pulmonary function changes. The studies were based on occupational exposure of fumes. Residents are not in the immediate vicinity of the fumes; therefore, they would not be subjected to concentrations high enough to evoke a negative response. In addition, the restrictions that are placed on asphalt in the San Joaquin Valley reduce ROG emissions from asphalt and exposure. The impact to nearby sensitive receptors from ROG during construction is less than significant.

Operation: ROG

During operation, ROG would be emitted primarily from motor vehicles. Direct exposure to ROG from project motor vehicles would not result in health effects, because the ROG would be distributed across miles and miles of roadway and in the air. The concentrations would not be great enough to result in direct health effects.

Construction: NO_X, PM₁₀, and PM_{2.5}

As discussed in Impact AIR-2, localized unmitigated concentrations of PM_{10} , and $PM_{2.5}$ generated during project construction would not exceed the ambient air quality standards, while localized concentrations of NO_X would not exceed ambient standards after incorporation of MM AIR-1. Therefore, emissions during construction would not exceed the significance thresholds after incorporation of mitigation and would not be expected to result in concentrations that would exceed ambient standards or contribute substantially to an existing exceedance of an ambient air quality standard.

Operation: NO_X, PM₁₀, and PM_{2.5},

As discussed in Impact AIR-2, localized concentrations of NO_X , PM_{10} , and $PM_{2.5}$ would not exceed the ambient air quality standards. Therefore, the proposed project would not expose sensitive receptors to substantial criteria air pollutant concentrations during operation.

Toxic Air Contaminants

Project construction would involve the use of diesel-fueled vehicles and equipment that emit DPM, which is considered a TAC. The Valley Air District's latest threshold of significance for TAC emissions is an increase in cancer risk for the maximally exposed individual of 20 in a million (formerly 10 in a million). The Valley Air District's 2015 GAMAQI does not currently recommend analysis of TAC emissions from project construction activities, but instead focuses on projects with operational emissions that would expose sensitive receptors over a typical lifetime of 70 years.

Toxic Air Pollutants—On-site Workers

A variety of State and national programs protect workers from safety hazards, including high air pollutant concentrations. ^{23,24}

On-site workers are not required to be addressed through this Health Risk Assessment (HRA) process. A document published by the California Air Pollution Control Officers Association, Health Risk Assessments for Proposed Land Use Projects, indicates that on-site receptors are included in risk assessments if they are persons not employed by the proposed project. ²⁵ The proposed project is a distribution center and is not open to the public. Persons not employed by the proposed project would not remain on-site for any significant period. Therefore, an HRA for on-site receptors is not required or recommended. No further discussion is necessary.

Health Risk Assessment

During construction, the proposed project would result in emissions of several TACs that could potentially impact nearby sensitive receptors. The Valley Air District has defined health risk significance thresholds. These thresholds are represented as a cancer risk to the public and a non-cancer hazard from exposures to TACs. Cancer risk represents the probability (in terms of risk per million individuals) that an individual would contract cancer resulting from exposure to TACs

Occupational Safety and Health Administration (OSHA). 2003. United States Department of Labor. Safety and Health Topics: Methane. Website: www.osha.gov/dts/chemicalsampling /data/CH_250700.html. Accessed December 30, 2019.

²⁴ Centers for Disease Control and Prevention (CDC). 2012. Construction—website: www.cdc.gov/niosh/construction/. Indoor Environmental Quality—website: www.cdc.gov/niosh/topics/indoorenv/constructionieq.html. Accessed December 30, 2019.

²⁵ California Air Pollution Control Officers Association (CAPCOA). 2009. Health Risk Assessments for Proposed Land Use Projects.

continuously over a period of several years. The Valley Air District's latest threshold of significance for TAC emissions is an increase in cancer risk for the maximally exposed individual of 20 in a million (formerly 10 in a million). The principal TAC emission analyzed in this assessment was DPM from operation of off-road equipment and diesel-powered delivery and worker vehicles during construction and operation. DPM has been identified by the ARB as a carcinogenic substance. For purposes of this analysis, DPM is represented as exhaust emissions of PM₁₀. DPM represented as exhaust PM₁₀ adequately addresses impacts from PM₁₀ and PM_{2.5} emissions, as PM_{2.5} comprises a component of PM₁₀. Fugitive dust components of PM₁₀ and PM_{2.5} would be controlled through the use of required dust control practices during project construction.

Exposures to TACs can also result in both short-term (acute) or long-term (chronic) non-cancer health impacts. Such impacts could include illnesses related to reproductive effects, respiratory effects, eye sensitivity, immune effects, kidney effects, blood effects, central nervous system, birth defects, or other adverse environmental effects.

Estimation of Cancer Risks

Cancer risks are estimated as the upper-bound incremental probability that an individual will develop cancer as a direct result of exposure to potential carcinogens over a specified exposure duration. The cancer risk attributed to a chemical is calculated by multiplying the chemical intake or dose at the human exchange boundaries (e.g., lungs) by the chemical-specific cancer potency factor (CPF). A risk level of 10 in a million implies a likelihood (or risk) that up to 10 persons, out of one million equally exposed people would contract cancer if exposed continuously (24 hours per day) to the levels of TACs over a specified duration of time. This risk would be an excess cancer risk that is in addition to any environmental cancer risk borne by a person not exposed to these air toxics.

The California Office of Environmental Health Hazard Assessment (OEHHA) has developed guidance for estimating cancer risks that considers the increased sensitivity of infants and adults to TAC emissions, different breathing rates, and time spent at home. This guidance was applied in estimating cancer risks from the construction and operation of the proposed project.

The recommend method for the estimation of cancer risk is shown in the equations.

Cancer Risk = C_{DPM} x Inhalation Exposure Factor (EQ-1)

Where:

Cancer Risk = Total individual excess cancer risk defined as the cancer risk a hypothetical individual faces if exposed to carcinogenic emissions from a particular source for specified exposure durations; this risk is defined as an excess risk because it is above and beyond the background cancer risk to the population; cancer risk is expressed in terms of risk per million exposed individuals.

 C_{DPM} = Period average DPM air concentration calculated from the air dispersion model in $\mu g/m^3$

Inhalation is the most important exposure pathway to impact human health from DPM and the inhalation exposure factor is defined as follows:

Inhalation Exposure Factor=CPF x EF x ED x DBR x AAF/AT (EQ-2)

Where:

CPF = Inhalation cancer potency factor for the TAC: 1.1 (mg/kg-day)⁻¹ for DPM

EF = Exposure frequency (days/year)

ED = Exposure duration (years of construction)

AAF = set of age-specific adjustment factors that include age sensitivity factors (ASF), daily breathing rates (DBR), and time at home factors (TAH)

AT = Averaging time period over which exposure is averaged (days)

Estimation of Chronic Non-Cancer Hazards

An evaluation of potential non-cancer effects of chronic chemical exposures was also conducted. Adverse health effects are evaluated by comparing the annual receptor concentration of each chemical compound with the appropriate Reference Exposure Level (REL). Available RELs promulgated by OEHHA were considered in the assessment.

Risk characterization for non-cancer health hazards from TACs is expressed as an HI. The HI is a ratio of the predicted concentration of the project's emissions to a concentration considered acceptable to public health professionals, termed the REL.

To quantify non-carcinogenic impacts, the HI approach was used.

$$HI = C_{ann}/REL$$
 (EQ-3)

Where:

HI = chronic hazard index

 C_{ann} = annual average concentration of TAC as derived from the air dispersion model (micrograms per cubic meter [$\mu g/m^3$])

REL = reference exposure level above which a significant impact is assumed to occur ($\mu g/m^3$)

The hazard index (HI) assumes that chronic exposures to TACs adversely affect a specific organ or organ system (toxicological endpoint) of the body. For each discrete chemical exposure, target organs presented in regulatory guidance were used. To calculate the HI, each chemical concentration or dose is divided by the appropriate toxicity REL. For compounds affecting the same toxicological endpoint, this ratio is summed. Where the total equals or exceeds 1, a health hazard is presumed to exist. The OEHHA has defined a REL for DPM of 5 μ g/m³. The principal toxicological endpoint assumed in this assessment was through inhalation.

Toxic Air Contaminant Construction Analysis

Major sources of DPM during construction include off-road construction equipment and heavy-duty delivery truck activities. The results of the HRA prepared for project construction for cancer risk and long-term chronic cancer risk are summarized below. Air dispersion modeling was utilized to assess

the project's potential health risks using AERMOD Version 19191, which is an air dispersion model accepted by the EPA and the Valley Air District for preparing HRAs. Exhaust emissions of DPM (as PM_{10} exhaust) were estimated using CalEEMod Version 2016.3.2. Construction emissions were estimated assuming adherence to all applicable rules, regulations, and project design features. The construction emissions were assumed to be distributed over the project area with a working schedule of 8 hours per day and 5 days per week. Emissions were adjusted by a factor of 4.2 to convert for use with a 24-hour-per-day, 365 day-per-year averaging period. Detailed parameters, a description of methodology, and complete calculations are contained in Appendix A.

The estimated health and hazard impacts at the Maximum Impacted Sensitive Receptor (MIR) from the project's construction emissions are provided in Table 8.

Table 8: Estimated Health Risks and Hazards During Project Construction (Unmitigated)

Source	Cancer Risk (risk per million)	Chronic Non-Cancer HI1
Risks and Hazards at the MIR: Infants	17.8	0.03
Risks and Hazards at the MIR: Child	4.4	0.03
Risks and Hazards at the MIR: Adult	0.4	0.03
Significance Threshold	20	1
Exceeds Individual Source Threshold?	No	No

Notes:

Source: Air Quality, Greenhouse Gas Emissions, and Energy Supporting Information (Appendix A).

As noted in Table 8, the proposed project's construction DPM emissions would not exceed the cancer risk significance threshold or non-cancer hazard index significance threshold at the MIR. Therefore, the proposed project would not result in a significant impact on nearby sensitive receptors from TACs during construction. Although not required to reduce health metrics, the proposed project would be required to implement MM AIR-1 during project construction to reduce emissions of NO_x. Implementation of MM AIR-1 would further reduce estimated health risks and hazards during project construction compared to the results presented in Table 9. Estimated health risks and hazards during project construction, after application of MM AIR-1 is presented below for informational purposes.

Table 9: Estimated Health Risks and Hazards During Project Construction After Incorporation of Mitigation Measure AIR-1

Source	Cancer Risk (risk per million)	Chronic Non-Cancer HI1
Risks and Hazards at the MIR: Infants	1.8	0.003
Risks and Hazards at the MIR: Child	0.4	0.003

¹ Chronic non-cancer HI was estimated by dividing the maximum annual DPM concentration (as PM_{10} exhaust) by the REL of 5 μ g/m³.

Source	Cancer Risk (risk per million)	Chronic Non-Cancer HI1
Risks and Hazards at the MIR: Adult	0.04	0.003
Significance Threshold	20	1
Exceeds Individual Source Threshold?	No	No

d) Result in other emission (such as those leading to odors) adversely affecting a substantial number of people?

Less than significant impact.

Thresholds of Significance

Odor impacts on residential areas and other sensitive receptors, such as hospitals, day-care centers, schools, etc. warrant the closest scrutiny, but consideration should also be given to other land uses where people may congregate, such as recreational facilities, worksites, and commercial areas.

Two situations create a potential for odor impact. The first occurs when a new odor source is located near an existing sensitive receptor. The second occurs when a new sensitive receptor locates near an existing source of odor. The District has determined the common land use types that are known to produce odors in the Air Basin. These types are shown in Table 10.

Table 10: Screening Levels for Potential Odor Sources

Odor Generator	Screening Distance
Wastewater Treatment Facilities	2 miles
Sanitary Landfill	1 mile
Transfer Station	1 mile
Composting Facility	1 mile
Petroleum Refinery	2 miles
Asphalt Batch Plant	1 mile
Chemical Manufacturing	1 mile
Fiberglass Manufacturing	1 mile
Painting/Coating Operations (e.g., auto body shop)	1 mile
Food Processing Facility	1 mile
Feed Lot/Dairy	1 mile
Rendering Plant	1 mile

¹ Chronic non-cancer HI was estimated by dividing the maximum annual DPM concentration (as PM₁₀ exhaust) by the REL of 5 μ g/m³.

Source: Air Quality, Greenhouse Gas Emissions, and Energy Supporting Information (Appendix A).

\sim	0.5	Can	erato	100
υu		GEI	ierato	

Screening Distance

Source: San Joaquin Valley Air Pollution Control District (Valley Air District). 2015. Guidance for Assessing and Mitigating Air Quality Impacts. February 19. Website: https://www.valleyair.org/transportation/GAMAQI-2015/FINAL-DRAFT-GAMAQI.PDF. Accessed November 13, 2020.

According to the Valley Air District GAMAQI, analysis of potential odor impacts should be conducted for the following two situations:

- **Generators:** projects that would potentially generate odorous emissions proposed to locate near existing sensitive receptors or other land uses where people may congregate, and
- **Receivers:** residential or other sensitive receptor projects or other projects built for the intent of attracting people locating near existing odor sources.

If the proposed project were to result in sensitive receptors being located closer than the recommended distances to an odor generator in the list in Table 10, a more detailed analysis including a review of Valley Air District odor complaint records is recommended. For a project located near an existing source of odors, the project should be identified as having a significant odor impact if it is proposed for a site that is closer to an existing odor source than any location where there have been:

- More than one confirmed complaint per year averaged over a 3-year period, or
- Three unconfirmed complaints per year averaged over a 3-year period.

Project Analysis

Land uses that are typically identified as sources of objectionable odors include landfills, transfer stations, sewage treatment plants, wastewater pump stations, composting facilities, feed lots, coffee roasters, asphalt batch plants, and rendering plants. The proposed project would not engage in any of these activities. Specifically, the proposed project would be occupied by a single tenant with the purpose of fulfilling internet purchases. Therefore, the proposed project would not be considered to be a generator of objectionable odors during operations.

During construction, the various diesel-powered vehicles and equipment in use on-site would create localized odors. These odors would be intermittent and would not likely be noticeable for extended periods of time beyond the project's site boundaries. The potential for diesel odor impacts is therefore less than significant.

Mitigation Measures

Project-specific Mitigation Measures

MM AIR-1 Before a construction permit is issued for the proposed project, the project applicant shall submit construction emissions minimization plans to the City of Fresno for

review and approval. The construction emissions minimization plans shall detail compliance with the following requirements:

1. All off-road equipment shall have engines that meet either the United States Environmental Protection Agency (EPA) or California Air Resources Board (ARB) Tier IV Final off-road emission standards. If engines that comply with Tier IV Final off-road emission standards are not commercially available, then the construction contractor shall use the next cleanest piece of off-road equipment (e.g., Tier IV Interim) available. For purposes of this mitigation measure, "commercially available" shall mean the availability of Tier IV Interim engines taking into consideration factors such as (i) critical-path timing of construction; and (ii) geographic proximity to the project site of equipment. The contractor can maintain records for equipment that is not commercially available by providing letters from at least two rental companies for each piece of off-road equipment where the Tier IV Final engine is not available.

Environmental Issues 2.4 Biological Resources Would the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or United States Fish and Wildlife Service?				
b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the California Department of Fish and Wildlife or United States Fish and Wildlife Service?				
c) Have a substantial adverse effect on State or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?				
d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of wildlife nursery sites?				
e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?				
f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State habitat conservation plan?				

Environmental Evaluation

Setting

This section evaluates potential effects on biological resources that may result from project implementation. This section is based, in part, on the Biological Resources Assessment (BRA) prepared by FirstCarbon Solutions (FCS) and included in Appendix B. The BRA describes the results of the survey conducted by FCS to assess the site's potential to support special-status species, sensitive biological communities such as wetlands or riparian habitats, and the potential presence of other sensitive biological resources protected by local, State, and federal laws and regulations.

An Arborist Report for the project site was prepared by John Pape Consulting, LLC to identify and map the ornamental trees present on-site, determine each tree's overall condition and determine if any are regulated under any local policies or city ordinances (Appendix B).

The project site lies within the central portion of the San Joaquin Valley, which together with the Sacramento Valley makes up California's larger Central Valley. The San Joaquin Valley is bounded by the Sierra Nevada Mountains to the east and Coast Ranges to the west. The project site is surrounded by urban development in all directions, with residential neighborhoods located to the south and west and commercial and industrial development located north and to the east. Agricultural fields are present farther to the east. The project site is bounded by SR-180 along its southern boundary. A large detention basin owned by the Fresno Metropolitan Flood Control District borders the western boundary of the project site.

The majority of the existing project site consists of a parking lot (13.15 acres) and vacant fields dominated by non-native annual grassland (30.74 acres). The project site contains smaller areas that are dominated by ornamental trees including eucalyptus (*Eucalyptus* spp.), southern live oak (*Quercus virginiana*), ash (*Fraxinus* spp.), tree of heaven (*Ailanthus altissima*) and California fan palm (*Washingtonia filifera*). An approximately 280-foot-long (4,200-square-foot) isolated, constructed stormwater treatment feature is located south of the on-site parking lot.

Would the project:

a) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or United States Fish and Wildlife Service?

Less than significant impact with mitigation incorporated. Prior to the reconnaissance-level field survey, FCS conducted a literature review of potential biological resources on-site, including a search of the California Department of Fish and Wildlife (CDFW) California Natural Diversity Database (CNDDB) and the California Native Plant Society (CNPS) Electronic Inventory (CNPSEI). Both search queries were focused within the *Clovis, California* USGS 7.5-minute quadrangle map and eight surrounding quadrangles. The search queries determined that 18 special-status plant species and CNPS sensitive species have been recorded within vicinity of the project site. ^{26,27} Of these 18 plant species, it was determined that none are expected to occur within the project site due to absence of suitable habitat, previous land use, and ground disturbance on-site.

As identified in the Special-status Species Table in Appendix B of the BRA (Appendix B), 23 federal and State-listed threatened and/or endangered wildlife species and State Species of Special Concern that have the potential to occur within the *Clovis, California* Topographic Quadrangle and the eight surrounding quadrangles. However, all species but two—Swainson's hawk (*Buteo swainsoni*) and

-

²⁶ California Department of Fish and Wildlife (CDFW). 2020. CNDDB RareFind 5 California Natural Diversity Database Query for Special-Status Species. Website: https://map.dfg.ca.gov/rarefind/view/RareFind.aspx. Accessed October 22, 2020.

²⁷ California Native Plant Society (CNPS). 2020. California Native Plant Society Rare and Endangered Plant Inventory. Website: http://www.rareplants.cnps.org/. Accessed October 22, 2020.

²⁸ Ibid.

burrowing owl (*Athene cunicularia*)—were determined unlikely to occur due to lack of suitable habitat and/or lack of recorded occurrence in the project vicinity. The project site contains numerous ornamental trees, including eucalyptus trees that could provide suitable nesting habitat for many bird species including Swainson's hawk. CNDDB records indicate several Swainson's hawk occurrences within 10 miles of the project site. ²⁹ Given these recent sightings and the presence of suitable habitat in the large eucalyptus trees near grasslands that provide suitable foraging habitat for this species, there is potential for this species to occur on-site. Furthermore, several burrows with diameters of at least 4 inches were detected on and adjacent to the project site, which could provide suitable burrowing and nesting habitat for burrowing owl. There are two recorded occurrences of burrowing owl within 5 miles of the project site. ³⁰ Therefore, there is potential for burrowing owl to occur on-site during the breeding season (generally between February 15 and August 31), post-breeding dispersal season (generally between September 1 and November 30), and wintering season (generally between December 1 and February 14). No signs of Swainson's hawk or burrowing owl were observed on-site during the field survey.

To reduce potential impacts to Swainson's hawk and burrowing owl below a level of significance, MM BIO-1 through MM BIO-4 require pre-construction surveys for Swainson's hawk and burrowing owl, measures for Swainson's hawk avoidance, minimization, construction monitoring, and compensation for habitat loss if Swainson's hawk are found foraging within the project site or project vicinity. Furthermore, because the ornamental and eucalyptus trees on-site could provide suitable habitat for nesting birds, MM BIO-5 requires pre-construction surveys and avoidance of active bird nests to reduce potential impacts to nesting birds to a less than significant level. MM BIO-1 through MM BIO-5 reflect the intent of the General Plan mitigation related to protection of special status species and birds protected by the MTBA, as presented in the MMs BIO-1, BIO-2, BIO-3 and BIO-4 in the General Plan MEIR. Therefore, with the implementation of MM BIO-1 through MM BIO-5, impacts to special-status species including Swainson's hawk, burrowing owl, and nesting birds would be less than significant. As such, impacts would be less than significant with mitigation incorporated.

b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the California Department of Fish and Wildlife or United States Fish and Wildlife Service?

Less than significant impact. The habitat present on the project site can be classified as non-native annual grassland (30.74 acres), which covers most of the southern portion of the site. The northern portion of the project site is developed (13.15 acres) and consists of a parking lot and a single-family home. Neither habitat types are considered sensitive. A single white alder (*Alnus rhombifolia*) is located on the parking lot. White alder groves are considered a California sensitive natural community by the CDFW.³¹ However, the single white alder is not part of a grove, it is in very poor condition (severe sunscald, wood decay, dry-wood termites and borers), and does not co-occur with

²⁹ California Department of Fish and Wildlife (CDFW). 2020. Biogeographic Information and Observation System (BIOS 5). Website: https://map.dfg.ca.gov/bios/. Accessed October 22, 2020.

³⁰ Ibid

³¹ California Department of Fish and Wildlife (CDFW). 2021c. Natural Communities List, Sacramento: California Department of Fish and Wildlife. Website: https://wildlife.ca.gov/Data/VegCAMP/Natural-Communities#sensitive%20natural%20communities. Accessed September 9, 2020.

other plant species (i.e., is not part of a "plant community" on this parking lot).³² Therefore, impacts to sensitive communities would be less than significant.

c) Have a substantial adverse effect on State or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?

Less than significant impact. The project site includes an approximately 0.096-acre isolated stormwater treatment feature located south of the on-site parking lot. This feature was constructed to provide stormwater treatment for runoff from the parking lot. The feature collects run-off from parking lot and funnels it eastward toward the adjacent property northeast of the project site. This stormwater treatment feature would be filled as part of construction of the project. On December 23, 2020, an FCS Biologist spoke with Matt Scroggins, Central Valley Regional Water Quality Control Board (RWQCB) Dredge and Fill Program Manager, to discuss this existing stormwater treatment feature. According to Mr. Scroggins, potential project-related impacts to this specific feature would not require a RWQCB dredge and fill permit, based on the understanding that the feature is relatively small, has no connection downstream, is constructed in uplands, is not a modification of a natural feature, and has relatively low habitat value.³³ Therefore, this feature is not regulated as a jurisdictional water or wetland of the State. Accordingly, and following the Navigable Water Protection Rule, it also does not qualify as a water of the United States.³⁴ As such, the proposed project would not have a substantial adverse effect on State or federally protected wetlands and impacts would be less than significant.

d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of wildlife nursery sites?

Less than significant impact. The project site is not located along any known wildlife movement corridor. The majority of the project site consists of a parking lot and vacant fields and does not contain habitat features such as riparian corridors or waterways that could function as wildlife corridors. The project site is also surrounded by roads, highways, a detention basin, and urban development that limits wildlife movement. Due to the presence of existing barriers, the project site does not function as a wildlife corridor or wildlife nursery site. therefore, impacts related to wildlife corridors, linkages, and wildlife movement would be less than significant.

e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?

Less than significant impact with mitigation incorporated. According to the Arborist Report, the project site contains a total of 274 trees. The 141 trees present on-site which are of the *Eucalyptus*

³² John Pape Consulting, LLC. 2021. Arborist report for trees at FCS PROJECT NO. 4115.0025. PO Box 8672, Fresno, CA 93747. January

³³ M. Scroggins, Central Valley RWQCB (personal communication, December 23, 2020)

The Navigable Waters Protection Rule: Definition of "Waters of the United States." 2020. Department of the Army, Corps of Engineers, Department of Defense; and Environmental Protection Agency (EPA). 85 Federal Register 22250; 33 Code of Federal Regulations Part 328. Effective June 22, 2020.

genus are not protected under Fresno City Code, and can be removed without City approval or permit. Of the remaining trees, 55 trees meet the 12-inch diameter at breast height (DBH) trunk requirement of a Protected Tree, per Fresno City Code 15-2308-C-2-b or c. 35 Nine of the 55 trees that meet the Fresno City Code requirements are in poor condition and the Arborist recommends their removal. None of the trees on-site would be considered a heritage tree, or an important specimen tree (Appendix B).

The development of the proposed project will likely require the removal of most if not all of the 55 protected trees located on the project site. Fresno City Code 15-2308-C-1 states that no Protected Tree shall be removed, pruned, or otherwise materially altered without a Tree Removal Permit.³⁶ Therefore, the project applicant shall apply for removal permits as described in MM BIO-6. With the implementation of this measure, potential impacts to protected trees by the development of the proposed project will be reduced to less than significant levels. Impacts would be less than significant with mitigation incorporated.

f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State habitat conservation plan?

No Impact. The proposed project does not lie within the boundaries of any adopted Habitat Conservation Plan (HCP), Natural Community Conservation Plan (NCCP), or other approved local, regional, or State habitat conservation plan. Therefore, no impact would occur.

Mitigation Measures

Project-specific Mitigation Measures

MM BIO-1 To reduce potential impacts on Swainson's hawk to less-than-significant levels under CEQA, the project applicant shall implement the following mitigation measures, in accordance with the California Department of Fish and Wildlife (CDFW) Guidelines:³⁷

Pre-construction Surveys for Swainson's Hawk

Prior to ground disturbance that occurs during the nesting season for Swainson's hawk (generally March 20 to July 20), a qualified Biologist shall conduct Swainson's hawk nesting surveys within a 0.5-mile radius of the project site to determine whether nests are occupied. Occupancy shall be determined through observation of all accessible areas, including from public roads or other publicly accessible observation areas of Swainson's hawk activity (e.g., foraging) on and near the project site.

³⁵ Municipal Code and Charter of the City of Fresno California. 2020. City of Fresno. Republication effective September 4, 2007. Website: https://library.municode.com/ca/fresno/codes/code_of_ordinances?nodeId=MUCOCHFRCA.

³⁶ Ibid

³⁷ California Department of Fish and Wildlife (CDFW). 2000. Recommended Timing and Methodology for Swainson's Hawk Nesting Surveys in California's Central Valley. Swainson's Hawk Technical Advisory Committee. Sacramento, California. May 31, 2000. Website: https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=83990&inline

The qualified Biologist shall follow the survey protocol outlined in the CDFW *Recommended Timing and Methodology for Swainson's Hawk Nesting Surveys in California's Central Valley*, which recommends surveys according to the following survey periods:

- January–March 20: Conduct one survey total. Survey shall be conducted all day.
- **II. March 20–April 5:** Conduct three surveys total. Surveys shall be conducted between surrise to 10:00 a.m. and 4:00 p.m. to sunset.
- **III. April 5–April 20:** Conduct 3 surveys total. Surveys shall be conducted between sunrise to 12:00 p.m. and 4:30 p.m. to sunset.
- **IV. April 21–June 10:** Initiating surveys are not recommended. Monitoring of known nest sites only is recommended.
- V. June 10–July 30: (post-fledging) Conduct three surveys total. Surveys shall be conducted between sunrise to 12:00 p.m. and 4:00 p.m. to sunset.

Pre-construction surveys shall be completed for at least the two survey periods immediately prior to project initiation. It is recommended that surveys be completed in Periods II, III, and V. Surveys shall not be initiated during Period IV.³⁸

MM BIO-2 Swainson's Hawk Avoidance and Minimization and Construction Monitoring

If nests are located and determined to be occupied, minimization measures must be implemented, and construction monitoring must be conducted as follows:

- Construction activities shall be prohibited within 600 feet of an active and occupied Swainson's hawk nests, or within 600 feet of nests under construction, to prevent nest abandonment.
- 2. Notwithstanding the foregoing, if site-specific conditions or the nature of the construction activity (e.g., other nearby development, steep topography, dense vegetation, limited activities) indicate that a smaller buffer, or no buffer at all, could be used, the project applicant may seek approval from the qualified Biologist who in coordination with the California Department of Fish and Wildlife (CDFW) shall determine the appropriate buffer size, which, once approved, shall govern.
- Active nest trees shall be preserved on-site, if feasible. Nest trees, including
 nonnative trees that are lost or impacted by construction activities shall be
 mitigated by the project applicant, in accordance with CDFW's recommendations.

-

³⁸ California Department of Fish and Wildlife (CDFW). 2000. Recommended Timing and Methodology for Swainson's Hawk Nesting Surveys in California's Central Valley. Swainson's Hawk Technical Advisory Committee. Sacramento, California. May 31, 2000. Website: https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=83990&inline.

MM BIO-3 Swainson's Hawk Foraging Habitat Loss Compensation

If prior to or during construction, Swainson's hawks are found foraging on-site or within the agricultural areas in the project vicinity, the project applicant shall provide Habitat Management (HM) lands based on the following ratios in order to mitigate for the loss of up to 30.74 acres of Swainson's hawk foraging habitat in the form of non-native annual grassland:

- a) Projects constructed within 1 mile of an active nest tree shall provide: 1 acre of HM land for each acre of loss of foraging habitat (1:1 ratio).
- b) Projects constructed within 5 miles of an active nest tree but greater than 1 mile from the nest tree shall provide 0.75 acre of HM land for each acre of loss of foraging habitat (0.75:1 ratio).
- c) Projects constructed within 10 miles of an active nest tree but greater than 5 miles from an active nest tree shall provide 0.5 acre of HM land for each acre of loss of foraging habitat (0.5:1 ratio).

All HM lands protected under these requirements may be protected through fee title acquisition or a conservation easement (acceptable to the California Department of Fish and Wildlife [CDFW]) on agricultural lands or other suitable habitats that provide foraging habitat for Swainson's hawk.³⁹

MM BIO-4 Pre-Construction Surveys for Burrowing Owl (includes avoidance and passive relocation if found)

To determine whether burrowing owls have occupied the project site prior to its development, a qualified Biologist shall perform a pre-construction burrowing owl survey to determine burrow locations within 30 days prior to construction activities using California Department of Fish and Wildlife (CDFW) Guidelines. ⁴⁰ If construction is delayed or suspended for more than 30 days after the survey, the area shall be resurveyed. Surveys for occupied burrows shall be completed within all construction areas and within 300 feet of the proposed project impact area (where possible and appropriate based on locations of barren or ruderal habitats). At least 15 days prior to the expected start of any project-related ground disturbance activities, or the restart of activities, the applicant shall provide a burrowing owl survey report with mapping exhibits to the CDFW. If no burrowing owl are detected during the preconstruction survey, no further action is necessary.

³⁹ California Department of Fish and Wildlife (CDFW). 1994. Staff Report Regarding Mitigation for Impacts to Swainson's Hawks (Buteo swainsoni) in the Central Valley of California. Sacramento, California. November 8, 1994. Website: https://nrm.dfg.ca.gov/FileHandler.ashx?DocumentID=83992&inline#:~:text=Since%20over%2095%25%20of%20Swainson's,urban% 20development%20and%20other%20changes

⁴⁰ California Department of Fish and Wildlife (CDFW). 2012. Staff Report on Burrowing Owl Mitigation. State of California Natural Resource Agency Department of Fish and Game. March 7, 2012.

If burrowing owl are detected during the pre-construction survey, the following actions shall be taken to offset impacts during construction (as outlined in CDFW's 2012 Guidelines):

- During the non-breeding season (September 1 through January 31), no
 disturbance shall occur within an approximately 160-foot radius of an occupied
 burrow. During the nesting season (February 1 through August 31), occupied
 burrows shall not be disturbed within a 300-foot radius unless a qualified Biologist
 approved by the CDFW verifies through non-invasive methods that either (1) the
 birds have not begun egg-laying and incubation; or (2) that juveniles from the
 occupied burrows are foraging independently and are capable of independent
 survival.
- If owls must be moved away from the disturbance area, passive relocation techniques (as outlined by the CDFW [i.e., use of one-way doors]) should be used rather than trapping. At least one or more weeks will be necessary to accomplish this and to allow the owls to acclimate to alternate burrows.
- If unpaired owls or paired owls are present in or within 300 feet of areas scheduled for disturbance or degradation (e.g., grading) and nesting is not occurring, owls are to be removed per CDFW-approved passive relocation protocols. Passive relocation requires the use of one-way exclusion doors, which must remain in place at least 48 hours prior to site disturbance to ensure owls have left the burrow prior to construction. A CDFW-approved exclusion plan would be required to implement this measure.
- If paired owls are nesting in areas scheduled for disturbance or degradation, nest(s) shall be avoided from February 1 through August 31 by a minimum 300foot buffer or until fledging has occurred. Following fledging, owls may be passively relocated.

MM BIO-5 Protection of Active Bird Nests (includes pre-construction survey and implementation of avoidance buffer, if found).

- 1. Removal of trees shall be limited to only those necessary to construct the proposed project as reflected in the relevant project approval documents.
- 2. If the project requires trees to be removed during the nesting season, preconstruction surveys shall be conducted 7 days prior to tree removal to determine whether or not active nests are present.
- 3. If an active nest is located during pre-construction surveys, a qualified Biologist shall determine an appropriately-sized avoidance buffer based on the species and anticipated disturbance level. A qualified Biologist will delineate the avoidance buffer using Environmentally Sensitive Area fencing, pin flags, and or yellow caution tape. The buffer zone will be maintained around the active nest site(s) until the young have fledged and are foraging independently. No construction activities or construction foot traffic is allowed to occur within the avoidance buffer(s).

4. The qualified Biologist shall monitor the active nest during construction activities to prevent any potential impacts that may result from the construction of the proposed project, until the young have fledged.

MM BIO-6 Seek Permission from the City for Removal of Protected Trees.

- The applicant shall file and submit an application for a Tree Removal Permit to City of Fresno Planning & Development as described in Fresno City Code 15-2308-D.
- 2. The project shall adhere to replacement tree requirements, as described in Fresno City Code 15-2308-E-4.
- 3. All tree work including but limited to tree pruning and tree removal should be done by trained tree workers, overseen by a Certified Arborist.

2	Environmental Issues Cultural Resources and Tribal Cultural Resources	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
	Would the project:				
a)	Cause a substantial adverse change in the significance of a historical resource as pursuant to Section 15064.5?				
b)	Cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5?				
c)	Disturb any human remains, including those interred outside of formal cemeteries?				
Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:					
d)	Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k), or				
e)	A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resource Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.				

Environmental Evaluation

Setting

This section describes the existing cultural resources setting and potential effects from project implementation on the project site and its surrounding area. Descriptions and analysis in this section are based on information provided by the California Native American Heritage Commission (NAHC), Southern San Joaquin Valley Information Center (SSJVIC), National Register of Historic Places (NRHP), California Register of Historical Resources (CRHR), California Historic Landmarks list, California Points of Historical Interest list, California Built Environment Resource Directory (BERD) for Fresno County, the City of Fresno Historic, and Heritage resource listings. Non-confidential records search results and other correspondence is included in Appendix C.

Southern San Joaquin Valley Information Center

A records search and literature review were conducted on October 26, 2020, at the SSJVIC, located at California State University, Bakersfield, for the project site and a 1-mile radius surrounding it. The purpose of this review was to access existing cultural resource survey reports, archaeological site records, historic aerial photographs, and historic maps and evaluate whether any previously documented prehistoric or historic archaeological sites, architectural resources, cultural landscapes, or other resources exist within or near the project site.

The results of the records search indicate that one historic-era resource has been recorded within the 1-mile search radius, however, no resources were recorded within the project boundary. In addition, 17 area-specific survey reports are on file with the SSJVIV for the project site and its 1-mile search radius. Reports FR-00257, FR-01709, FR-01740, FR-02567 address portions of the project site, indicating that it has previously been surveyed for cultural resources. A records search map identifying the project boundaries and a 1-mile search radius along with relevant non-confidential records search results can be found in Appendix C.

Pedestrian Survey/Architectural and Historic Resources Assessment

On November 24, 2020, FCS Senior Archaeologist, Dana Douglas DePietro, PhD, conducted a pedestrian survey for unrecorded cultural resources within the project site, which consists of two parcels containing a private residence in the northwest, a central parking lot/flea market, and open agricultural land to the southeast. The survey began in the northwest portion of the proposed development area and moved south, using east-west transects spaced at approximately 5-meter intervals across the project site wherever possible. Visibility of native soils was poor in the areas containing the residence and parking lot (10-15 percent), but visibility improved in the open agricultural space to the southeast (70-80 percent). The northwest corner of the project site contains a private residence over 50 years old that has not previously been evaluated for historic significance. The residence at 5406 East Olive Street (APN 456-030-018) was evaluated relative to the four CRHR eligibility criteria and found to be ineligible as it did not meet any of the criteria for historic and/or architectural significance required for listing on the NRHP, CRHR, or at the local level.

Native American Heritage Commission

On October 23, 2020, FCS sent a request to the NAHC to determine whether any sacred sites are listed on its Sacred Lands File for the project site. A response was received on November 9, 2020, indicating that the Sacred Lands File search failed to locate the presence of Native American Tribal Cultural Resources (TCRs) within the immediate project site. The NAHC provided a list of 16 tribal representatives available for consultation. To ensure that all Native American knowledge and concerns over potential TCRs that may be affected by the proposed project are addressed, a letter containing project information requesting any additional information was sent to each tribal representative on January 25, 2021. Responses were received from three representatives on January 26, 2021. Tribal Chairperson, Elizabeth D. Hutchins-Kipp, of Big Sandy Rancheria, stated that the tribe had no comments or concerns with the proposed project. Tribal Chairperson Dirk Charley of the Dunlap Band of Mono Indians stated in a follow up telephone call that their ancestral territory lies 40 miles to the east, had no concerns and recommended contacting the other two tribes identified by

the NAHC. Tribal Chairperson Ron Wood of the North Fork Mono Tribe stated that other than Fancher Creek, which was a major thoroughfare for the indigenous people traveling from the upper foothills to the Valley tribes and resources along the sloughs and dunes, all located outside the project site, he had no concerns about the proposed project. NAHC correspondence and copies of NAHC letters can be found in Appendix C.

Additionally, on April 13, 2021, the City of Fresno sent letters requesting AB-52 consultation to the 16 tribal representatives available for consultation. The City did not receive any responses during the 30-day consultation period.

Cultural Resources

Would the project:

a) Cause a substantial adverse change in the significance of a historical resource as pursuant to Section 15064.5?

Less than significant impact. CEQA Guidelines Section 15064.5 defines "historic resources" as resources listed in the CRHR, a local register, determined significant by the lead agency, or determined to be eligible by the California Historical Resources Commission for listing in the CRHR. The criteria for eligibility are generally set by the National Historic Preservation Act of 1966, which established the NRHP and which recognizes properties that are significant at the national, State, and local levels. To be eligible for listing in the NRHP and CRHR, a district, site, building, structure, or object must possess integrity of location, design, setting, materials, workmanship, feeling, and association relative to American history, architecture, archaeology, engineering, or culture. In addition, unless the property possesses exceptional significance, it must be at least 50 years old to be eligible. 41

The records search conducted at the SSJVIC for the project site determined that one historic resource is recorded within 1 mile of the project site; however, it is not within the project boundaries. Additionally, the pedestrian survey, architectural and historic resource assessment for the site was conducted on November 24, 2020, which evaluated the single-family residence at 5406 East Olive Street (APN 456-030-018) for historical significance. It was determined the single-family residence does not meet any of the criteria for historic and/or architectural significance required for listing a site on the NRHP or CRHR. However it is possible that earthmoving activities associated with project construction could encounter previously undiscovered historical resources. Historical resources can include but are not limited to stone, bone, or wood artifacts or features, or sites including privies, standing structures, or fences. Damage or destruction of these resources would be a potentially significant impact. Implementation of the General Plan MEIR MM CUL-1 would ensure that this potential impact is reduced to a less than significant level. As such, the proposed project would not cause a substantial adverse change in the significance of a historical resource pursuant to

⁴¹ National Register of Historic Places (NRHP). 2020. Publications of the National Register of Historic Places. Website: https://www.nps.gov/subjects/nationalregister/publications.htm. Accessed May 1, 2020.

Section 15064.5 with the implementation of General Plan MEIR MM CUL-1. Impacts would be less than significant.

b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5?

Less than significant impact. Section 15064.5 of the CEQA Guidelines defines significant archaeological resources as resources that meet the criteria for historical resources, as discussed above, or resources that constitute unique archaeological resources. A project-related significant adverse effect could occur if a project were to affect archaeological resources that fall under either of these categories.

The results from the SSJVIC indicate that one historic resource is recorded within 1 mile of the project site. There are no recorded prehistoric or historic archaeological resources located within or near the project site. Given the disturbed conditions of the project site, the potential to impact an unidentified archaeological resource is considered low. However it is possible that earthmoving activities associated with project construction could encounter previously undiscovered archaeological resources. Archaeological resources can include but are not limited to stone, bone, wood, or shell artifacts or features, including hearths and structural elements. Damage or destruction of these resources would be a potentially significant impact. Implementation of the General Plan MEIR MM CUL-2 would ensure that this potential impact is reduced to a less than significant level. As such, the proposed project would not cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5 with the implementation of General Plan MEIR MM CUL-2. Impacts would be less than significant.

c) Disturb any human remains, including those interred outside of formal cemeteries?

Less than significant impact. As noted above, the project site has been disturbed for agricultural purposes. Therefore, the potential for the disturbance of any human remains is considered low. While it is highly unlikely that the presence of human remains exists within or near the project site, there is always the possibility that subsurface construction activities associated with the proposed project, such as grading or trenching, could potentially damage or destroy previously undiscovered human remains. In the event of the accidental discovery or recognition of any human remains, CEQA Guidelines Section 15064.5, Health and Safety Code Section 7050.5, and Public Resources Code Sections 5097.94 and 5097.98 must be followed. General Plan MEIR MM CUL-4 further specifies the procedures to follow in the event human remains are uncovered. Along with compliance with these guidelines and statutes, implementation of this mitigation would reduce potential impacts related to human remains to a less than significant level.

Tribal Cultural Resources

Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code Section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:

- d) Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k), or
- e) A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resource Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.

Less than significant impact. AB 52 specifies that a project that may cause a substantial adverse change to a defined TCR and may result in a significant effect on the environment. AB 52 requires tribes interested in development projects within a traditionally and culturally affiliated geographic area to notify a lead agency of such interest and to request notification of future projects subject to CEQA prior to determining if a Negative Declaration (ND), Mitigated Negative Declaration (MND), or Environmental Impact Report (EIR) is required for a project. When a development application is determined complete subject to CEQA, the lead agency is required to notify the tribe within 14 days with an invitation to consult. AB 52 identifies examples of mitigation measures that would avoid or minimize impacts to TCRs. AB 52 makes the above provisions applicable to projects that have a Notice of Preparation (NOP) or a Notice of Intent (NOI) to adopt an ND/MND circulated on or after July 1, 2015. AB 52 amends Public Resource Code Section 5097.94 and adds Public Resource Code Sections 21073, 21074, 2108.3.1, 21080.3.2, 21082.3, 21083.09, 21084.2, and 21084.3, relating to Native Americans. A review of the CRHR, local registers of historic resources, the records search conducted at the SSJVIC, and the results from the NAHC Sacred Lands File search failed to identify any listed TCRs that may be adversely affected by the proposed project. However, in accordance with AB 52, AB 52 consultation letters were sent to all requesting tribes on April 13, 2021. The City did not receive any responses during the consultation period. With the implementation of MEIR MM CUL-1, MM CUL-2, and MM CUL-4, impacts would be less than significant.

Mitigation Measures

Applicable General Plan MEIR Mitigation Measures

activities, construction shall stop in the immediate vicinity of the find and a qualified historical resources specialist shall be consulted to determine whether the resource requires further study. The qualified historical resources specialist shall make recommendations to the City on the measures that shall be implemented to protect the discovered resources, including but not limited to

MEIR MM CUL-1 If previously unknown resources are encountered before or during grading

implemented to protect the discovered resources, including but not limited to excavation of the finds and evaluation of the finds in accordance with Section 15064.5 of the CEQA Guidelines and the City's Historic Preservation Ordinance.

If the resources are determined to be unique historical resources as defined under Section 15064.5 of the CEQA Guidelines, measures shall be identified by the monitor and recommended to the Lead Agency. Appropriate measures for

significant resources could include avoidance or capping, incorporation of the site in green space, parks, or open space, or data recovery excavations of the finds.

No further grading shall occur in the area of the discovery until the Lead Agency approves the measures to protect these. Any historical artifacts recovered as a result of mitigation shall be provided to a City-approved institution or person who is capable of providing long-germ preservation to allow future scientific study.

MEIR MM CUL-2 Subsequent to a preliminary City review of the project grading plans, if there is evidence that a project will include excavation or construction activities within previously undisturbed soils, a field survey and literature search for prehistoric archaeological resources shall be conducted. The following procedures shall be followed.

If prehistoric resources are not found during either the field survey or literature search, excavation and/or construction activities can commence. In the event that buried prehistoric archaeological resources are discovered during excavation and/or construction activities, construction shall stop in the immediate vicinity of the find and a qualified Archaeologist shall be consulted to determine whether the resource requires further study. The qualified Archaeologist shall make recommendations to the City on the measures that shall be implemented to protect the discovered resources, including but not limited to excavation of the finds and evaluation of the finds in accordance with CEQA Guidelines Section 15064.5.

If the resources are determined to be unique prehistoric archaeological resources as defined under Section 15064.5 of the CEQA Guidelines, mitigation measures shall be identified by the monitor and recommended to the Lead Agency. Appropriate measures for significant resources could include avoidance or capping, incorporation of the site in green space, parks, or open space, or data recovery excavations of the finds. No further grading shall occur in the area of the discovery until the Lead Agency approves the measures to protect these resources. Any prehistoric archaeological artifacts recovered as a result of mitigation shall be provided to a City-approved institution or person who is capable of providing long-term preservation to allow future scientific study.

If prehistoric resources are found during the field survey or literature review, the resources shall be inventoried using appropriate State record forms and submit the forms to the Southern San Joaquin Valley Information Center. The resources shall be evaluated for significance. If the resources are found to be significant, measures shall be identified by the qualified Archaeologist. Similar to above, appropriate mitigation measures for significant resources could include avoidance or capping, incorporation of the site in green space, parks, or open space, or data recovery excavations of the finds.

In addition, appropriate mitigation for excavation and construction activities in the vicinity of the resources found during the field survey or literature review shall include an archaeological monitor. The monitoring period shall be determined by the qualified Archaeologist. If additional prehistoric archaeological resources are found during excavation and/or construction activities, the procedure identified above for the discovery of unknown resources shall be followed.

MEIR MM CUL-4 In the event that human remains are unearthed during excavation and grading activities of any future development project, all activity shall cease immediately. Pursuant to Health and Safety Code (HSC) Section 7050.5, no further disturbance shall occur until the County Coroner has made the necessary findings as to origin and disposition pursuant to PRC Section 5097.98(a). If the remains are determined to be of Native American descent, the coroner shall within 24 hours notify the Native American Heritage Commission (NAHC). The NAHC shall then contact the most likely descendent of the deceased Native American, who shall then serve as the consultant on how to proceed with the remains.

> Pursuant to Public Resources Code Section 5097.98(b), upon the discovery of Native American remains, the landowner shall ensure that the immediate vicinity, according to generally accepted cultural or archaeological standards or practices, where the Native American human remains are located is not damaged or disturbed by further development activity until the landowner has discussed and conferred with the most likely descendants regarding their recommendations, if applicable, taking into account the possibility of multiple human remains. The landowner shall discuss and confer with the descendants all reasonable options regarding the descendants' preferences for treatment.

Environmental Issues 2.6 Energy Would the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a) Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?				
b) Conflict with or obstruct a State or local plan for renewable energy or energy efficiency?				

Environmental Evaluation

Setting

A discussion of the proposed project's anticipated energy usage is presented below. Energy use consumed by the proposed project was estimated and includes natural gas, electricity, and fuel consumption for project construction and operation. Energy calculations are included as part of Appendix A.

Would the project:

a) Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?

Less than significant impact. Impacts from construction and operations of the project are discussed separately below.

Construction Impacts

The project construction schedule was assumed to begin in July 2021 and conclude in June 2022. If the construction schedule moves to later years, construction emissions would likely decrease because of improvements in technology and more stringent regulatory requirements as older, less efficient equipment is replaced by newer and cleaner equipment. The proposed project would require demolition, site preparation, grading, building construction, architectural coating, and paving. The construction phase would require energy for the manufacture and transportation of building materials, preparation of the site (e.g., demolition, site clearing, and grading), and the actual construction of the building. Petroleum-based fuels such as diesel fuel and gasoline would be the primary sources of energy for these tasks.

The types of on-site equipment used during construction of the proposed project could include gasoline- and diesel-powered construction and transportation equipment, including trucks, bulldozers, frontend loaders, forklifts, and cranes. Construction equipment is estimated to consume a total of 123,142 gallons of diesel fuel over the entire construction duration (Appendix A).

Fuel use associated with construction vehicle trips generated by the proposed project was also estimated; trips include construction worker trips, haul truck trips for material transport, and vendor trips for construction material deliveries. Fuel use from these vehicles traveling to the project site was based on (1) the projected number of trips the proposed project would generate during construction, (2) average trip distances by trip type, and (3) fuel efficiencies estimated in the ARB EMFAC mobile source emission model. The specific parameters used to estimate fuel usage are included in Appendix D. In total, the proposed project is estimated to generate 2,392,768 VMT and a combined 140,796 gallons of gasoline and diesel for vehicle travel during construction.

Other equipment could include construction lighting, field services (office trailers), and electrically driven equipment such as pumps and other tools. Section 10-109 of the Fresno Municipal Code defines permissible hours of construction as between the hours of 7:00 a.m. and 10:00 p.m. Monday through Saturday. As on-site construction activities would be restricted to these hours; it is anticipated that the use of construction lighting would be minimal. Singlewide mobile office trailers, which are commonly used in construction staging areas, generally range in size from 160 square feet to 720 square feet. A typical 720-square-foot office trailer would consume approximately 6,548 kilowatt-hour (kWh) during the 12-month construction phase (Appendix A).

The overall construction schedule and process is already designed to be efficient in order to avoid excess monetary costs. For example, equipment and fuel are not typically used wastefully due to the added expense associated with renting the equipment, maintaining it, and fueling it. Therefore, the opportunities for future efficiency gains during construction are limited. Therefore, it is anticipated that the construction phase of the proposed project would not result in wasteful, inefficient, and unnecessary consumption of energy. Construction-related energy impacts would be less than significant.

Operational Impacts

The proposed project would consume energy as part of building operations and transportation activities. Project energy consumption is summarized in Table 11.

Table 11: Estimated Annual Project Energy Consumption

Energy Consumption Activity	Annual Consumption
Electricity Consumption	2,062,869 kWh/year
Natural Gas Consumption	3,173,128 kBTU/year
Total Fuel Consumption	356,361 gallons of gasoline and diesel
Operational Fuel Consumption–Passenger Vehicles	111,583 gallons of gasoline and diesel
Operational Fuel Consumption–Vans	95,489 gallons of gasoline and diesel
Operational Fuel Consumption–Trucks	149,289 gallons of gasoline and diesel

⁴² City of Fresno. 2020. Fresno Municipal Code, Section 10-105. Website: https://library.municode.com/ca/fresno/codes/code_of_ordinances?nodeId=MUCOFR_CH10REREPUNUREPRCOUS_ART1NORE_S10 -109EX. Accessed December 10, 2020.

Annual Consumption	Energy Consumption Activity
	Notes: kWh = kilowatt-hour
	kBTU = kilo-British Thermal Unit
	kWh = kilowatt-hour kBTU = kilo-British Thermal Unit VMT = Vehicle Miles Traveled Source: Appendix A.

Operation of the proposed project would consume an estimated 2,062,869 kWh of electricity and an estimated 3,173,128 kilo-British Thermal Unit (kBTU) of natural gas on an annual basis. The proposed project's building would be designed and constructed in accordance with the City's latest adopted energy efficiency standards, which are based on the State's Building Energy Efficiency Standards. These are widely regarded as the most advanced building energy efficiency standards and compliance would ensure that building energy consumption would not be wasteful, inefficient, or unnecessary. In addition, PDF GHG-1 would require the construction of the building to facilitate sufficient electric charging for trucks to plug in, in anticipation of future technology that allows trucks to operate partially on electricity. Additionally, with incorporation of PDF GHG-2, all buildings would provide electric infrastructure to support use of exterior yard trucks and on-site vehicles.

Project-related vehicle trips would consume an estimated 356,361 gallons of gasoline and diesel annually.

Regional access to the project site is provided via SR-180, which is adjacent to the project site. In addition, the northwest corner of the project site is adjacent to the SW Olive and Minnewawa bus stop for the Fresno Area Express local bus route (35). Thus, transportation fuel consumption would not be wasteful, inefficient, or unnecessary. Impacts would be less than significant.

b) Conflict with or obstruct a State or local plan for renewable energy or energy efficiency?

Less than significant impact. The proposed project would be served with electricity provided by PG&E. In 2017, PG&E obtained 33 percent of its electricity from renewable energy sources (13 percent solar, 8 percent wind, 5 percent geothermal, 4 percent biomass and biowaste, and 3 percent eligible hydroelectric), while the remaining electricity was sourced from nuclear (27 percent), natural gas (20 percent), large hydroelectric (18 percent), and unspecified sources of power (2 percent). Therefore, the proposed project's electricity provider meets the State's current objective of 33 percent of electricity from renewable energy sources. The utility would be required to meet the future objective of 60 percent of electricity from renewable energy sources by 2030. The proposed warehouse building would be designed in accordance with Title 24, California's Energy Efficiency Standards for Nonresidential Buildings. These standards include minimum energy efficiency requirements related to building envelope, mechanical systems (e.g., heating, ventilation, and air conditioning [HVAC] and water heating systems), and indoor and outdoor lighting. The incorporation of the Title 24 standards into the design of the proposed project would ensure that the proposed project would not result in the use of energy in a wasteful manner.

The Fresno General Plan contains the following policies related to energy conservation that are relevant to the proposed project.⁴³

Implementing Policies

- RC-5-c GHG Reduction through Design and Operations. Increase efforts to incorporate requirements for GHG emission reductions in land use entitlement decisions, facility design, and operational measures subject to City regulation through the following measures and strategies:
 - Promote the expansion of incentive-based programs that involve certification of projects for energy and water efficiency and resiliency. These certification programs and scoring systems may include public agency "Green" and conservation criteria, Energy Star™ certification, CALGreen Tier 1 or Tier 2, Leadership in Energy Efficient Design (LEED™) certification, etc.
 - Promote appropriate energy and water conservation standards and facilitate mixed-use projects, new incentives for infill development, and the incorporation of mass transit, bicycle and pedestrian amenities into public and private projects.
 - Require energy and water audits and upgrades for water conservation, energy
 efficiency, and mass transit, pedestrian, and bicycle amenities at the time of
 renovation, change in use, change in occupancy, and change in ownership for
 major projects meeting review thresholds specified in an implementing
 ordinance.
 - Incorporate the City's "Guidelines for Ponding Basin/Pond Construction and Management to Control Mosquito Breeding" as conditions of approval for any project using an on-site stormwater basin to prevent possible increases in vectorborne illnesses associated with global climate change.
 - Periodically evaluate the City's facility maintenance practices to determine
 whether there are additional opportunities to reduce GHGs through facility
 cleaning and painting, parks maintenance, road maintenance, and utility system
 maintenance.
 - Periodically evaluate standards and mitigation strategies for highly vehicledependent land uses and facilities, such as drive-through facilities and autooriented development.
- **RC-5-f Toolkit.** Provide residents and project applicants with a "toolkit" of generally feasible measures that can be used to reduce GHG emissions, including educational materials on energy-efficient and "climate-friendly" products.
- **RC-8-a Existing Standards and Programs.** Continue existing beneficial energy conservation programs, including adhering to the California Energy Code in new construction and major renovations.

_

⁴³ City of Fresno. 2014. City of Fresno General Plan. December. Website: https://www.fresno.gov/darm/general-plan-development-code/. Accessed November 23, 2020.

- **RC-8-b Energy Reduction Targets.** Strive to reduce per capita residential electricity use to 1,800 kWh per year and non-residential electricity use to 2,700 kWh per year per capita by developing and implementing incentives, design and operation standards, promoting alternative energy sources, and cost-effective savings.
- **RC-8-c** Energy Conservation in New Development. Consider providing an incentive program for new buildings that exceed California Energy Code requirements by fifteen percent.
- RC-8-e Energy Use Disclosure. Promote compliance with State law mandating disclosure of a building's energy data and rating of the previous year to prospective buyers and lessees of the entire building or lenders financing the entire building.

While several of these policies are voluntary or are cannot be implemented by an individual development project, compliance with Title 24 standards would ensure that the proposed project would not conflict with any of the General Plan energy conservation policies related to the proposed project's building envelope, mechanical systems, and indoor and outdoor lighting.

The proposed project would comply with existing State energy standards and with energy conservation policies contained in the Fresno General Plan. In addition, PDF GHG-1 would require the construction of the building to facilitate sufficient electric charging for trucks to plug in, in anticipation of future technology that allows trucks to operate partially on electricity. Additionally, with incorporation of PDF GHG-2, all buildings would provide electric infrastructure to support use of exterior yard trucks and on-site vehicles. As such, the proposed project would not conflict with State or local renewable or energy efficiency objectives. Impacts would be less than significant.

Mitigation Measures

None required.

2.7		Environmental Issues ology and Soils uld the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a)		ectly or indirectly cause potential substantial adve plving:	rse effects, in	cluding the risk	of loss, injury	, or death
	i)	Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.				
	ii)	Strong seismic ground shaking?		\boxtimes		
	iii)	Seismic-related ground failure, including liquefaction?				
	iv)	Landslides?			\boxtimes	
b)		ult in substantial soil erosion or the loss of soil?			\boxtimes	
c)	or t proj land	ocated on a geologic unit or soil that is unstable, hat would become unstable as a result of the ject, and potentially result in on- or off-site dslide, lateral spreading, subsidence, liquefaction ollapse?				
d)	1-B sub	ocated on expansive soil, as defined in Table 18- of the Uniform Building Code (1994), creating stantial direct or indirect risks to life or perty?				
e)	use disp	e soils incapable of adequately supporting the of septic tanks or alternative wastewater osal systems where sewers are not available for disposal of wastewater?				
f)	pale	ectly or indirectly destroy a unique eontological resource or site or unique geologic cure?				

Environmental Evaluation

Setting

The analysis in this section is based on the Geotechnical Engineering Investigation prepared by Krazan & Associates, Inc. on December 4, 2020, and the Paleontological records search conducted by

Dr. Kenneth Finger. The Geotechnical Engineering Investigation and Paleontological Records Search Results can be found in Appendix D.

Geotechnical Engineering Investigation

The geotechnical Engineering Investigation was conducted to evaluate the soil and groundwater conditions at the project site, to make geotechnical engineering recommendations for use in design of specific construction elements, and to provide criteria for site preparation and Engineered Fill construction.

The project site is located in the San Joaquin Valley, which is bounded on the east by the Sierra Nevada Mountains, and on the west by the Coast Ranges. The Coast Ranges are composed of sedimentary and metamorphic rocks that are sharply deformed into complex structures, and are broken by numerous faults, with the San Andreas Fault being the most notable structural feature. Portions of the Ortigalita, Calaveras, Hayward, and Rinconada Faults are located to the west and considered potentially active. The San Andreas Fault, which is possibly the best known fault, is located approximately 60 miles to the west.

There are no active fault traces in the vicinity of the project. Furthermore, the project is not located in an area within an Earthquake Fault Zone (Special Studies Zone), and would not require a special site investigation by an Engineering Geologist. There is the potential for Fresno residents to feel the effects of a large seismic event on one of the nearby active or potentially active fault zones.

The Geotechnical Engineering Investigation determined that since there are no known faults within the immediate area of the project site, ground rupture from surface faulting is not considered to be a potential issue. Furthermore, seiche and landslides are not considered hazards in the project area, and liquefaction potential is considered low as groundwater occurs below 60 feet. Lastly, according to the Five County Seismic Safety Element, the potential for deep subsidence issues is considered low to moderate. There are no known occurrences of structural or architectural damage due to deep subsidence in the Fresno area.⁴⁴

As part of the Geotechnical Engineering Investigation, subsurface soil conditions were explored by drilling 22 borings to depths of approximately 20 to 30 feet below existing side grade. Seven bulk subgrade samples were obtained from the site for laboratory R-value testing. Penetration tests were performed at regular intervals to evaluate the soil consistency and to obtain information regarding the engineering properties of the subsoils. These soil samples were retained for laboratory testing. The results of the laboratory testing can be found in Appendix A of the Geotechnical Engineering Investigation (Appendix D).

Subsurface conditions encountered during the investigation appeared to be typical of those found in the geologic region of the project site. fill material found within the site consist primarily of silty sand, silty sand/sandy silt, and clayey sand. Some soils contained trace amounts of clay. Limited testing of the fill soils indicated the fill soils had varying strength characteristics ranging from loosely placed to compacted. Below the loose surface soils and fill material, approximately 1.5 to 4 feet of

⁴⁴ Krazan & Associates, Inc. 2020. Geotechnical Engineering Investigation. Proposed DSJ5 Delivery Station Building. December 4, 2020.

medium dense to dense silty sand, silty sand/sandy silt, or clayey sand were encountered. Some of these soils contained trace amounts of clay. Field and laboratory tests suggest that these soils are moderately strong, slightly to moderately compressible, and have low expansion potential. Below 3.5 to 5 feet, alternating layers of loose to very dense silty sand, silty sand/sandy silty, sandy silt, clayey sandy silt, clayey silty sand, silty sand/sand, or sand were encountered. Some of these soils had trace amounts of clay, and testing determined that these soils are moderately strong and highly compressible. The full details related to the soils encountered can be found in Appendix D.

Test borings were checked for the presence of groundwater during and immediately following drilling operations. Information from the Department of Water Resources indicates that groundwater has been historically deeper than 100 feet within the project site vicinity.

Paleontological Records Search

Dr. Kenneth Finger conducted a paleontological record search of the University of California Museum of Paleontology (UCMP) database. The results indicate that the project site is mapped as Recent (Holocene) Great Valley fan deposits (Qf) and late Pleistocene nonmarine deposits (Qc). Holocene deposits are too young to be fossiliferous, while the Riverbank Formation has the potential to yield significant paleontological resources. From where it is mapped in the eastern part of the project site, the Riverbank Formation very likely extends westward in the shallow subsurface beneath the Holocene fan deposits. The records search identified five vertebrate localities in the vicinity of Fresno. The locality nearest to the site is approximately 3 miles southeast.⁴⁵

Would the project:

- a) Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury or death involving:
- i) Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? Refer to Division of Mines and Geology Special Publication 42.

Less than significant impact with mitigation incorporated. According to the Fresno General Plan, the City is not located within an Alquist-Priolo Special Fault Study Zone. ⁴⁶ Furthermore, the Geotechnical Engineering Investigation determined that since there are no known faults within the immediate vicinity of the project, ground rupture from surface faulting is not considered to be a potential issue. However, Fresno residents could feel the effects of a large seismic event on one of the nearby active or potentially active fault zones. The proposed project would be required to comply with the most recent California Building Standards Code (CBC) requirements to reduce seismic hazards. Furthermore, implementation of MM GEO-1, which requires adherence to the recommendations outlined in the Geotechnical Engineering Investigation related to site preparation, backfill, foundations, and other construction related recommendations that would reduce significant

⁴⁵ Dr. Kenneth L. Finger. 2020. Paleontological Records Search for the Fresno Warehouse Project. October 23, 2020.

⁴⁶ City of Fresno. 2019. Fresno General Plan. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2019/07/Consolidated-GP-7-2019.pdf. Accessed October 19, 2020.

impacts related to rupture of a known earthquake fault. Therefore, with implementation of MM GEO-1, impacts would be less than significant with mitigation incorporated.

ii) Strong seismic ground shaking?

Less than significant impact with mitigation incorporated. There is potential for the project site to experience strong seismic ground shaking, as the San Andreas Fault is located approximately 60 miles west. Strong seismic ground shaking from the San Andreas Fault could result in structural failure and collapse of structures, or cause non-structural building elements to fall, presenting a hazard to building occupants and a potentially significant impact. As mentioned above, the proposed project would be required to comply with the most recent CBC requirements for reducing seismic hazards. Furthermore, implementation of MM GEO-1, which requires adherence to the recommendations outlined in the Geotechnical Engineering Investigation, would further reduce potential impacts related to seismic ground shaking. Therefore, with implementation of MM GEO-1, impacts would be less than significant.

iii) Seismic-related ground failure, including liquefaction?

Less than significant impact. As mentioned above, the Geotechnical Engineering Investigation determined that the potential for liquefaction is considered to be low, as groundwater occurs below 60 feet at the project site. Additionally, adherence to the recommendations outlined in MM GEO-1 would further reduce the already less than significant impacts of seismic-related ground failure including liquefaction. As such, impacts would be less than significant.

iv) Landslides?

Less than significant impact. The project site is located in an urban and developed area of the City of Fresno, and located on two relatively flat parcels. Due to the flat topography of the site and existing development in the project vicinity, the project is not susceptible to landslides. Consequently, the Geotechnical Engineering Investigation determined that landslides are not considered a hazard in the project area. As such, impacts would be less than significant.

b) Result in substantial soil erosion or the loss of topsoil?

Less than significant impact. Project construction would include clearing, grading, excavation, and other earthmoving activities. These activities would disturb surface soils and make them vulnerable to wind and precipitation, which could lead to soil erosion, a potentially significant impact. However, projects that disturb one or more acre of soil are required to obtain the General Permit for Discharges of Stormwater Associated with Construction Activity (Construction General Permit), issued by the California State Water Resources Control Board (State Water Board). The Construction General Permit requires the development and implementation of a Storm Water Pollution Prevention Plan (SWPPP). The SWPPP must list Best Management Practices (BMPs) that the project will implement to control erosion and prevent the conveyance of sediments off-site. Implementation of the conditions of the Construction General Permit would reduce erosion impacts resulting from project construction to less than significant levels.

At operation, the proposed project would include new impervious surfaces and landscaping that would minimize soil exposure and erosion risks. The proposed project would adhere to the requirements outlined in Article 7, Urban Storm Water Quality Management and Discharge Control, of the FMC, which requires the implementation of BMPs to reduce the risk of pollutants. In addition, installation of landscaping throughout the site, and the proximity of the detention basin located southwest of the project site would further filter sediment leaving the project site. As a result, compliance with the Construction General Permit, FMC, and recommendations in the Geotechnical Engineering Investigation would reduce potential soil loss to the maximum extent practicable. Therefore, impacts would be less than significant.

c) Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?

Less than significant impact with mitigation incorporated. As mentioned above, the potential for landslides and liquefaction is considered low. Lateral spreading generally occurs when a weakening or a failure of an embankment or soil mass overlying a layer of liquefied sands or weak soils. There is potential for seismic activity to occur at the site, and for the project to be located on expansive soil. However, implementation of MM GEO-1, which requires adherence to the recommendations outlined in the Geotechnical Engineering Investigation, would reduce impacts related to seismic activity to a less than significant level. Therefore, impacts would be less than significant with mitigation incorporated.

d) Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?

Less than significant impact with mitigation incorporated. The Geotechnical Engineering Investigation determined that some of the soils within the project site are expansive. These soils may crack and heave foundations and slabs-on-grade if they expand or shrink as their water content changes throughout the year. This represents a potentially significant impact. The proposed project would be required to adhere to MM GEO-1, which requires compliance with the recommendations in the Geotechnical Engineering Investigation. Adherence to these recommendations would ensure that the soils within the site adequately support the proposed project. With implementation of MM GEO-1, impacts would be less than significant with mitigation incorporated.

e) Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?

No impact. The proposed project consists of the construction of a delivery service building, located in an urban and developed area of the City of Fresno. The proposed project would connect to the existing sewer system within the City. The proposed project would not require the use of septic tanks or alternative wastewater disposal systems. As such, no impact would occur.

f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?

Less than significant impact. The Paleontological Records Search conducted by Dr. Kenneth Finger determined that the project site and surrounding 0.5-mile area are mapped as Recent (Holocene) Great Valley fan deposits and late Pleistocene nonmarine deposits. Holocene deposits are too young to be fossiliferous, while the Riverbank Formation has the potential to yield significant paleontological resources. Furthermore, the records search of the University of California Museum of Paleontology (UCMP) database revealed give vertebrate localities, two of which are in the vicinity of Fresno.

The Records Search indicated that late Pleistocene deposits have a high paleontological sensitivity and a low-to-moderate paleontological potential for significant paleontological resources. While the heavily disturbed surface of the project site precludes the need for a preconstruction paleontological survey, implementation of General Plan MEIR MM CUL-3, which requires paleontological monitoring of construction-related earth-disturbing activities, would reduce potential impacts to paleontological resources to a less than significant level. Therefore, impacts would be less than significant.

Mitigation Measures

Applicable General Plan MEIR Mitigation Measures

MEIR MM CUL-3 Subsequent to a preliminary City review of the project grading plans, if there is evidence that a project will include excavation or construction activities within previously undisturbed soils, a field survey and literature search for unique paleontological/geological resources shall be conducted. The following procedures shall be followed:

If unique paleontological/geological resources are not found during either the field survey or literature search, excavation and/or construction activities can commence. In the event that unique paleontological/geological resources are discovered during excavation and/or construction activities, construction shall stop in the immediate vicinity of the find and a qualified Paleontologist shall be consulted to determine whether the resource requires further study. The qualified Paleontologist shall make recommendations to the City on the measures that shall be implemented to protect the discovered resources, including but not limited to, excavation of the finds and evaluation of the finds. If the resources are determined to be significant, mitigation measures shall be identified by the monitor and recommended to the Lead Agency. Appropriate mitigation measures for significant resources could include avoidance or capping, incorporation of the site in green space, parks, or open space, or data recovery excavations of the finds. No further grading shall occur in the area of the discovery until the Lead Agency approves the measures to protect these resources. Any paleontological/geological resources recovered as a result of mitigation shall be provided to a City-approved institution

or person who is capable of providing long-term preservation to allow future scientific study.

If unique paleontological/geological resources are found during the field survey or literature review, the resources shall be inventoried and evaluated for significance. If the resources are found to be significant, mitigation measures shall be identified by the qualified Paleontologist. Similar to above, appropriate mitigation measures for significant resources could include avoidance or capping, incorporation of the site in green space, parks, or open space, or data recovery excavations of the finds. In addition, appropriate mitigation for excavation and construction activities in the vicinity of the resources found during the field survey or literature review shall include a paleontological monitor. The monitoring period shall be determined by the qualified Paleontologist. If additional paleontological/geological resources are found during excavation and/or construction activities, the procedure identified above for the discovery of unknown resources shall be followed.

Project-specific Mitigation Measures

MM GEO-1 The project shall adhere to all recommendations outlined in the Geotechnical Engineering Investigation.

Environmental Issues 2.8 Greenhouse Gas Emissions Would the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?				
b) Conflict with any applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?				

Environmental Evaluation

Setting

Greenhouse Gases Assessed

This analysis is restricted to GHGs identified by AB 32, which include carbon dioxide, methane, N₂O, hydrofluorocarbons, perfluorocarbons, and sulfur hexafluoride.

The project may emit GHGs that are not defined by AB 32. For example, the proposed project may generate aerosols through emissions of DPM from the vehicles and trucks that would access the project site. Aerosols are short-lived particles, as they remain in the atmosphere for about one week. Black carbon is a component of aerosol. Studies have indicated that black carbon has a high global warming potential; however, the Intergovernmental Panel on Climate Change states that it has a low level of scientific certainty.⁴⁷

Water vapor could be emitted from evaporated water used for landscaping, but this is not a significant impact because water vapor concentrations in the upper atmosphere are primarily due to climate feedbacks rather than emissions from project-related activities.

The proposed project would emit NO_x and VOCs, which are ozone precursors. Ozone is a GHG; however, unlike the other GHGs, ozone in the troposphere is relatively short-lived and can be reduced in the troposphere on a daily basis. Stratospheric ozone can be reduced through reactions with other pollutants.

Certain GHGs defined by AB 32 would not be emitted by the proposed project. Perfluorocarbons and sulfur hexafluoride are typically used in certain industrial applications, none of which would be used by

_

Intergovernmental Panel on Climate Change (IPCC). 2007. Climate Change 2007: The Physical Science Basis. Contribution of Working Group I to the Fourth Assessment Report of the Intergovernmental Panel on Climate Change (Solomon, S., D. Qin, M. Manning, Z. Chen, M. Marquis, K.B. Averyt, M. Tignor and H.L. Miller [eds.]). Cambridge University Press, Cambridge, United Kingdom and New York, NY, USA. Website: www.ipcc.ch/ publications_and_data/ar4/wg1/en/contents.html. Accessed April 25, 2016.

the project. Therefore, it is not anticipated that the proposed project would emit perfluorocarbons or sulfur hexafluoride.

Thresholds

Section 15064.4(b) of the CEQA Guidelines' 2018 amendments for GHG emissions states that a lead agency may take into account the following three considerations in assessing the significance of impacts from GHG emissions.

- **Consideration No. 1**: The extent to which the project may increase or reduce greenhouse gas emissions as compared to the existing environmental setting.
- **Consideration No. 2**: Whether the project emissions exceed a threshold of significance that the lead agency determines applies to the project.
- Consideration No. 3: The extent to which the project complies with regulations or requirements adopted to implement a Statewide, regional, or local plan for the reduction or mitigation of greenhouse gas emissions. Such regulations or requirements must be adopted by the relevant public agency through a public review process and must include specific requirements that reduce or mitigate the project's incremental contribution of greenhouse gas emissions. If there is substantial evidence that the possible effects of a particular project are still cumulatively considerable notwithstanding compliance with the adopted regulations or requirements, an EIR must be prepared for the project. In determining the significance of impacts, the lead agency may consider a project's consistency with the State's long-term climate goals or strategies, provided that substantial evidence supports the agency's analysis of how those goals or strategies address the project's incremental contribution to climate change and its conclusion that the project's incremental contribution is not cumulatively considerable.

The Valley Air District 's Guidance for Valley Land-use Agencies in Addressing GHG Emission Impacts for New Projects under CEQA provides guidance for preparing a BAU analysis. ⁴⁸ Under the Valley Air District guidance, projects meeting one of the following would have a less than significant impact on climate change:

- Exempt from CEQA;
- Complies with an approved GHG emission reduction plan or GHG mitigation program;
- Project achieves 29 percent GHG reductions by using approved Best Performance Standards; and
- Project achieves AB 32 targeted 29 percent GHG reductions compared with "business as usual."

The 29 percent GHG reduction level is based on the target established by ARB's AB 32 Scoping Plan, approved in 2008. The GHG reduction level for the State to reach 1990 emission levels by 2020 was

-

San Joaquin Valley Air Pollution Control District (Valley Air District). 2009. "Final Staff Report, Addressing Greenhouse Gas Emissions Impacts under the California Environmental Quality Act." Website: http://www.valleyair.org/programs/CCAP/11-05-09/1_CCAP_FINAL_CEQA_GHG_Draft_Staff_Report_Nov_05_2009.pdf. December 2009. Accessed February 5, 2020.

reduced to 21.7 percent from BAU in 2020 in the 2014 First Update to the Scoping Plan to account for slower than projected growth after the 2008 recession. ⁴⁹ In addition, the State has reported that the 2016 greenhouse gas inventory was below the 2020 target for the first time. ⁵⁰ Furthermore, the 2017 Scoping Plan stated that California was on track to achieve the 2020 target. ⁵¹ The proposed project is expected to become operational in 2022, which is beyond the AB 32 target year. Until a new threshold or BPS are identified for projects constructed after 2020, significance is based on making continued progress toward the Senate Bill 32 (SB 32) 2030 goal.

A quantitative analysis was prepared for this project to determine the extent to which it may increase or reduce greenhouse gas emissions as compared to the existing environmental setting to fulfill Consideration 1.

Consideration 2 requires the identification of BPS that are determined to meet the 29 percent reduction from BAU. The Valley Air District intended to develop a list of BPS for development projects that were pre-determined to achieve a 29 percent reduction from BAU, but has not completed the list. However, since the Valley Air District guidance was adopted in 2009, regulations on sources of GHG emissions applicable to development projects have been implemented that will achieve in excess of a 29 percent reduction from BAU for most projects. A BAU analysis is provided to demonstrate that the proposed project would exceed the current 21.7 percent reduction and the previous Valley Air District 29 percent reduction threshold.

The analysis also addresses consistency with the SB 32 targets and the 2017 Scoping Plan Update with an assessment of the project's reduction from BAU based on emissions in 2030 compared with the 21.7 percent reduction and with a consistency analysis. This approach provides estimates of project emissions in the new 2030 milestone year with the existing threshold to show the extent of progress achieved with existing regulations and project design features to address Considerations 1 and 2 above.

The ARB adopted the 2017 Scoping Plan Update on December 14, 2017. The plan provides the State's strategy to achieve the SB 32 2030 target of a 40 percent reduction in emissions compared to 1990 levels. The plan includes existing and new measures that when implemented are expected to achieve the SB 32 2030 target. The 2017 Scoping Plan achieves substantial reductions beyond 2020 through continued implementation of existing regulations. Other regulations will be adopted to implement recently enacted legislation including SB 350, which requires an increase in renewable energy from 33 percent to 50 percent and doubling the efficiency of existing buildings by 2030. The Legislature extended the Cap-and-Trade Program through 2030. Cap-and-Trade provides a mechanism to make up shortfalls in other strategies if they occur. ⁵² In addition, the strategy relies on

76

⁴⁹ California Air Resources Board (ARB). 2014. First Update to the Climate Change Scoping Plan. Website: http://www.arb.ca.gov/cc/scopingplan/document/updatedscopingplan2013.htm. Accessed February 5, 2020.

⁵⁰ California Air Resources Board (ARB). 2018. Climate Pollutants Fall Below 1990 Levels for the First Time. Website: https://ww2.arb.ca.gov/news/climate-pollutants-fall-below-1990-levelsfirst-time. Accessed February 5, 2020.

California Air Resources Board (ARB). 2017. The 2017 Climate Change Scoping Plan Update, the Proposed Strategy for Achieving California's 2030 Greenhouse Gas Target. January 20, 2017. Website: https://www.arb.ca.gov/cc/scopingplan/2030sp_pp_final.pdf. Accessed February 5, 2020.

California Air Resources Board (ARB). 2017. The 2017 Climate Change Scoping Plan Update, the Proposed Strategy for Achieving California's 2030 Greenhouse Gas Target. January 20, 2017. Website: https://www.arb.ca.gov/cc/scopingplan/2030sp_pp_final.pdf. Accessed February 5, 2020.

reductions achieved in implementing the ARB Short-Lived Climate Pollutant (SLCP) Reduction Strategy to reduce pollutants not previously controlled for climate change such as black carbon, CH₄, and hydrofluorocarbons.⁵³

Would the project:

a) Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?

Less than significant impact. As described below, potential impacts related to greenhouse gas emissions would be less than significant.

Construction Emissions

Total GHG emissions generated during all phases of construction were combined and are presented in Table 12. The Valley Air District does not recommend assessing the significance of construction-related emissions. However, other jurisdictions, such as the SCAQMD and the SMAQMD, have concluded that construction emissions should be included since they may remain in the atmosphere for years after construction is complete. In order to account for the construction emissions, amortization of the total emissions generated during construction were based on the life of the development (30 years) and added to the operational emissions.

Table 12: Construction Greenhouse Gas Emissions

Activity	Total MT CO₂e per year	
2021 Construction		
Demolition	77	
Site Preparation	52	
Grading	237	
Building Construction	905	
Paving	61	
Off-site Improvements–Site Preparation	0	
Off-site Improvements–Grading	1	
Off-site Improvements–Paving	3	
2022 Construction		
Building Construction	1,341	
Paving	35	
Entire Construction Duration (2021-2022)		
Total	2,713	
Amortized over 30 years	90	

California Air Resources Board (ARB). 2017. Short-Lived Climate Pollutant Reduction Strategy. March. Website: https://www.arb.ca.gov/cc/shortlived/meetings/03142017 /final_slcp_report.pdf. Accessed February 5, 2020.

_

Activity	Total MT CO₂e per year	
Notes:		
MT CO ₂ e = metric tons of carbon dioxide equivalents		
Due to rounding, total MT CO₂e may be marginally different from CalEEMod output.		
Source: Appendix A.		

Operational Emissions

Operational or long-term emissions occur over the life of the project. Sources of emissions may include motor vehicles and trucks, energy usage, water usage, waste generation, and area sources, such as landscaping activities.

Business As Usual Operational Emissions

Operational emissions under the BAU scenario were modeled using CalEEMod Version 2016.3.2. Modeling assumptions for the year 2005 were used to represent 2022 and 2030 BAU conditions (without the benefit of regulations adopted to reduce GHG emissions). The Valley Air District guidance recommends using emissions in 2002–2004 in the baseline scenario to represent conditions—as if regulations had not been adopted -to allow the effect of projected growth on achieving reduction targets to be clearly defined.

2022 and 2030 Operational Emissions

Operational emissions were modeled for the years 2022 and 2030 using CalEEMod. CalEEMod assumes compliance with some, but not all, applicable rules and regulations regarding energy efficiency, vehicle fuel efficiency, renewable energy usage, and other GHG reduction policies, as described in the CalEEMod User's Guide. ⁵⁴ The reductions obtained from each regulation and the source of the reduction amount used in the analysis are described below.

Emissions Accounting for Applicable Regulations

The following regulations are incorporated into the CalEEMod emission factors:

- Pavley I and Pavley II (LEV III) motor vehicle emission standards
- ARB Medium and Heavy-Duty Vehicle Regulation
- 2005, 2008, 2013, and 2016 Title 24 Energy Efficiency Standards

The following regulations have not been incorporated into the CalEEMod emission factors and require alternative methods to account for emission reductions provided by the regulations:

- Renewable Portfolio Standards (RPS)
- Low Carbon Fuel Standard (LCFS)
- 2019 Title 24 Energy Efficiency Standards
- Green Building Code Standards (indoor water use)
- California Model Water Efficient Landscape Ordinance (Outdoor Water)

⁵⁴ South Coast Air Quality Management District (SCAQMD). 2017. User's Guide for CalEEMod Version 2016.3.2. Website: http://www.aqmd.gov/caleemod/user's-guide. Accessed September 24, 2020.

- Pavley II/LEV III standards have been incorporated in the latest version of CalEEMod. The ARB estimates a 3 percent reduction in 2020 and a 19 percent reduction from the vehicle categories subject to the regulation by 2030.^{55,56}
- The ARB GHG Regulation for Medium and Heavy-Duty Engines and Vehicles applies to trucks that will be accessing the project site. The benefits of the regulation were incorporated into CalEEMod Version 2016.3.2. The ARB estimates that this regulation will reduce GHG emissions from the affected vehicles by 7.2 percent.⁵⁷
- The LCFS is estimated to achieve a 10 percent reduction in emissions by 2020 and an 18 percent reduction by 2030 (ARB 2010). CalEEMod does not include credit for the LCFS, so the reduction is calculated off-model based on reductions required by the regulation.
- Title 24 reductions for 2013 and 2016 updates are included in CalEEMod 2016.3.2.
- RPS is not accounted for in CalEEMod 2016.3.2. Reductions from RPS are addressed by revising the electricity emission intensity factor in CalEEMod to account for the utility RPS rate forecast for 2022 and 2030.⁵⁸
- Energy savings from water conservation resulting from the Green Building Code Standards for indoor water use and California Model Water Efficient Landscape Ordinance for outdoor water use are not included in CalEEMod. The Water Conservation Act of 2009 mandates a 20 percent reduction in urban water use that is implemented with these regulations.⁵⁹
- Regulations applicable to project sources and the percent reduction anticipated from each source are shown in Table 13. The percentage reductions are only applied to the specific sources subject to the regulations. For example, the Pavley LEV Standards apply only to light duty cars and trucks.

Table 13: Summary of Appliable Greenhouse Gas Regulations

Regulation	Project Applicability
Pavley Low Emission Vehicle Standards	Light duty cars and trucks accessing the site are subject to the regulation.
Truck and Bus Regulation	Heavy-duty trucks accessing the site for deliveries and services are subject to the regulation.

⁵⁵ California Air Resources Board (ARB). 2010. Pavley 1 + Low Carbon Fuel Standard Postprocessor Version 1.0 User's Guide. Website: https://ww3.arb.ca.gov/cc/sb375/tools/paylevlcfs-userguide.pdf. Accessed February 5, 2020.

⁵⁶ California Air Resources Board (ARB). 2013. Clean Car Standards—Pavley, Assembly Bill 1493. Website: http://www.arb.ca.gov/cc/ccms/ccms.htm. Accessed February 5, 2020.

⁵⁷ California Air Resources Board (ARB). 2013. Initial Statement of Reasons for Proposed Rulemaking, Proposed GHG Regulations for Medium and Heavy-Duty Engines and Vehicles. Website: https://www.arb.ca.gov/regact/2013/hdghg2013/hdghg2013isor.pdf. Accessed February 5, 2020.

⁵⁸ California Public Utilities Commission. (CPUC). 2016. Renewable Portfolio Standard Quarterly Report. Website: https://www.cpuc.ca.gov/uploadedFiles/CPUC_Website/Content/Utilities_and_Industries/Energy/Reports_and_White_Papers/Q4_2016_RPS_Report_to_the_Legislature_FINAL.pdf. Accessed February 5, 2020.

⁵⁹ California Department of Water Resources (CDWR). 2013. California Water Plan Update 2013, Chapter 3 Urban Water Use Efficiency. Website: http://www.water.ca.gov/calendar/materials/vol3_urbanwue_apr_release_16033.pdf. No longer available on the CDWR website.

Regulation	Project Applicability
Low Carbon Fuel Standard (LCFS)	Vehicles accessing the site will use fuel subject to the LCFS.
Title 24 Energy Efficiency Standards	The proposed building will be constructed to meet the latest version of Title 24 (currently 2019). The reduction applies only to energy consumption subject to the regulation.
Green Building Code Standards	The proposed project will include water conservation features required by the standard.
Water Efficient Land Use Ordinance	The proposed project landscaping will comply with the regulation.
Renewable Portfolio Standard (RPS)	Electricity purchased for use at the project site is subject to the 33 percent RPS mandate.

In addition to rules and regulations, the proposed project would incorporate design features and would obtain benefits from its infrastructure. Note that CalEEMod nominally treats these design elements and conditions as "mitigation measures," despite their inclusion in the project description. Therefore, reported operational emissions are considered to represent unmitigated project conditions. Measures that are part of the project design do not require additional CEQA mitigation measures to ensure they are accomplished. Full assumptions and model outputs are provided in Appendix A and results of this analysis for 2022 are presented in Table 14. A second analysis for 2030 is presented in Table 15.

Table 14: Project Operational Greenhouse Gases 2022

	Emissions (MT CO₂e per year)	
Source	Business as Usual	2022 (with Regulation and Design Features)
Area	0.03	0.03
Energy	1,016	369
Mobile–Passenger Vehicles	1,229	825
Mobile–Vans	929	718
Mobile–Trucks	1,713	1,524
Waste	87	87
Water	136	66
Amortized Construction Emissions	90	90
Total	5,201	3,680
Reduction from BAU		1,521
Percent Reduction		29.2%

	Emissions (MT CO₂e per year)	
Source	2022 (with Regulation and Design Business as Usual Features)	
Significance Threshold		29%
Are emissions significant?		No

Notes:

MT CO_2e = metric tons of carbon dioxide equivalents

BAU = Business as Usual

The project achieves the Valley Air District 29 percent reduction from BAU threshold, and the 21.7 percent required to show consistency with AB 32 targets.

Source of emissions: Appendix A.

As shown in Table 15, the proposed project would achieve a reduction of 29.2 percent from BAU by the year 2022 with regulations and design features incorporated. This is above the 29 percent reduction required by the Valley Air District threshold and the 21.7 percent average reduction from all sources of GHG emissions now required to achieve AB 32 targets. The ARB originally identified a reduction of 29 percent from BAU as needed to achieve AB 32 targets. The 2008 recession and slower growth in the years since 2008 have reduced the growth forecasted for 2020, and the amount needed to be reduced to achieve 1990 levels as required by AB 32. The DOF population forecast for 2020 to 2030 predicts growth in the State of 8.1 percent by the 2030 target year or 0.8 percent per year. ⁶⁰

The 29.9 percent reduction from BAU is 7.5 percent beyond the average reduction required by the State from all sources to achieve the AB 32 2020 target and therefore addresses the concern expressed in Newhall Ranch that projects should likely do more than the average to ensure they are providing a fair share of emission reductions.

Since the project buildout would occur after 2020, additional analysis was conducted to demonstrate consistency with the SB 32 2030 target, as summarized in Table 15.

Table 15: Project Operational Greenhouse Gases 2030

	Emissions (MT CO₂e per year)	
Source	Business as Usual	2030 (with Regulation and Design Features)
Area	0.03	0.03
Energy	1,016	345
Mobile–Passenger Vehicles	1,229	558
Mobile–Vans	929	503
Mobile–Trucks	1,713	1,426

State of California, Department of Finance. 2017. E-5 Population and Housing Estimates for Cities, Counties, and the State, 2011-2020 with 2010 Census Benchmark. May. Website: http://dof.ca.gov/Forecasting/Demographics/Estimates/E-5/. Accessed September 25, 2020.

	Emissions (I	MT CO₂e per year)
Source	Business as Usual	2030 (with Regulation and Design Features)
Waste	87	87
Water	136	63
Amortized Construction Emissions	90	90
Total	5,201	3,072
Reduction from BAU		2,129
Percent Reduction		40.9%
Significance Threshold		29%
Are emissions significant?		No

Notes:

MT CO_2e = metric tons of carbon dioxide equivalents

BAU = Business as Usual

The project achieves the Valley Air District 29 percent reduction from BAU threshold, and the 21.7 percent required to show consistency with AB 32 targets.

Source of emissions: Appendix A.

As shown in Table 15, the proposed project would achieve a reduction of 40.9 percent from BAU by the year 2030 with regulations and design features incorporated. No new threshold has been adopted by the City of Fresno for the 2030 target, so in the interim the project must make continued progress toward the 2030 goal.

In conclusion, the proposed project, with implementation of adopted regulations and on-site design features in the 2022 operational year would achieve reductions that would be 7.5 percent beyond the ARB 2020 reduction target of 21.7 percent, and 0.2 percent beyond the Valley Air District target of 29 percent reduction from BAU requirements. No new threshold has been adopted by the City for the SB 32 2030 target. Based on this progress and the 2017 Scoping Plan Update, it is reasonable to conclude that the proposed project would be consistent with the 2017 Scoping Plan and would contribute a reasonable fair-share contribution to achieving the 2030 target. The fair share may very well be achieved through compliance with increasingly stringent State regulations that apply to new development, such as Title 24 and CALGreen; regulations on energy production, fuels, and motor vehicles that apply to both new and existing development; and voluntary actions to improve energy efficiency in existing development. In addition, compliance with the VMT targets adopted to comply with SB 375 and implemented through the Regional Transportation Plan/Sustainable Communities Strategy (RTP/SCS) may be considered to adequately address GHG emissions from passenger cars and light-duty trucks. Furthermore, the State strategy relies on the Cap-and-Trade Program to make up any shortfalls that may occur from the other regulatory strategies. The costs of Cap-and-Trade emission reductions will ultimately be passed on to the consumers of fuels, electricity and products produced by regulated industries which include future residents of development projects and other purchasers of products and services. Therefore, the impact in terms of Considerations No. 1 and No. 2 would be less than significant.

b) Conflict with any applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?

Less than significant impact. The following analysis assesses the proposed project's compliance with Consideration No. 3 regarding consistency with adopted plans to reduce GHG emissions. The City of Fresno adopted its GHG Reduction Plan as part of the General Plan Update in 2014. The proposed project's consistency with applicable GHG policies from the GHG Reduction Plan policies is assessed below. The proposed project is also assessed for its consistency with ARB's adopted Scoping Plans. This would be achieved with an assessment of the proposed project's compliance with Scoping Plan measures contained in the 2017 Scoping Plan Update.

Consistency with City of Fresno Greenhouse Gas Plan

The Fresno General Plan includes a GHG Plan that provides the City's primary strategy for reducing GHG emissions. ⁶¹ The intent of the GHG Plan is to achieve compliance with state GHG reduction mandates by focusing on feasible actions the City can take to minimize the adverse impacts of growth and development on climate change. The GHG Plan does not reinvent the wheel; rather, it builds on the General Plan policies and implementation measures. Where needed, the GHG Plan provides more details to clarify and focus action and to ensure implementation.

The City of Fresno General Plan contains the following policies related to GHG emissions reduction that are applicable to the proposed project.⁶²

Objective

RC-5

In cooperation with other jurisdictions and agencies in the San Joaquin Valley Air Basin, take timely, necessary, and the most cost-effective actions to achieve and maintain reductions in greenhouse gas emissions and all strategies that reduce the causes of climate change in order to limit and prevent the related potential detrimental effects upon public health and welfare of present and future residents of the Fresno community.

Implementing Policies

RC-5-a Sur

Support State Goal to Reduce Statewide GHG Emissions. As is consistent with State law, strive to meet AB 32 goal to reduce greenhouse gas emissions to 1990 levels by 2020 and strive to meet a reduction of 80 percent below 1990 levels by 2050 as stated in Executive Order S-03-05. As new statewide GHG reduction targets and dates are set by the State update the City's Greenhouse Gas Reduction Plan to include a comprehensive strategy to achieve consistency with those targets by the dates established.

RC-5-b Greenhouse Gas Reduction Plan. As is consistent with State law, prepare and adopt a Greenhouse Gas Reduction Plan as part of the Master Environmental Impact

⁶¹ City of Fresno. 2014. City of Fresno General Plan. December. Website: https://www.fresno.gov/darm/general-plan-development-code/. Accessed November 23, 2020.

⁶² City of Fresno. 2014. City of Fresno General Plan. December. Website: https://www.fresno.gov/darm/general-plan-development-code/. Accessed November 23, 2020.

Report to be concurrently approved with the Fresno General Plan in order to achieve compliance with State mandates, assist development by streamlining the approval process, and focus on feasible actions the City can take to minimize the adverse impacts of growth and development on global climate change. The Greenhouse Gas Reduction Plan shall include, but not be limited to:

- A baseline inventory of all known or reasonably discoverable sources of GHGs that currently exist in the city and sources that existed in 1990.
- A projected inventory of the GHGs that can reasonably be expected to be emitted from those sources in the year 2035 with implementation of this General Plan and foreseeable communitywide and municipal operations.
- A target for the reduction of emissions from those identified sources.
- A list of feasible GHG reduction measures to meet the reduction target, including energy conservation and "green building" requirements in municipal buildings and private development.
- Periodically update municipal and community-wide GHG emissions inventories to determine the efficacy of adopted measures and to guide future policy formulation needed to achieve and maintain GHG emissions reduction targets.
- RC-5-c GHG Reduction through Design and Operations. Increase efforts to incorporate requirements for GHG emission reductions in land use entitlement decisions, facility design, and operational measures subject to City regulation through the following measures and strategies:
 - Promote the expansion of incentive-based programs that involve certification of projects for energy and water efficiency and resiliency. These certification programs and scoring systems may include public agency "Green" and conservation criteria, Energy Star™ certification, CALGreen Tier 1 or Tier 2, Leadership in Energy Efficient Design (LEED™) certification, etc.
 - Promote appropriate energy and water conservation standards and facilitate mixed-use projects, new incentives for infill development, and the incorporation of mass transit, bicycle and pedestrian amenities into public and private projects.
 - Require energy and water audits and upgrades for water conservation, energy
 efficiency, and mass transit, pedestrian, and bicycle amenities at the time of
 renovation, change in use, change in occupancy, and change in ownership for
 major projects meeting review thresholds specified in an implementing
 ordinance.
 - Incorporate the City's "Guidelines for Ponding Basin/Pond Construction and Management to Control Mosquito Breeding" as conditions of approval for any project using an on-site stormwater basin to prevent possible increases in vectorborne illnesses associated with global climate change.

- Periodically evaluate the City's facility maintenance practices to determine
 whether there are additional opportunities to reduce GHGs through facility
 cleaning and painting, parks maintenance, road maintenance, and utility system
 maintenance.
- Periodically evaluate standards and mitigation strategies for highly vehicledependent land uses and facilities, such as drive-through facilities and autooriented development.
- RC-5-d SCS and CAP Conformity Analysis. Ensure that the City includes analysis of a project's conformity to an adopted regional Sustainable Community Strategy or Alternative Planning Strategy (APS), an adopted Climate Action Plan (CAP), and any other applicable City and regional greenhouse gas reduction strategies in effect at the time of project review.
- **RC-5-e Ensure Compliance.** Ensure ongoing compliance with GHG emissions reduction plans and programs by requiring that air quality measures are incorporated into projects' design, conditions of approval, and mitigation measures.
- **RC-5-f Toolkit.** Provide residents and project applicants with a "toolkit" of generally feasible measures that can be used to reduce GHG emissions, including educational materials on energy-efficient and "climate-friendly" products.
- RC-5-g Evaluate Impacts with Models. Continue to use computer models such as those used by SJVAPCD [Valley Air District] to evaluate greenhouse gas impacts of plans and projects that require such review.

While several of these policies are voluntary or are cannot be implemented by an individual development project, compliance with Title 24 standards would ensure that the proposed project would not conflict with any of the General Plan energy conservation policies related to the proposed project's building envelope, mechanical systems, and indoor and outdoor lighting.

Consistency with California's Post-2020 Targets

The State's executive branch adopted several Executive Orders related to GHG emissions. Executive Orders S-3-05 and B-30-15 are two examples. Executive Order S-3-05 sets goals to reduce emissions to 1990 levels by 2020 and 80 percent below 1990 levels by 2050. The goal of Executive Order S-3-05 to reduce GHG emissions to 1990 levels by 2020 was codified by AB 32. The proposed project, as analyzed above, is consistent with AB 32. Therefore, the proposed project does not conflict with this component of Executive Order S-3-05. Executive Order B-30-15 establishes an interim goal to reduce GHG emissions to 40 percent below 1990 levels by 2030.

The 2030 goal was codified under SB 32 and is now addressed by the 2017 Scoping Plan Update. The new plan provides a strategy that is capable of reaching the SB 32 target if the measures included in the plan are implemented and achieve reductions within the ranges expected. Under the Scoping Plan Update, local government plays a supporting role through its land use authority and control over local transportation infrastructure. The Plan Update includes reductions from implementation

of SB 375 that applies to VMT from passenger vehicles. Fresno County targets for SB 375 are a 5 percent reduction by 2020 and a 10 percent reduction by 2035. SB 375 is implemented with the Fresno Council of Governments (COG) RTP/SCS. The RTP/SCS envisions an increase in development density that would encourage fewer and shorter trips and more trips by transit, walking, and bicycling in amounts sufficient to achieve the SB 375 targets.

Now that the 2017 Scoping Plan has been adopted, new methodologies and threshold approaches are required to determine the fair-share contributions City development projects would need to make to achieve the 2030 target. In the meantime, however, the discussion under "Consistency with SB 32" below addresses the consistency of the proposed project with SB 32, which provides the statutory underpinning of the 2017 Scoping Plan. The SB 32 target requires GHG emissions to be reduced from 1990 levels. No consensus has been reached around the State on a new quantitative target for new development based on consistency with the SB 32 targets.

The Executive Order S-3-05 2050 target has not been codified by legislation. Studies have shown that, in order to meet the 2050 target, aggressive pursuit of technologies in the transportation and energy sectors, including electrification and the decarbonization of fuel, will be required. Because of the technological shifts required and the unknown parameters of the regulatory framework in 2050, quantitatively analyzing the project's impacts further relative to the 2050 goal is speculative for purposes of CEQA. ⁶³

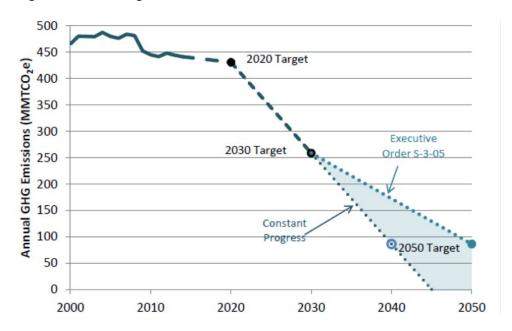
The ARB recognizes that AB 32 establishes an emissions reduction trajectory that will allow California to achieve the more stringent 2050 target: "These [GHG emission reduction] measures also put the State on a path to meet the long-term 2050 goal of reducing California's GHG emissions to 80 percent below 1990 levels. This trajectory is consistent with the reductions that are needed globally to stabilize the climate." In addition, ARB's First Update "lays the foundation for establishing a broad framework for continued emission reductions beyond 2020, on the path to 80 percent below 1990 levels by 2050," and many of the emission reduction strategies recommended by ARB would serve to reduce the proposed project's post-2020 emissions level to the extent applicable by law:

- Energy Sector: Continued improvements in California's appliance and building energy efficiency programs and initiatives, such as the State's zero net energy building goals, would serve to reduce the proposed project's emissions level. Additionally, further additions to California's renewable resource portfolio would favorably influence the project's emissions level.
- **Transportation Sector:** Anticipated deployment of improved vehicle efficiency, zero emission technologies, lower carbon fuels, and improvement of existing transportation systems all will serve to reduce the project's emissions level.
- Water Sector: The project's emissions level will be reduced as a result of further desired enhancements to water conservation technologies.

⁶³ California Air Resources Board (ARB). 2014. First Update to the Climate Change Scoping Plan. Website: http://www.arb.ca.gov/cc/scopingplan/document/updatedscopingplan2013.htm. Accessed February 5, 2020.

• Waste Management Sector: Plans to further improve recycling, reuse and reduction of solid waste will beneficially reduce the project's emissions level.

For the reasons described above the project's post-2020 emissions trajectory is expected to follow a declining trend, consistent with the 2030 and 2050 targets. The trajectory required to achieve the post-2020 targets is shown in Figure 1.



Source: California Air Resources Board (ARB). 2017. The 2017 Climate Change Scoping Plan Update. January 20. Website: https://www.arb.ca.gov/cc/scopingplan/2030sp pp final.pdf. Accessed February 5, 2020.

Figure 1: California's Path to Achieving the 2050 Target

In his January 2015 inaugural address, Governor Brown expressed a commitment to achieve "three ambitious goals" that he would like to see accomplished by 2030 to reduce the State's GHG emissions:

- Increasing the State's Renewable Portfolio Standard from 33 percent in 2020 to 50 percent in 2030;
- Cutting the petroleum use in cars and trucks in half; and
- Doubling the efficiency of existing buildings and making heating fuels cleaner.

These expressions of executive branch policy may be manifested in adopted legislative or regulatory action through the State agencies and departments responsible for achieving the State's environmental policy objectives, particularly those relating to global climate change.⁶⁴

⁶⁴ Brown, Edmund G. Jr. 2015. Press Release: California Establishes Most Ambitious Greenhouse Gas Goal in North America. April 29. Website: https://www.gov.ca.gov/news.php?id=18938. Accessed January 6, 2018.

Further, recent studies show that the State's existing and proposed regulatory framework will allow the State to reduce its GHG emissions level to 40 percent below 1990 levels by 2030, and to 80 percent below 1990 levels by 2050. Even though these studies did not provide an exact regulatory and technological roadmap to achieve the 2030 and 2050 goals, they demonstrated that various combinations of policies could allow the Statewide emissions level to remain very low through 2050, suggesting that the combination of new technologies and other regulations not analyzed in the studies could allow the State to meet the 2050 target.⁶⁵

Given the proportional contribution of mobile source-related GHG emissions to the State's inventory, recent studies also show that relatively new trends—such as the increasing importance of webbased shopping, the emergence of different driving patterns, and the increasing effect of web-based applications on transportation choices—are beginning to substantially influence transportation choices and the energy used by transportation modes. These factors have changed the direction of transportation trends in recent years and will require the creation of new models to effectively analyze future transportation patterns and the corresponding effect on GHG emissions. For the reasons described above the proposed project's post-2020 emissions trajectory is expected to follow a declining trend, consistent with the 2030 and 2050 targets.

Consistency with SB 32

The 2017 Climate Change Scoping Plan Update (2017 Scoping Plan) includes the strategy that the State intends to pursue to achieve the 2030 targets of Executive Order S-3-05 and SB 32. The 2017 Scoping Plan includes the following summary of its overall strategy for reaching the 2030 target:

- SB 350
 - Achieve 50 percent Renewables Portfolio Standard (RPS) by 2030.
 - Doubling of energy efficiency savings by 2030.
- Low Carbon Fuel Standard (LCFS)
 - Increased stringency (reducing carbon intensity 18 percent by 2030, up from 10 percent in 2020).
- Mobile Source Strategy (Cleaner Technology and Fuels Scenario)
 - Maintaining existing GHG standards for light- and heavy-duty vehicles.
 - Put 4.2 million zero-emission vehicles (ZEVs) on the roads.
 - Increase ZEV buses, delivery and other trucks.
- Sustainable Freight Action Plan
 - Improve freight system efficiency.
 - Maximize use of near-zero emission vehicles and equipment powered by renewable energy.
 - Deploy over 100,000 zero-emission trucks and equipment by 2030.
- Short-Lived Climate Pollutant Reduction Strategy
 - Reduce emissions of methane and hydrofluorocarbons 40 percent below 2013 levels by 2030.
 - Reduce emissions of black carbon 50 percent below 2013 levels by 2030.

Energy and Environmental Economics. 2015. Pathways to Deep Decarbonization in the United States. Website: http://deepdecarbonization.org/wp-content/uploads/2015/11/US_Deep_Decarbonization_Technical_Report_Exec_Summary.pdf. Accessed February 5, 2020.

- SB 375 Sustainable Communities Strategies
 - Increased stringency of 2035 targets.
- Post-2020 Cap-and-Trade Program
 - Declining caps, continued linkage with Québec, and linkage to Ontario, Canada.
 - ARB will look for opportunities to strengthen the program to support more air quality cobenefits, including specific program design elements. In Fall 2016, ARB staff described potential future amendments including reducing the offset usage limit, redesigning the allocation strategy to reduce free allocation to support increased technology and energy investment at covered entities and reducing allocation if the covered entity increases criteria or toxics emissions over some baseline.
- By 2018, develop Integrated Natural and Working Lands Action Plan to secure California's land base as a net carbon sink.

Table 16 provides an analysis of the project's consistency with the 2017 Scoping Plan Update measures.

Table 16: Consistency with SB 32 2017 Scoping Plan Update

Scoping Plan Measure	Project Consistency
SB 350: 50 percent Renewable Mandate. Utilities subject to the legislation will be required to increase their renewable energy mix from 33 percent in 2020 to 50 percent in 2030.	Not applicable. This measure would apply to utilities and not to individual development projects. The proposed project would purchase electricity from a utility subject to the SB 350 Renewable Mandate and the RPS requirements. SB 100 has increased the 2030 RPS standards to 60 percent by 2030, superseding the increase required by SB 350.
SB 350: Double Building Energy Efficiency by 2030. This is equivalent to a 20 percent reduction from 2014 building energy usage compared to current projected 2030 levels.	Not applicable. This measure applies to existing buildings. The proposed project does not include the use of existing buildings. New structures are required to comply with Title 24 Energy Efficiency Standards that are expected to increase in stringency over time. The proposed project would comply with the applicable Title 24 Energy Efficiency Standards in effect at the time building permits are received.
Low Carbon Fuel Standard. This measure requires fuel providers to meet an 18 percent reduction in carbon content by 2030.	Not applicable. This is a Statewide measure that cannot be implemented by a project applicant or lead agency. However, vehicles accessing the project site would benefit from the standards.
Mobile Source Strategy (Cleaner Technology and Fuels Scenario). Vehicle manufacturers will be required to meet existing regulations mandated by the LEV III and Heavy-Duty Vehicle programs. The strategy includes a goal of having 4.2 million ZEVs on the road by 2030 and increasing numbers of ZEV trucks and buses.	Consistent. The proposed project is industrial in nature and would support truck and freight operations. It is expected that deliveries throughout the State would be made with an increasing number of ZEV delivery trucks, including trips that would be coming to and from the project site. PDF GHG-1 would require the construction of the building to facilitate sufficient electric charging for trucks to plug in, in anticipation of future technology that

Project Consistency
allows trucks to operate partially on electricity. Additionally, with incorporation of PDF GHG-2, all buildings would provide electric infrastructure to support use of exterior yard trucks and on-site vehicles.
Consistent. This measure applies to owners and operators of trucks and freight operations. The proposed project is industrial in nature and would support truck and freight operations. Additionally, PDF GHG-1 would require the construction of the building to facilitate sufficient electric charging for trucks to plug in, in anticipation of future technology that allows trucks to operate partially on electricity.
Consistent. The proposed project would not include major sources of black carbon. This measure revolves around ARB's SLCP Reduction Strategy that was released in April 2016 as a result of SB 650. SB 650 required the State to develop a strategy to reduce emissions of SLCPs. DPM reductions have come from strong efforts to reduce on-road vehicle emissions. Car and truck engines used to be the largest sources of anthropogenic black carbon emissions in California, but the State's existing air quality policies will virtually eliminate black carbon emissions from on-road diesel engines within 10 years. These policies are based on existing technologies.
Not applicable. The proposed project does not include the development of a Regional Transportation Plan.
Not applicable. The proposed project is not one targeted by the cap-and-trade system regulations, and, therefore, this measure does not apply to the project. However, the post-2020 Cap-and-Trade Program indirectly affects people and entities who use the products and services produced by the regulated industrial sources when increased cost of products or services (such as electricity and fuel) are transferred to the consumers.
Not Applicable. The project site is in a built-up urban area and would not be considered natural or working lands.

https://ww3.arb.ca.gov/cc/scopingplan/scoping_plan_2017.pdf. Accessed January 13, 2020.

Regarding goals for 2050 under Executive Order S-3-05, at this time it is not possible to quantify the emissions savings from future regulatory measures, as they have not yet been developed; nevertheless, it can be anticipated that operation of the proposed project would comply with whatever measures are enacted that State lawmakers decide would lead to an 80 percent reduction below 1990 levels by 2050. In its 2008 Scoping Plan, ARB acknowledged that the "measures needed to meet the 2050 are too far in the future to define in detail." In the First Scoping Plan Update; however, ARB generally described the type of activities required to achieve the 2050 target: "energy demand reduction through efficiency and activity changes; large scale electrification of on-road vehicles, buildings, and industrial machinery; decarbonizing electricity and fuel supplies; and rapid market penetration of efficiency and clean energy technologies that requires significant efforts to deploy and scale markets for the cleanest technologies immediately." The 2017 Scoping Plan provides an intermediate target that is intended to achieve reasonable progress toward the 2050 target.

Accordingly, taking into account the proposed project's design features and the progress being made by the State towards reducing emissions in key sectors such as transportation, industry, and electricity, the proposed project would be consistent with State GHG Plans and would further the State's goals of reducing GHG emissions 40 percent below 1990 levels by 2030, and 80 percent below 1990 levels by 2050, and does not obstruct their attainment.

Project Design Features

PDF GHG-1

The project shall incorporate infrastructure for electric vehicle charging stations into a minimum of 8 percent of all vehicle parking spaces (including parking for trucks), consistent with the applicable California Green Building Standards Code Tier 1 Nonresidential Mandatory Measure (Section A5.106.5.3). Electric vehicle charging spaces must provide electrical vehicle charging infrastructure to support future installation of electric vehicle supply equipment and shall meet the design space requirements of California Green Building Standards Code Section 5.106.5.3.2.

PDF GHG-2

The project building shall be designed to provide infrastructure to support the use of electric-powered equipment, exterior yard trucks, and/or other on-site vehicles. The project building shall also be constructed with the appropriate infrastructure (e.g., electrical conduits) to facilitate sufficient electric charging for trucks to plug in, in anticipation of future technology that allows trucks to operate partially on electricity.

Mitigation Measures

None required.

2.9	Environmental Issues Hazards and Hazardous Materials Would the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a)	Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?				
b)	Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?				
c)	Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?				
d)	Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?				
e)	For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?				
f)	Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?				
g)	Expose people or structures, either directly or indirectly to a significant risk of loss, injury or death involving wildland fires?				

Environmental Evaluation

Setting

Hazardous materials, as defined by the California Code of Regulations, are substances with certain physical properties that could pose a substantial present or future hazard to human health or the environment when improperly handled, disposed, or otherwise managed. Hazardous materials are grouped into the following four categories, based on their properties:

- Toxic—causes human health effects
- Ignitable—has the ability to burn

- Corrosive—causes severe burns or damage to materials
- Reactive—causes explosions or generates toxic gases

A hazardous waste is any hazardous material that is discarded, abandoned, or slated to be recycled. The criteria that define a material as hazardous also define a waste as hazardous. If improperly handled, hazardous materials and hazardous waste can result in public health hazards if released into the soil or groundwater or through airborne releases in vapors, fumes, or dust. Soil and groundwater having concentrations of hazardous constituents higher than specific regulatory levels must be handled and disposed of as hazardous waste when excavated or pumped from an aquifer. California Code of Regulations, Title 22, Sections 66261.20–24 contains technical descriptions of toxic characteristics that could cause soil or groundwater to be classified as hazardous waste.

This section is based on the Phase I Environmental Site Assessment (Phase I ESA) prepared by Geosntec Consultants (Geosntec) on November 30, 2020. The complete Phase I ESA is provided in Appendix E.

Phase I ESA

On November 30, 2020, Geosyntec prepared a Phase I ESA to identify recognized Environmental Conditions (RECs) at the site. The Phase I ESA identified the following:

Historical Recognized Envrionmental Conditions (HRECs)

Site and Site Vicinity Groundwater Impacts: numerous Leaking Underground Storage Tank
 (LUST) cases have been reported in the immediate vicinity and hydraulically upgraded from
 the site, including one which resulted in groundwater impacts beneath the site from an offsite source. This case was closed and granted no further action, which resulted in groundwater
 impacts beneath the site, and other nearby LUST cases based on the findings of investigations
 and respective corrective action.

De minimis Conditions

• Historical Agricultural Land Use: historical site documents and aerial photographs indicate that the majority of the site was used for agricultural purposes (orchards and row crops) from at least 1923 through the early 1980s. In addition, former structures associated with agricultural operations were indicated to have historically burned down. Hazardous materials commonly associated with burnt structures may be present at the burned structure location. Based on the time frame of agricultural activiities, it is possible that pesticides or herbicides were used on-site; however, no evidence odf pesticide/herbicide usage was found as part of the Phase I ESA. Therefore, this finding is not a REC, and considered to be a *de minimis* condition

As stated in the Phase I ESA, data gaps as defined by ASTM exist for the site. However, none are considered to be significant with respect to the identification of additional RECs for the site.

Asbestos and Lead-Based Paint Survey Report

On December 2, 2020, Entech Environmental Group, LLC (Entech) prepared an Asbestos and Lead-Based Paint Survey Report to determine and report any hazardous materials such as asbestos containing materials (ACM) or lead-based paint (LBP) that may be impacted during demolition of the existing single-family residence within the project site located at 5406 East Olive Avenue. The residence was originally constructed approximately in the early 1970s.

The ACM survey was performed in accordance with the listed criteria in California Occupational Safety and Health Administration (Cal/OSHA) Standard 8 California Code of Regulations 1529, OSHA Standard 29 Code of Federal Regulations 1926.1101, and EPA Standard 40 Code of Federal Regulations Part 61.145 (a), including the analysis of bulk samples via polarized light microscopy methodology. Additionally, the LBP survey was performed to assess for painted surfaces that may require removal prior to or specific work practices during construction activities. Provided a written report detailing the Survey information including description of the samples and sample locations, analytical results in tabular form, quantity and condition of surfaces identified and interpretation of results.

The results of the Asbestos and Lead-Based Paint Survey Report can be found in Appendix E and summarized in Table 17. Entech conducted a walk-through of the property November 24, 2020. Thirty-three samples were collected for the asbestos survey, and 13 lead chip samples were collected to identify lead concentrations. There were no ACM identified in detectable concentrations within the property. However, the table below includes the estimated quantities from results of the lead survey.

Table 17: Asbestos-containing Material Survey Results

Location	Bulk Sample Number	Material	Estimated Quantity ²				
Exterior Fascia	L1	White Paint on Wood	250 square feet				
Exterior Doors/Frame	rame L3 Cream Paint on Wood		100 square feet				
Bathrooms	L5	Pink Ceramic Tiles	300 square feet				
Kitchen	L9	Dark Gray Countertop Ceramic Tiles	150 square feet				
Notes: Material quantity estimates are subject to a 15% +/- variance.							

Entech determined that based on the resurvey results and interpretation of the laboratory data, all suspect building materials sampled/analyzed during this investigation did not contain lead in detectable concentrations to be considered lead-based paint.

Worker Protection and Waste Definitions for Asbestos

Construction materials containing asbestos greater than 1 percent are defined as an ACM and are regulated under both federal and state regulations. Construction materials containing asbestos greater than 0.1 percent are defined as an asbestos-containing construction material (ACCM) and are regulated by the State of California. Cal/OSHA regulates the removal of both ACM and ACCM.

Please refer to Title 8, Section 1529-Asbestos for the regulatory requirements associated with working with both ACM and ACCM. Additionally, refer to Section 1529(r)-Report of Use and Asbestos-related Work.

Registration for the registration requirement of contractors involved in asbestos-related work involving over 100 square feet of ACCM/ACM. In instances where a material contains asbestos in concentrations below the ACCM regulatory threshold, the employer is required to comply with Cal/OSHA 5194-Hazard Communication in addition to pertinent sections of Section 1529-Asbestos.

In California, ACMs that are friable or will become friable during abatement are classified as a California-Hazardous Waste, and require special handling, packaging and disposal.

Worker Protection and Waste Definitions of Lead (in paint and construction materials)

Other Regulatory Definitions of lead-containing materials are detailed in California Code of Regulations Titles 8 and 22 and Code of Federal Regulations Title 40. Cal/OSHA Section 1532.1-Lead regulates the removal of materials with detectable levels of lead. Please refer to Section 1532.1-Lead for the regulatory requirements associated with working with lead-containing materials.

It is important to understand that Cal/OSHA does not give a regulatory definition of a "lead containing material." Cal/OSHA and Federal OSHA are concerned with "an employee occupationally exposed to lead." This is understood to mean material disturbed during construction work containing lead in any amount (i.e., lead-containing paint and lead-based paint) is covered under the lead in construction standard. Additionally, Federal OSHA has determined that the uses of X-Ray Fluorescence (XRF) data and/or bulk sampling data (e.g., paint chips) are not acceptable for predicting employee exposures to lead. This fact means that contractors cannot use XRF data, paint chip data or bulk sample data as a surrogate for employee exposures during construction work (or the bidding process) as defined in Title 8 California Code of Regulations, Section 1532.1(a). Two OSHA interpretation letters below should be reviewed, which state that the burden of proof is on the employer regarding employee exposures to lead in construction work and not the reliance on XRF data, bulk sampling data, or paint chip sampling data. ^{66,67}

Would the project:

a) Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?

Less than significant impact. Project construction would involve the minor routine transport and handling or minimal quantities of hazardous substance such as diesel fuels, lubricants, solvents, asphalt, pesticides, and fertilizers. Handling and transportation of these materials could result in the exposure of workers or residents to hazardous materials. Project operation may include the storage

⁶⁶ United States Department of Labor. Occupational Safety and Health Administration (OSHA). 2000 (Revised 2005). Standard Interpretations. Use of X-Ray Fluorescence is not Acceptable to Determine Employee Lead Exposure. Website: https://www.osha.gov/laws-regs/standardinterpretations/2000-05-08. Accessed June 4, 2021.

⁶⁷ United States Department of Labor. Occupational Safety and Health Administration (OSHA). 1999. (Revised 2008). Using X-Ray Fluorescence for Analysis of Lead in Paint and Applicability of Other Agencies Lead Levels. Website: https://www.osha.gov/laws-regs/standardinterpretations/1999-03-01-0. Accessed June 4, 2021.

of some hazardous materials in the form of typical household cleaning products. However, the proposed project would not create a significant hazard to the public or the environment, because project construction and operations would comply with applicable federal, State, and local laws pertaining to the safe handling and transport of hazardous materials. Therefore, impacts would be less than significant.

b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?

Less than significant impact with mitigation incorporated. As described in Impact 9(a), the proposed project would involve the minor use of hazardous materials typically required during construction, such as diesel fuel and other motor lubricants. Contractors would comply with applicable federal, State, and local laws pertaining to the safe handling and transport of hazardous materials, which would minimize potential spill occurrences. Spills that may occur during construction activities would likely be minimal and potential adverse effects would be localized. Plans and specifications typically require contractors to clean up immediately any spills of hazardous materials.

As mentioned above, an Asbestos and Lead-Based Paint Survey Report was prepared for the project It was determined that ACM and LBP were not identified in detectable levels within the single-family residence located at the northwestern portion of the property. The proposed project would be required to comply with all applicable provisions of local, EPA, OSHA, and Cal/OSHA, regulations during removal, demolition, or repair activities that may disturb the asbestos containing materials. Furthermore, implementation of MM HAZ-1 and MM HAZ-2 would be required to reduce the potential for exposure to such materials during demolition and construction activities. Implementation of these measures would ensure that hazardous materials associated with the single-family residence are handled properly, tested, and removed in accordance with necessary regulatory standards. As such, impacts related to the release of hazardous materials into the environment would be less than significant with mitigation incorporated.

c) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?

Less than significant impact. The nearest school to the project site is Fresno Adventist Academy, located approximately 0.10 mile northwest of the site. The project consists of the construction of a delivery station building, used to house consumer products for an online retailer. Due to the nature of the project, it is not likely that hazardous or acutely hazardous materials, substances, or waste would be emitted from the project. Therefore, the proposed project would not emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within 0.25 mile of an existing or proposed school. Impacts would be less than significant.

d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?

Less than significant impact. The Phase I ESA prepared for the project conducted a review of regulatory agency records and reviewed local, State, and federal regulatory agency lists, including the State Water Board GeoTracker and California Department of Toxic Substances Control (DTSC) Envirostor websites, to determine the presence of hazardous materials sites on-site. The Phase I ESA determined the project site is not listed on a hazardous materials site compiled pursuant to Government Code Section 65962.5. As such, impacts would be less than significant.

e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?

No Impact. A significant impact would occur if the proposed project would expose people residing or working in the project area to excessive noise levels for a project located in the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within 2 miles of a public airport or public use airport.

The project site is not located within the vicinity of a private airstrip. The nearest public airport to the project site is the Fresno Yosemite International Airport, located approximately 0.7 mile north of the project site. According to the airport's noise exposure map, ⁶⁸ the project site is located outside of the 65 A-weighted decibel (dBA) Community Noise Equivalent Level (CNEL) airport noise contours. While aircraft noise is occasionally audible on the project site from aircraft flyovers, aircraft noise associated with nearby airport activity would not expose people residing or working near the project site to excessive noise levels. Furthermore, the proposed project is not located within any of the Safety Zones Fresno Yosemite International Airport. ⁶⁹ Therefore, implementation of the proposed project would not result in a safety hazard or excessive noise for persons residing or working in the project area, and no impact would occur.

f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?

Less than significant impact. The project consists of the construction of a delivery station building within two parcels in a developed area of the City of Fresno. While the City of Fresno does not have an adopted Emergency Operations Plan (EOP), the Fresno County Board of Supervisors adopted a Multi-Jurisdictional Local Hazard Mitigation Plan (MHMP) for the County on December 1, 2009, which includes a City of Fresno annex. The plan lists information relevant to Fresno related to housing, health, infrastructure, housing, government, environment, and land use. ⁷⁰ The MHMP meets the requirements of the Disaster Mitigation Act of 2000, which establishes a national hazard

⁶⁸ Fresno County, 2018. Fresno County Airport Land Use Compatibility Plan, Exhibit 2c, December.

⁶⁹ Fresno Council of Governments. 2018. Fresno County Airport Land Use Compatibility Plan (ALUCP). Appendix D: Fresno Yosemite International Airport. Exhibit D1, Yosemite Intl. Airport Influence Area and Safety Zones. Accessed June 7, 2021.

⁷⁰ City of Fresno. 2014. Fresno General Plan. Noise and Safety. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2019/07/Consolidated-GP-7-2019.pdf. Accessed October 19, 2020.

mitigation program to reduce the loss of life and property, economic disruption, human suffering, and disaster assistance costs resulting from natural disasters. The proposed project would adhere to all local regulations related to safety, emergency response, and emergency evacuation, and would ensure adequate access to and from the site in the event of an emergency. As such, impacts related to interference with an emergency response plan or emergency evacuation plan would be less than significant.

g) Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?

Less than significant impact. According to the CAL FIRE Resource Assessment Program Fire Hazard Severity Zone (FHSZ) Viewer, the City of Fresno is not located within a fire hazard severity zone. ⁷¹ Furthermore, the project site is located in an urbanized and developed area of the City of Fresno, although the site is located immediately adjacent to a vacant dirt lot that may have the potential to result in wildland fires. The proposed project would be required to adhere to all applicable building safety and fire safety regulations to reduce the risk for fire potential. Therefore, impacts would be less than significant.

Mitigation Measures

Project-specific Mitigation Measures

MM HAZ-1 Prior to renovation or demolition activities, all defined regulated materials must be handled and disposed by trained, licensed contractors.

Should materials be impacted which were not sampled the Hazardous Materials Survey, these materials shall be sampled and tested for lead content.

All Regulated Asbestos-containing Materials (RACM) that will be affected by the planned demolition shall be removed prior to demolition of the subject building in compliance with the asbestos National Emissions Standards for Hazardous Air Pollutants (NESHAP), and Cal-OSHA Asbestos in the Construction Industry Standard, Title 8 California Code of Regulations, Section 1529. Additionally, all Category I and Category II non-friable asbestos-containing materials that may become friable as a result of demolition work and that will be affected by the planned demolition shall be removed prior to demolition of the subject building in compliance with the asbestos NESHAP, and California Occupational Safety and Health Administration (Cal/OSHA) Asbestos in the Construction Industry Standard, Title 8 California Code of

Should materials be impacted which were not sampled in the Hazardous Materials Survey, these materials shall be sampled and tested for asbestos content.

Regulations, Section 1529.

California Department of Forestry and Fire Protection (CAL FIRE). 2020. Fire Hazard Severity Zone (FHSZ) Viewer. Website: https://egis.fire.ca.gov/FHSZ/. Accessed October 19, 2020.

2.10	Environmental Issues Hydrology and Water Quality Would the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a)	Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality?				
b)	Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?				
c)	Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:				
	(i) result in substantial erosion or siltation on- or off-site;				
	(ii) substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site;				
	(iii) create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or				
	(iv) impede or redirect flood flows?			\boxtimes	
d)	In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?				
e)	Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?				

Setting

The discussion in this section is based in part on the Water Supply Assessment (WSA) prepared by AKEL Engineering Group, Inc. in March 2021, and the Preliminary Drainage Memorandum (Drainage

Memo) prepared by Kimley-Horn and Associates, Inc. (Kimley-Horn).^{72,73} The WSA and Preliminary Drainage Memo can be found in Appendix F.

Water Supply Assessment

Project Water Demands

As stated in the WSA, the City of Fresno 2010 Water Master Plan (WMP) includes demand factors for future demand planning purposes, which are based on historical consumption by land use type. Because the project site was included in the 2010 WMP, a comparison between current project demands and the estimate provided in the 2010 WMP was completed.

According to the WSA, project water demand based on the 2010 WMP factors is approximately 74,400 gallons per day (GPD) for the Light Industrial land use designation. Based on water demand estimates provided by Kimley-Horn, the project is estimated to demand approximately 12,400 GPD. This indicates that development associated with the proposed project would result in a decrease in water demand from the 2010 WMP by approximately 69 acre-feet per year (AFY).

Existing demands for the single-family residence, vacant land, and other non-demand generating land uses within the project site were estimated to be approximately 6,900 GPD according to the 2010 WMP. As mentioned above, water demand estimates of the proposed project are estimated to be approximately 12,400 GPD. Therefore, the proposed project would increase the water demands of the area by approximately 6 AFY.

Water Supply Reliability

The proposed project is within the service areas assumed as part of the City of Fresno 2015 Urban Water Management Plan (UWMP). Because project development information indicates that demands of the project are decreasing from those previously accounted for in the 2010 WMP and 2015 UWMP, the review of adequate water supply was based on findings of the City's 2015 UWMP. Based on the reduction in demand for the project site for the estimate in the 2015 UWMP, the City is expected to have adequate supplies to serve the proposed project during normal, single dry, and multiple dry years.

Would the project:

a) Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality?

Less than significant impact. The proposed project has the potential to release water pollutants during both construction and operation that may violate water quality standards and degrade surface or groundwater quality. During construction activity, runoff carrying eroded soils and pollutants could enter storm drainage systems and nearby waterways, increasing sedimentation and

100

AKEL Engineering Group, Inc. 2021. City of Fresno, Water Supply Assessment for Warehouse Project. March 2021.

⁷³ Kimley-Horn and Associates, Inc. (Kimley-Horn). 2021. Project Fresno – Drainage Memorandum. February 19, 2021.

degrading downstream water quality or be allowed to seep into the associated groundwater table. This would represent a potentially significant impact related to surface and groundwater quality.

Under the National Pollutant Discharge Elimination System (NPDES) General Construction Permit (NPDES No. CAS612008, Order No. R2-2015-0049) process, projects that disturb one or more acres of lands, such as the project, are required to obtain a permit before the start of construction activity. As a part of the NPDES General Construction Permit, the proposed project would be required to prepare and implement a SWPPP during construction in accordance with federal and State requirements. The SWPPP would identify structural and non-structural BMPs intended to prevent erosion during construction. For example, temporary BMPs include temporary dikes, sediment traps, and straw bale that would prevent sediment and other pollutants from leaving the project site in stormwater flows. Although construction activities have the potential to generate increased water pollution and sedimentation, compliance with applicable policies and regulations would minimize the potential to degrade water quality in downstream water bodies to the maximum extent possible. As a result, construction-related project impacts related to surface and groundwater water quality would be less than significant.

Under existing conditions, the project site consists of pervious and impervious surfaces in the form of dirt, grasses, and paved areas. The proposed project would develop a delivery station building with associated paved parking areas and landscaping throughout, which would result in new impervious surfaces across the majority of the site. stormwater runoff generated from the project could carry pollutants such as motor oil, sediment, and trash into downstream waterways, which could degrade surface or groundwater quality, a potentially significant impact.

The proposed project would be required to comply with Chapter 6 Article 7, Urban Storm Water Quality Management and Discharge Control, of the FMC, which requires prevention, control, and reduction of stormwater pollutants and compliance with the City's NPDES Permit. With adherence to the FMC, impacts related to surface and groundwater quality would be less than significant.

b) Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?

Less than significant impact. As stated in the General Plan, while ponding basins throughout the City collect stormwater runoff, they also provide groundwater recharge into the soil. The ponding basin located just southwest of the site would collect and allow for the percolation of stormwater into the groundwater system. Therefore, the proposed project would not substantially decrease groundwater supplies or interfere substantially with groundwater recharge, impeding sustainable groundwater management of the basin.

- c) Substantially alter the existing drainage pattern of area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:
- (i) result in substantial erosion or siltation on- or off-site;

Less than significant impact. During construction and grading the proposed project would likely alter the on-site drainage pattern. However, as described in Impact 10(a) the proposed project would be required to implement a SWPPP as part of the Construction General Permit. The SWPPP is designed to ensure that erosion, siltation, and flooding are prevented or minimized to the maximum extent feasible during construction. As discussed above, the proposed project would increase impervious surfaces on the project site compared to existing conditions. Therefore, stormwater runoff could carry sediments, resulting in erosion on- or off-site. Furthermore, the proposed project would provide stormwater conveyance through the implementation of inlets, storm drains, and overland flow, which would drain into the ponding basin southwest of the project site. As such, the proposed project would not result in substantial erosion or siltation on- or off-site. impacts would be less than significant.

(ii) substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site;

Less than significant impact. As discussed in Impact 10(a), the proposed project would increase impervious surface area on the project site compared to existing conditions, which could increase the rate or amount of surface runoff in a manner that could result in flooding. However, the storm drainage system would be designed to detain and meter the release of peak runoff in order to avoid inundating downstream facilities or waterways in a manner that could create substantial flooding on- or off-site. furthermore, the ponding basin located southwest of the project site would collect runoff, further preventing flooding on- or off-site. As such, impacts related to surface runoff would be less than significant.

(iii) create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or

Less than significant impact. The proposed project would increase the amount of surface runoff generated on the project site because of an increase in impervious surfaces compared to existing conditions. Consistent with the Construction General Permit, the proposed project would implement a SWPPP during construction, which would identify structural and non-structural BMPs intended to prevent significant polluted runoff during construction. As mentioned above, the proposed project would provide stormwater conveyance through inlets, storm drains, and overland flow, providing drainage into the ponding basin southwest of the project site. Implementation of the aforementioned drainage features and on-site landscaping would ensure that the proposed project would not contribute runoff that would exceed the capacity of downstream stormwater drainage systems or provide substantial additional sources of polluted runoff. Therefore, impacts would be less than significant.

(iv) impede or redirect flood flows?

Less than significant impact. As mentioned under Impact 10(d) below, the project site is not susceptible to flooding hazards. Therefore, the proposed project would into impede or redirect flood flows. As such, impacts would be less than significant.

d) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?

Less than significant impact. According to the Federal Emergency Management Agency (FEMA), the project site is located within Flood Zone X, an area with 0.2 percent chance of annual flood hazard. Therefore, the proposed project would not impede or redirect flood flows as the chance of annual flood hazard is low. Impacts would be less than significant.

e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?

Less than significant impact. Given that project construction would disturb more than 1 acre of land, the proposed project would be required to comply with the terms of the Construction General Permit, which require the preparation and implementation of a SWPPP that include BMPs to ensure reduction of pollutants from construction activities potentially entering surface water or groundwater basins. As mentioned previously, the ponding basin located southwest of the project site would collect runoff and provide groundwater recharge. This would ensure that the subbasin would not experience overdraft conditions. As such, the proposed project would not conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan. impacts would be less than significant.

Mitigation Measures

None required.

Federal Emergency Management Agency (FEMA). 2020. Flood Map Service Center. Website: https://msc.fema.gov/portal/search?AddressQuery=north%20clovis%20avenue%20and%20east%20olive%20avenue%20fresno%2C%20ca#searchresultsanchor. Accessed October 19, 2020.

2.1	Environmental Issues 1 Land Use and Planning Would the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a)	Physically divide an established community?				\boxtimes
b)	Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?				

Setting

The project site is designated and zoned as IL by the Fresno General Plan and Fresno Municipal Code. This land use designation allows for a range of light industrial uses, including limited manufacturing and processing, fabrication, research and development, utility equipment and service yards, wholesaling, warehousing, and distribution activities. Small scale retail and ancillary uses are also permitted. The maximum FAR allowed under the IL land use is 1.5.

Would the project:

a) Physically divide an established community?

No Impact. The physical division of an established community would occur if construction of a large linear feature such as a railroad or interstate highway separated an existing community or if a feature that connects a community is removed, such as a bridge. The proposed project consists of the construction of a delivery service building on two parcels within an urban and developed area of the City of Fresno. While there is an existing single-family residence located at the northwestern portion of the site, this residence is to be vacated and demolished prior to project construction. The proposed project would include off-site improvements to curbs, gutters, sidewalks, and bicycle access areas, but would not include any roadway improvements or the provision of new roads. The project does not propose a large linear feature that could separate a community, as the existing area surrounding the site is developed. Therefore, the proposed project would not physically divide an established community. No impacts would occur.

b) Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?

Less than significant impact. The proposed project consists of the construction of a delivery service building on two parcels designated and zoned as IL. The proposed project does not require a general plan amendment or rezone for development.

Furthermore, the proposed project would adhere to all local City of Fresno policies, ordinances, and regulations. As such, impacts related to conflict with any land use plan, policy, or regulation would be less than significant.

Mitigation Measures

None required.

Environmental Issues 2.12 Mineral Resources Would the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the State?				
b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?				

Setting

The City of Fresno General Plan contains several approved policies related to mineral resources which aim to protect locally available mineral resources for future use by the construction industry and protect the environment while still supporting Fresno's projected growth. The General Plan outlines Policy RC-10-b to maintain zoning consistent with ongoing mineral extraction in the San Joaquin River bottom that also allows multiple open space uses in conformance with State law and the City's Surface Mining Ordinance.

The California Department of Conservation Division of Mines and Geology classifies lands in the City of Fresno and along the San Joaquin River Corridor into three different Mineral Resource Zones (MRZ):

- MRZ-1: An area where adequate information indicates that no significant mineral deposits are present, or where it is judged that little likelihood exists for their presence.
- MRZ-2: An area where adequate information indicates that significant mineral deposits are
 present, or where it is judged that a high likelihood exists for their presence.
- MRZ-3: An area containing mineral deposits, the significance of which cannot be evaluated.

Aside from the MRZ-2 areas located along the San Joaquin River Corridor, most areas in the City of Fresno have an MRZ-3 designation, meaning they may or may not contain economically recoverable mineral resources.⁷⁵

_

⁷⁵ City of Fresno. 2014. Fresno General Plan: Resource Conservation and Resilience. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2019/07/ConsolidatedGP6182020.pdf Accessed: January 19, 2021.

However, there are no areas in the City of Fresno that are designated by the State Mining and Geology Board under the California Surface Mining and Reclamation Act of 1975 (SMARA). The project site is not located in a recognized mineral resource recovery zone. ⁷⁶

Would the project:

a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the State?

Less than significant impact. There are no known areas in the City of Fresno containing availability of a known mineral resource that would be of value to the region and residents of the State. The project site is located in an urban and developed area. The project site is not located in an area designated for mineral resource preservation or recovery; therefore, the proposed project would not result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the State. The project site is not delineated on a local general plan, specific plan or other land use plan as a locally-important mineral resource recovery site. Furthermore, the proposed project will be in compliance with the IL land use designation assigned by the Fresno General Plan. Additionally, the General Plan MEIR found that full implementation of the General Plan would result in less than significant impacts to mineral resources. Therefore, implementation of the proposed project would not result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state. Impacts would be less than significant.

b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?

Less than significant impact. As mentioned above, the City of Fresno has not been identified as a recognized mineral resources recovery zone. Furthermore, implementation of the General Plan would result in less than significant impacts with respect to mineral resources. The proposed project would be in compliance with the IL land use designation assigned by the Fresno General Plan. Therefore, it is not likely to result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan. Impacts would be less than significant.

Mitigation Measures

None required.

⁷⁶ California Department of Conservation. 2019. Website: https://maps.conservation.ca.gov/mineralresources/. Accessed February 17, 2021

⁷⁷ City of Fresno. 2014. General Plan and Development Code Update Master Environmental Impact Report. https://www.fresno.gov/darm/wp-content/uploads/sites/10/2016/11/Sec-08-00-EFNS-MEIR.pdf Accessed: January 19, 2021.

2.13 N	Environmental Issues Noise Would the project result in:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
pe vid es or	eneration of a substantial temporary or ermanent increase in ambient noise levels in the cinity of the project in excess of standards stablished in the local general plan or noise rdinance, or applicable standards of other gencies?				
	eneration of excessive groundborne vibration or roundborne noise levels?			\boxtimes	
aiı pla pu pr	or a project located within the vicinity of a private rstrip or an airport land use plan or, where such a lan has not been adopted, within two miles of a ublic airport or public use airport, would the roject expose people residing or working in the roject area to excessive noise levels?				

Setting

This analysis is based on the Noise Impact Analysis Report prepared by FCS, dated December 16, 2020, to determine the off-site and on-site noise impacts associated with the proposed Fresno Warehouse Project. The report, including all calculation and modeling data and assumptions and tables, is contained in Appendix G of this document.

Characteristics of Noise

Noise is defined as unwanted sound. Sound levels are usually measured and expressed in decibels (dB), with 0 dB corresponding roughly to the threshold of hearing. Most of the sounds that we hear in the environment do not consist of a single frequency, but rather a broad band of frequencies, with each frequency differing in sound level. The intensities of each frequency add together to generate a sound. Noise is typically generated by transportation, specific land uses, and ongoing human activity.

The standard unit of measurement of the loudness of sound is the decibel. The 0 point on the dB scale is based on the lowest sound level that the healthy, unimpaired human ear can detect. Changes of 3 dB or less are only perceptible in laboratory environments. A change of 3 dB is the lowest change that can be perceptible to the human ear in outdoor environments. While a change of 5 dBA is considered to be the minimum readily perceptible change to the human ear in outdoor environments.

Since the human ear is not equally sensitive to sound at all frequencies, the dBA was derived to relate noise to the sensitivity of humans, it gives greater weight to the frequencies of sound to which

the human ear is most sensitive. The A-weighted sound level is the basis for a number of various sound level metrics, including the day/night average sound level (L_{dn}) and the CNEL, both of which represent how humans are more sensitive to sound at night. In addition, the equivalent continuous sound level (L_{eq}) is the average sound energy of time-varying noise over a sample period and L_{max} is the maximum instantaneous noise level occurring over a sample period.

Would the project result in:

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

Short-term Construction Impacts

Less than significant impact. For purposes of this analysis, a significant impact would occur if construction activities would result in a substantial temporary increase in ambient noise levels outside of the City's permissible hours for construction that would result in annoyance or sleep disturbance of nearby sensitive receptors. Permissible construction hours are from 7:00 a.m. to 10:00 p.m. on any day except Sunday.

Construction-related Traffic Noise

Impacts from project construction activities would be a function of the noise generated by construction equipment, equipment location, sensitivity of nearby land uses, and the timing and duration of the construction activities. One type of short-term noise impact that could occur during project construction would result from the increase in traffic flow on local streets, associated with the transport of workers, equipment, and materials to and from the project site.

The transport of workers and construction equipment and materials to the project site would incrementally increase noise levels on access roads leading to the site. Because workers and construction equipment would use existing routes, noise from passing trucks would be similar to existing vehicle-generated noise on these local roadways. Typically, a doubling of the Average Daily Traffic (ADT) hourly volumes on a roadway segment is required in order to result in an increase of 3 dBA in traffic noise levels; which, as discussed in the characteristics of nose discussion above, is the lowest change that can be perceptible to the human ear in outdoor environments. Project-related construction trips would not be expected to double the hourly or daily traffic volumes along any roadway segment in the project vicinity. For this reason, short-term intermittent noise from construction trips would not be expected to result in a perceptible increase in hourly- or daily-average traffic noise levels in the project vicinity. Therefore, short-term construction-related noise impacts associated with the transportation of workers and equipment to the project site would be less than significant.

Construction Equipment Operational Noise

The second type of short-term noise impact is related to noise generated during construction on the project site. Construction is completed in discrete steps, each of which has its own mix of equipment and, consequently, its own noise characteristics. These various sequential phases would change the character of the noise generated on the site and, therefore, the noise levels surrounding the site as

construction progresses. Despite the variety in the type and size of construction equipment, similarities in the dominant noise sources and patterns of operation allow construction related noise ranges to be categorized by work phase. Table 18 lists typical construction equipment noise levels, based on a distance of 50 feet between the equipment and a noise receptor. Typical operating cycles for these types of construction equipment involve 1 or 2 minutes at full-power followed by 3 or 4 minutes at lower power settings. Impact equipment such as pile drivers are not expected to be used during construction of this project.

Table 18: Typical Construction Equipment Maximum Noise Levels, L_{max}

Type of Equipment	Impact Device? (Yes/No)	Specification Maximum Sound Levels for Analysis (dBA at 50 feet)
Impact Pile Driver	Yes	95
Auger Drill Rig	No	85
Vibratory Pile Driver	No	95
Jackhammers	Yes	85
Pneumatic Tools	No	85
Pumps	No	77
Scrapers	No	85
Cranes	No	85
Portable Generators	No	82
Rollers	No	85
Bulldozers	No	85
Tractors	No	84
Front-End Loaders	No	80
Backhoe	No	80
Excavators	No	85
Graders	No	85
Air Compressors	No	80
Dump Truck	No	84
Concrete Mixer Truck	No	85
Pickup Truck	No	55

Notes:

dBA = A-weighted decibel

Source: Federal Highway Administration (FHWA). 2006. Highway Construction Noise Handbook. August.

The site preparation phase, which includes excavation and grading of the site, tends to generate the highest noise levels because the noisiest construction equipment is earthmoving equipment. Earthmoving equipment includes excavating machinery and compacting equipment, such as bulldozers, draglines, backhoes, front loaders, roller compactors, scrapers, and graders. Typical

operating cycles for these types of construction equipment may involve 1 or 2 minutes of full power followed by 3 or 4 minutes at lower power settings.

Construction of the project is expected to require the use of scrapers, bulldozers, water trucks, haul trucks, and pickup trucks. Based on the information provided in Table 18 the maximum noise level generated by each scraper is assumed to be 85 dBA L_{max} at 50 feet from this equipment. Each bulldozer would also generate 85 dBA L_{max} at 50 feet. The maximum noise level generated by graders is approximately 85 dBA L_{max} at 50 feet. A characteristic of sound is that each doubling of sound sources with equal strength increases a sound level by 3 dBA. Assuming that each piece of construction equipment operates at some distance from the other equipment, a reasonable worst-case combined noise level during this phase of construction would be 90 dBA L_{max} at a distance of 50 feet from the acoustic center of a construction area. This would result in a reasonable worst-case hourly average of 86 dBA L_{eq}. The acoustic center reference is used, because construction equipment must operate at some distance from one another on a project site, and the combined noise level as measured at a point equidistant from the sources would (acoustic center) be the worst-case maximum noise level. The effect on sensitive receptors is evaluated below.

The closest noise-sensitive receptors to the project site construction footprint are the single-family residence located west of the project site, on East Olive Avenue. The façade of these closest homes would be located approximately 130 feet from the acoustic center of construction activity where multiple pieces of heavy construction equipment would operate simultaneously during construction of the proposed parking areas near the project's western boundary. At this distance, construction noise levels could range up to approximately 82 dBA L_{max}, with a relative worst-case hourly average of 78 dBA L_{eq} at this receptor. These noise levels could occur temporarily under the reasonable worst-case scenario of multiple pieces of heavy construction equipment operating simultaneously in relatively the same locations at the nearest project boundary for an hour-long period.

Although there could be a relatively high single event noise exposure potential causing an intermittent noise nuisance, the effect of construction activities on longer-term (hourly or daily) ambient noise levels would be small but could result in a temporary increase in ambient noise levels in the project vicinity that could result in annoyance or sleep disturbance of nearby sensitive receptors.

Section 10-105 of the Fresno Municipal Code establishes that construction activities are permissible between the hours of 7:00 a.m. and 10:00 p.m. Monday through Saturday. Therefore, compliance with the City's permissible hours of construction would ensure that construction noise would not result in a substantial temporary increase in ambient noise levels that would result in annoyance or sleep disturbance of nearby sensitive receptors; hence, less than significant construction noise impacts would occur.

Operational/Mobile Source Noise Impacts

Less than significant impact. A significant impact would occur if implementation of the proposed project would result in a substantial increase in traffic noise levels compared with traffic noise levels existing without the project. According to Policy NS-1-j of the Fresno General Plan, a significant

increase in ambient noise levels is assumed if a project would increase noise levels in the immediate vicinity by 3 dBA L_{dn}/CNEL or more above the ambient noise limits established in the General Plan.

Typically, a doubling of the ADT hourly volumes on a roadway segment is required in order to result in an increase of 3 dBA in traffic noise levels; which, as discussed in the characteristics of nose discussion above, is the lowest change that can be perceptible to the human ear in outdoor environments. Therefore, for purposes of this analysis, a doubling of the existing ADT volumes would result in a substantial permanent increase in traffic noise levels.

Based on the traffic analysis prepared for the project, the proposed project would generate an average of 1,654 trips per day, including 46 AM peak-hour trips and 108 PM peak-hour trips.⁷⁸ These average daily and peak-hour project trips would not result in a doubling of the average daily trips along East Olive Avenue⁷⁹ or any other access roadway in the project vicinity. Therefore, the increase in traffic noise resulting from project operations would not be perceptible along any roadway segment in the project vicinity. Therefore, implementation of the proposed project would not result in a substantial increase in traffic noise levels compared with traffic noise levels existing without the project; hence less than significant mobile operational noise impacts would occur.

Operational/Stationary Source Noise Impacts

Less than significant impact. A significant impact would occur if operational noise levels generated by stationary noise sources at the proposed project site would result in a substantial permanent increase in ambient noise levels in excess of the City's noise performance standards.

Policy NS-1-j of the Fresno General Plan defines a significant increase in ambient noise levels as an increase of 3 dBA L_{dn}/CNEL or more above the ambient noise limits established in the General Plan. Policy NS-1-a of the Fresno General Plan establishes 60 dBA L_{dn}/CNEL (measured at the property line) as the desirable maximum average exterior noise level for noise generated by stationary sources impinging upon residential and noise sensitive uses. Furthermore, Policy NS-1-i establishes hourly average and maximum noise level performance standards (as measured at the outdoor activity areas of a receiving land use) for stationary noise sources. The daytime standards are 50 dBA Leg and 70 dBA L_{max}, and the nighttime noise performance standards are 45 dBA L_{eq} and 65 dBA L_{max}. Therefore, for purposes of this analysis, an exceedance of 3 dBA or more above the applicable noise performance thresholds would be considered a substantial permanent increase in ambient noise levels.

The proposed project would generate noise from parking lot activities, new exterior mechanical equipment sources, such as rooftop ventilation systems on proposed industrial uses, and from truck loading and unloading activities. Potential impacts from these noise sources are discussed below.

Parking Lot Areas

Typical parking lot activities include people conversing, doors shutting, and vehicles idling which generate noise levels ranging from approximately 60 dBA to 70 dBA L_{max} at 50 feet. These activities

112

⁷⁸ Kimley-Horn and Associates, Inc. 2020. Project Fresno Trip Generation Validation Memorandum. October 23.

⁷⁹ Existing traffic volumes on Olive Avenue were documented by Kimley-Horn on November 17, 2020, with observed 4,723 average daily trips on Olive Avenue, east of Clovis Avenue. The traffic counts result summary page is included in Appendix G.

are expected to occur sporadically throughout the day, as visitors and staff arrive and leave parking lot areas at the project site.

The closest noise-sensitive receptor to the parking areas associated with the proposed project are the single-family residential land uses located west of the project site, across North Minnewawa Avenue. These residences would be located approximately 110 feet from the acoustic center of the nearest proposed parking areas. The nearest residences have a 6-foot-high solid wood fence that would provide an expected minimum 6 dBA shielding reduction as it would block the line of sight to parking lot activities. With the distance attenuation and fence shielding, noise levels associated with daily parking lot activities would attenuate to approximately 57 dBA L_{max} at the nearest outdoor active use areas (backyards) of the nearest residences. Assuming a reasonable worst-case scenario of one parking movement for every parking stall within a single hour would result in an hourly average noise level of 49 dBA Leg as measured at the outdoor active use areas (backyards) of the nearest residence. Parking lot use during nighttime hours would be expected to be reduced by at least half compared to daytime hourly average use. Therefore, nighttime parking lot activities would result in reasonable worst-case hourly average noise levels of 57 dBA Lmax and 45 dBA Leg as measured at the nearest outdoor active use areas of residential land uses. Assuming these reasonable worst-case hourly average noise levels occurred every hour over a 24-hour period, parking lot activity noise levels could range up to 53 dBA CNEL as measured at the nearest residential property line.

Therefore, the proposed project's reasonable worst-case parking lot noise levels would not exceed the City's daytime noise performance standards of 50 dBA L_{eq} and 70 dBA L_{max}, or the nighttime noise performance standards of 45 dBA L_{eq} and 65 dBA L_{max}, or the desirable maximum 24-hour average exterior noise level standard of 60 dBA CNEL. Therefore, project parking lot activities would not result in a substantial permanent increase in ambient noise levels in the project vicinity. Because the proposed project would not generate a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, the impact of noise produced by project-related parking lot activities to off-site sensitive receptors would be less than significant.

Mechanical Equipment Operations

At the time of preparation of this analysis, details were not available pertaining to the proposed rooftop mechanical ventilation systems for the project; therefore, a reference noise level for typical rooftop mechanical ventilation systems was used. Noise levels from commercially available rooftop mechanical ventilation equipment range from 50 dBA to 60 dBA L_{eq} at a distance of 25 feet. Rooftop mechanical ventilation systems could be located approximately 640 feet from the nearest noise sensitive receptor, which is a multi-family residence south of the project site (single-family residences to the west would be located over 1,440 feet from the nearest proposed mechanical ventilation systems). Noise generated by typical rooftop mechanical ventilation equipment would attenuate (due to distance attenuation and shielding provided by the rooftop parapet) to below 32 dBA L_{eq} and 32 dBA L_{max} . If mechanical ventilation systems operated continuously for a 24-hour period, the resulting noise levels would range up to 39 dBA CNEL as measured at the nearest residential property line.

Therefore, noise levels from proposed mechanical ventilation equipment operations would not exceed the City's daytime noise performance standards of 50 dBA L_{eq} and 70 dBA L_{max} , or the nighttime noise performance standards of 45 dBA L_{eq} and 65 dBA L_{max} , or the desirable maximum 24-hour average exterior noise level standard of 60 dBA CNEL. Therefore, noise levels from proposed mechanical ventilation equipment operations would not result in a substantial permanent increase in ambient noise levels in the project vicinity. Because the proposed project would not generate a substantial temporary or permanent increase in ambient noise levels in the project vicinity in excess of standards established in the local general plan or noise ordinance, the impact of noise produced by proposed mechanical ventilation equipment operations to off-site sensitive receptors would be less than significant.

Truck Loading Activities

Noise would be also generated by truck loading and unloading activities at the loading docks along the southern, western, and northern sides of the proposed building. Typical noise levels from truck loading and unloading activity range from 70 dBA to 80 dBA L_{max} as measured at 50 feet. These maximum noise level range includes noise from associated truck loading/unloading activity, including trucks maneuvering, truck trailer loading, truck trailer unloading, backup alarms or beepers, and truck docking noise. The nearest noise sensitive receptor are the multi-family residences south of the project site, is located more than 670 feet from the southernmost proposed loading dock. The single-family residences to the west are located over 1,440 feet from the nearest proposed loading docks. Due to distance attenuation, noise levels from truck loading and unloading activities would attenuate to below 51 dBA L_{max} and 32 dBA L_{eq} at the property line of the nearest multi-family residences south of the project site. Assuming these reasonable worst-case hourly average noise levels occurred every hour over a 24-hour period, truck loading and unloading activity noise levels could range up to 38 dBA CNEL as measured at the nearest residential property line.

Therefore, noise levels from truck loading and unloading activities would not exceed the City's daytime noise performance standards of 50 dBA L_{eq} and 70 dBA L_{max}, or the nighttime noise performance standards of 45 dBA L_{eq} and 65 dBA L_{max}, or the desirable maximum 24-hour average exterior noise level standard of 60 dBA CNEL. Therefore, noise levels from truck loading and unloading activities at the proposed project would not result in a substantial permanent increase in ambient noise levels in the project vicinity. Because the proposed project would not generate a substantial temporary or permanent increase in ambient noise levels in the project vicinity in excess of standards established in the local general plan or noise ordinance, the impact of noise produced by truck loading and unloading activities at the proposed project to off-site sensitive receptors would be less than significant.

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

Less than significant impact. A significant impact would occur if groundborne vibration exceeded levels considered to be perceptible. The City of Fresno prohibits groundborne vibration that is discernible without the aid of instruments by a reasonable person at the lot lines of the site; however, vibrations from temporary construction activities are exempt from this standard.

Therefore, for purposes of this analysis, the Federal Transit Administration (FTA) vibration impact criteria are utilized to analyze construction vibration impacts. 80

Short-term Construction Vibration Impact

A significant impact would occur if existing structures at the project site or in the project vicinity would be exposed to groundborne vibration levels that exceed the FTA's Construction Vibration Impact Criteria for the listed type of structure.

Of the variety of equipment used during construction, the small vibratory rollers that are anticipated to be used in the site preparation phase of construction would produce the greatest groundborne vibration levels. Small vibratory rollers produce groundborne vibration levels ranging up to 0.101 inch per second (in/sec) peak particle velocity (PPV) at 25 feet from the operating equipment.

The nearest off-site receptors to the project construction footprint are the single-family residential structures west of the project site. The façade of these structures would be located approximately 75 feet from the nearest point on the project site where the heaviest construction equipment would potentially operate during construction of the nearest proposed parking lot. At this distance, groundborne vibration levels would range up to 0.018 PPV from operation of the types of equipment that would produce the highest vibration levels. This is well below the FTA's Construction Vibration Impact Criteria of 0.2 PPV for this type of structure, a building of non-engineered timber and masonry construction. Therefore, the impact of short-term groundborne vibration associated with construction to off-site receptors would be less than significant.

Operational Vibration Impacts

Implementation of the proposed project would not include any permanent sources that would expose persons in the project vicinity to groundborne vibration levels that could be perceptible without instruments at any existing sensitive land use in the project vicinity. In addition, there are no existing significant permanent sources of groundborne vibration in the project vicinity to which the proposed project would be exposed. Therefore, project operational groundborne vibration level impacts would be considered less than significant.

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

No Impact. A significant impact would occur if the proposed project would expose people residing or working in the project area to excessive noise levels for a project located in the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within 2 miles of a public airport or public use airport.

The project site is not located within the vicinity of a private airstrip. The nearest public airport to the project site is the Fresno Yosemite International Airport, located approximately 0.7 mile north of

⁸⁰ Federal Transit Administration (FTA). 2018. Transit Noise and Vibration Impact Assessment Manual. September.

the project site. According to the airport's noise exposure map, ⁸¹ the project site is located outside of the 65 dBA CNEL airport noise contours. While aircraft noise is occasionally audible on the project site from aircraft flyovers, aircraft noise associated with nearby airport activity would not expose people residing or working near the project site to excessive noise levels. Therefore, implementation of the proposed project would not expose persons residing or working in the project vicinity to noise levels from airport activity that would be in excess of normally acceptable standards for the proposed land use development, and no impact would occur.

Mitigation Measures

None required.

116

⁸¹ Fresno County. 2018. Fresno County Airport Land Use Compatibility Plan, Exhibit 2c, December.

2.1	Environmental Issues 4 Population and Housing Would the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a)	Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?				
b)	Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?				

The Fresno General Plan accomodates a population of 771,000 by 2035, at an average annual growth rate of 1.24 percent. According to the California Department of Finance, Fresno grew at a rate of 0.7 percent between 2019 and 2020, while Fresno County grew at a rate of 0.8 percent. As of 2010, Fresno's population was 494,665. As of 2020, Fresno has a total population of 545,769 and 181,978 housing units, with an average of 3.12 persons per household. The City of Fresno's General Plan states that the City has the capacity for 76,000 new residential dwelling units. Table 19 summarizes the city of Fresno's housing capacity.

Table 19: Residential Development Capacity Under Horizon and Buildout^a

Residential Dwelling Units	General Plan Horizon
Existing	191,000
Additional Capacity ^b	76,000
Total Capacity	267,000

Notes:

- ^a Calculations are based on August 9, 2012, Land Use Diagram Draft Figure 2 of the Initiation Draft.
- Existing dwelling unit count is based on the 2010 Census for dwelling units within the City Limits (approximately 171,000 dwelling units) added to the Fresno Council of Government informal aerial photo and census tract study estimate of 2010 population and dwelling units within the area located outside of the City Limits and inside the City's Sphere of Influence boundary (approximately 20,000 dwelling units) for a total of approximately 191,000 dwelling units.

Source: Fresno General Plan (2014)

⁸² City of Fresno. 2014. Fresno General Plan. Development Under the Plan – Dwellings, Population, and Jobs.

⁸³ State of California Department of Finance. May 2020. E-4 Population Estimates for Cities, Counties, and the State, 2011-2020 with 2010 Census Benchmark. Website:

⁸⁴ Ibid.

Would the project:

a) Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?

Less than significant impact. Unplanned direct population growth would occur if the project produces a population growth not anticipated and evaluated by the City of Fresno in its General Plan. The proposed project would include demolition of a single-family residence for the construction of a warehouse, which would employ approximately 545 total employees. Based on the conservative assumption that all employees would relocate to Fresno from elsewhere, the proposed project could increase population by as much as 1,700 people, representing an approximate 0.31 percent increase from the City's 2020 population of 545,769.

The General Plan Housing Element estimated a 2035 population of 771,000.⁸⁵ The proposed project could represent up to approximately 0.22 percent of the projected population growth from 2020 to 2035.

The proposed project would generate temporary employment opportunities during construction. These employees would be temporary and limited to the project construction period. Given that the relatively short construction period spans approximately 1 year, the local labor pool would be expected to satisfy labor demands of the project. As a result, construction workers would not require permanent relocation contributing to population growth over time and for the period of construction the proposed project would not contribute substantially to new employment.

The area surrounding the project site is composed of residential and commercial uses as well as vacant land. The area around the project site currently contains utility infrastructure such as roads, water, wastewater, and stormwater facilities to which the proposed project would connect. The proposed project would be accessed via East Olive Avenue, North Clovis Avenue, and North Minnewawa Avenue, all of which are existing streets. Extension of infrastructure to the project site would be to serve the site alone and would not remove barriers of growth.

Overall, the proposed project could result in a direct population increase, however, the maximum population increase is consistent with expected growth analyzed in the General Plan, the proposed project would not induce significant indirect population growth. As such, impacts would be less than significant.

b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?

Less than significant impact. The proposed project would involve the demolition of a single-family residence for the construction of a warehouse. Given the average ratio of 3.12 persons per household, the proposed project would likely displace 3 to 4 people. Therefore, the demolition

⁸⁵ City of Fresno. 2014. Fresno General Plan. Development Under the Plan – Dwellings, Population, and Jobs. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2019/07/ConsolidatedGP6182020.pdf Accessed: January 19, 2021.

would not necessitate the construction of replacement housing elsewhere. As such, impacts would be less than significant.

Mitigation Measures

None required.

Environmental Issues	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
2.15 Public Services Would the project result in substantial adverse p physically altered governmental facilities, need f construction of which could cause significant env service ratios, response times or other performa	or new or physico vironmental impa	ally altered gove acts, in order to	ernmental fac maintain acce	ilities, the
a) Fire protection?			\boxtimes	
b) Police protection?			\boxtimes	
c) Schools?			\boxtimes	
d) Parks?			\boxtimes	
e) Other public facilities?			\boxtimes	

Setting

Fire protection services are provided to the City by the Fresno Fire Department and through response agreements with the City of Clovis Fire Department and Fresno County Fire Protection District. ⁸⁶ The Fresno Fire Department offers a full range of services including fire prevention, suppression, emergency medical care, hazardous materials, urban search and rescue response, emergency preparedness planning, and public education coordination. ⁸⁷ According to the City of Fresno website, there are 20 fire stations located throughout the City, as well as stations designated for Fire Department headquarters, repair and maintenance, and training. The Department has 289 sworn firefighting personnel, 16 sworn non-safety personnel, and 24 civilian positions for a total of 329 Fresno Fire Department members. Eighty-one firefights are on duty each day within the City. There are five divisions within Fresno Fire Department: Administration, Personnel and Investigative Services, Emergency Operations, Training, and Prevention and Support. ⁸⁸

Police protection services are provided to the City by the Fresno Police Department. Fresno Police Department includes a variety of Specialized Units and Services that support the agency such as the Explosive Ordinance Disposal Unit, Internal Affairs, K9 Units, Driving Under the Influence Program, Skywatch, Special Weapons and Tactics Team, Records Bureau, and others. The Police Department operates five policing district stations in the southwest, southeast, northwest, northeast, and central geographic areas of the City. ⁸⁹ The closest station to the project site is the southeast District Station, located at 1617 South Cedar Avenue, approximately 3.20 miles southwest of the project site.

-

⁸⁶ City of Fresno. 2014. Fresno General Plan. Urban Form, Land Use, and Design. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2019/07/Consolidated-GP-7-2019.pdf. Accessed October 19, 2020.

⁸⁷ City of Fresno. 2014. Fresno General Plan. Public Facilities. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2019/07/Consolidated-GP-7-2019.pdf. Accessed October 19, 2020.

⁸⁸ City of Fresno. 2021. Fire Department. Website: https://www.fresno.gov/fire/fire-chiefs-office/. Accessed February 16, 2021.

⁸⁹ City of Fresno. 2021. Police Department. Website: https://www.fresno.gov/police/police-contacts/. Accessed February 16, 2021.

The project is within the service boundary of Fresno Unified School District (FUSD). FUSD operates three K-8 schools, 65 elementary schools, 15 middle schools, 15 high schools, and six "other" schools, which includes adult and e-learning schools, and infant programs. 90 The closest school to the project site is Fresno Adventist Academy, located approximately 0.10 mile northwest of the site. The second closest school is Turner Elementary School, located approximately 0.36 mile southwest of the project site.

The City of Fresno Parks, After School, Recreation and Community Services (PARCS) Department offers numerous parks, including regional pars, neighborhood parks, action sports facilities, play structures, and golf courses throughout the City. The City of Fresno's park standard calls for at least 3 acres of parkland per 1,000 residents. The City has a current supply of 3.28 acres of City Park Space per 1,000 residents according to the General Plan. The closest park to the project site is Al Radka Park, located approximately 0.67 mile southeast of the site.

Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:

a) Fire protection?

Less than significant impact. The proposed project consists of the construction of a delivery station building. The proposed project would generate 545 employees and up to 1,700 new residents, which would increase the demand for fire protection services compared to existing conditions. The closest fire station is Fresno Fire Station No. 10, located approximately 1.20 miles north of the site. The proposed project would include two 30-foot driveways and one 24-foot driveway along East Olive Avenue, a 36-foot driveway along North Clovis Avenue, and a 20-foot driveway along North Minnewawa Avenue. This driveway along North Minnewawa Avenue would be designated for EVA only. The proposed project would also provide a minimum 25-foot fire lane around the building to allow for emergency access. Based on a water flow hydrant test conducted in November 2020 and witnessed by Bakman Water Company, infrastructure improvements would be required to the water well output from existing wells to provide the minimum fire flow requirement of 2,500 gallons per minute (gpm) residual pressure for water purveyor infrastructure as required by the Fresno Fire Department development policies. While it was confirmed that no new fire stations would be needed to serve the proposed project, the proposed project in conjunction with other development projects would generate additional calls for service, and additional staff and/or fire apparatus may be needed to meet service demands in the future. 91 Furthermore, the proposed project would be required to conduct an analysis of radio coverage within the proposed building in the event of an emergency, as required by the California Fire Code. If radio coverage is determined to be insufficient, an emergency responder communication enhancement system may be required. The project applicant would be required to pay the Fire Facilities Fee consistent with Chapter 12 Article 4.9, Fire

⁹⁰ Fresno Unified School District (FUSD). 2021. School Directory. Website: https://schools.fresnounified.org/. Accessed February 16,

⁹¹ Fresno Fire Department. 2021. Personal Communication with Byron Beagles. April 14, 2021.

Facilities Fee, of the FMC. Payment of these fees would fund new or expanded fire protection facilities as needed, which would ensure that Fresno Fire Department is able to adequately serve the proposed project. With the payment of required Fire Facilities Fees, infrastructure improvements, and provision of adequate radio coverage, impacts would be less than significant.

b) Police protection?

Less than significant impact. The proposed project consists of the construction of a delivery station building. The proposed project would generate 545 employees and up to 1,700 new residents, which would increase the demand for police protection services compared to existing conditions. The proposed project would ensure that the site contains adequate security lighting and other security measures to reduce the potential for crime at the project site. Furthermore, the project applicant would be required to pay fees consistent with Chapter 12 Article 4.8, Police Facilities Fee, of the FMC. Payment of these fees would ensure the Fresno Police Department would have the ability to serve the project site and the associated increase in population. With the provision of on-site security measures and payment of required Police Facility Fees, impacts would be less than significant.

c) Schools?

Less than significant impact. The proposed project consists of the construction of a delivery station building. Correspondence with FUSD indicated that the proposed project could result in approximately 26 K-12 students to FUSD. As stated by FUSD, the proposed project is subject to development fees of \$0.66 per square foot to off-set the potential impacts to school facilities within FUSD. Pursuant to Government Code Sections 65995 and 65996(b), payment of adopted development fees is considered "full and complete mitigation" for impacts to school facilities, and local governments are prohibited from assessing additional fees or exactions for school impacts. With payment of required impact fees, the proposed project would not result in significant impacts to FUSD schools. As such, impacts to school facilities would be less than significant.

d) Parks?

Less than significant impact. The proposed project consists of the construction of a delivery station building. There is potential, albeit low, for the project to increase park use within the City of Fresno. The proposed project would be required to pay Park Facility Fees consistent with Chapter 12 Article 4.7, Park Facilities Fee, of the FMC. Payment of these fees would ensure that the City is able to meet the parkland standard of 3 acres per 1,000 residents. With the payment of these fees, the proposed project would not increase the demand for parks requiring the construction of new facilities or expansion of existing park facilities. Impacts would be less than significant.

-

⁹² Fresno Unified School District (FUSD). Personal Communication with Alex Belanger, Assistant Superintendent and Heidi Lopez, Technical Specialist II. February 2, 2021.

e) Other public facilities?

Less than significant impact. The proposed project consists of the construction of a delivery station building. Other public facilities in the City of Fresno include courts, libraries, and hospitals. There is potential, albeit low, for the project to increase the use of existing libraries and hospitals in the City of Fresno. Library services are provided by the Fresno County Library system. The closest library to the project site is the Kauffman Library, located approximately 0.95 mile northwest of the project site. Fresno Community Hospital is located approximately 4.42 miles southwest of the project site. There are no City impact fees in place related to impacts to libraries and hospitals. Demand for public facilities generated by the proposed project is consistent with the planned for development in the General Plan MEIR and would be within planned services levels of the City of Fresno Parks and Community Services Department. The applicant will pay any required impact fees at the time building permits are obtained. In conclusion, the proposed project would not result in any environmental impacts beyond those analyzed in the General Plan MEIR. As such, impacts would be less than significant.

Mitigation Measures

None required.

2.1	Environmental Issues 6 Recreation	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a)	Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?				
b)	Does the project include recreational facilities or require the construction or expansion of recreational facilities, which might have an adverse physical effect on the environment?				

The City of Fresno owns and operates 18 community and neighborhood centers, three swim center and five learner pools, a regional sports complex, three regional parks, several neighborhood parks, 11 dog parks, and two golf courses. The closest park to the project site is Al Radka Park, approximately 1 mile away. The closest community center is the Sal Mosqueda Community Center located at 4670 East Butler Avenue, approximately 4.5 miles away from the project site.

a) Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?

Less than significant impact. The proposed project could increase recreational facility use as it with its increase the City's population by 1,700 persons, conservatively assuming all persons employed by the project relocate to the City of Fresno from elsewhere. If deemed necessary by the City Council, the proposed project would be required to pay park and recreation in-lieu fees consistent with Municipal Code Chapter 12 Article 4.7, which would ensure that the proposed project would contribute to the City's ability to provide and maintain adequate parks and recreational facilities. Although the proposed project would not include recreational facilities, payment of in-lieu fees would contribute toward the City's ability to maintain existing recreational facilities for potential future residents. Additionally, the project site is located near existing recreational facilities, such as Al Radka Park approximately 1 mile to the southwest, Mosqueda Community Center, approximately 4.5 miles to the southeast, and Blossom Trail, approximately 3.5 miles to the south. As a result, the proposed project would be served by adequate recreational facilities and would not substantially increase physical deterioration of a recreational facility. Therefore, impacts would be less than significant.

b) Does the project include recreational facilities or require the construction or expansion of recreational facilities, which might have an adverse physical effect on the environment?

No impact. As discussed previously, the proposed project may increase recreational facility use because employment opportunities provided by the proposed project could result in an increase in the City of Fresno's population by up to 1,700 residents. However, if deemed necessary by the City Council, the proposed project would be required to pay park and recreation in-lieu fees consistent with Municipal Code Chapter 12 Article 4.7, which would ensure the proposed project would contribute to the City's ability to provide and maintain adequate parks and recreational facilities. Although the proposed project would not include recreational facilities, payment of in-lieu fees would contribute toward the City's ability to provide new recreational facilities for future residents. Additionally, several recreational facilities are located in the project vicinity, including Al Radka Park approximately 1 mile to the southwest, Mosqueda Community Center, approximately 4.5 miles to the southeast, and Blossom Trail, approximately 3.5 miles to the south. Furthermore, the proposed project does not include the construction or expansion of any recreational facilities that could have an adverse physical effect on the environment. As such, no impact would occur.

Mitigation Measures

None required.

2.17	Environmental Issues 7 Transportation Would the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a)	Conflict with a program plan, ordinance or policy of the circulation system, including transit, roadway, bicycle and pedestrian facilities?				
b)	Would the project conflict or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b)?				
c)	Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?				
d)	Result in inadequate emergency access?			\boxtimes	

Setting

The transportation analysis in this section is based in part on the Trip Generation Validation Memorandum prepared on October 23, 2020, and VMT Memorandum prepared on February 19, 2021, by Kimley-Horn. The Trip Generation Validation Memorandum and VMT Memorandum can be found in Appendix I.

Trip Validation Memorandum

As shown in Table 19 below, the proposed project would result in a total of 1,654 daily trips. The Trip Generation Validation Memorandum determined that the custom trip generation rates developed for the proposed project have been validated by comparing weighted averages of three existing sites. It was determined that the proposed project has a lower weighted average than the three existing sites.

Table 20: Proposed Project Trip Generation

Trip				AM Peak-hour					PM Peak-hour				
Land Use	Units (ksf)	Rate (ksf)	Daily Trips	% of ADT	In:Out Ratio	In	Out	Total	% of ADT	In:Out Ratio	In	Out	Total
Anticip	Anticipated Trip Generation During Commuter Peak-hours (7:00 a.m.–8:00 a.m./4:00 p.m.–5:00 p.m.) ¹												
PCE	183.1	9.03	1,654	2.8%	0.80:0.20	37	9	46	6.5%	0.68:0.32	73	35	108
Total	_	_	1,654	_	_	37	9	46	_	_	73	35	108
Anticip	Anticipated Trip Generation during Project Specific Peak-hours (10:0 a.m.–11:00 a.m./8:00 p.m.–9:00 p.m.) ¹										1		
PCE	183.1	9.03	1,654	20.8%	0.25:0.75	87	257	344	16.4%	0.44:0.56	121	151	272

		Trip			AM Pe	ak-hour				PM Pea	ık-hour	hour		
Land Use	Units (ksf)	Rate (ksf)	Daily Trips	% of ADT	In:Out Ratio	In	Out	Total	% of ADT	In:Out Ratio	In	Out	Total	
Total	_	_	1,654	_	_	87	257	344	_	_	121	151	272	

Note:

ADT = Average Daily Traffic

ksf = thousand square feet

PCE = Passenger Car Equivalent

Would the project:

a) Conflict with a program plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities?

Less than significant impact. The project proposes to construct a delivery station building. The Fresno General Plan includes transportation policies related to transit, roadway, bicycle, and pedestrian facilities. The project site is located within Traffic Impact Zone (TIZ) II. TIZ II generally represents areas of the City currently built up and wanting to encourage infill development. The General Plan states that a TIS is required for development projected to generate 200 or more peak hour new vehicle trips. While the proposed project would result in 1,654 daily trips, the City Traffic Engineer determined that an additional traffic study was not required (See Appendix I). The General Plan includes policies that strive to reduce VMT and trips, and reduce VMT through infill development. As mentioned above, the VMT analysis prepared for the project determine that VMT for the project was less than the countywide average and city threshold for CMT per employee. Therefore, it was determined that the proposed project would not have a significant impact based on adopted VMT thresholds and the project is consistent with these policies.

Furthermore, the proposed project would provide sidewalk improvements along North Minnewawa Avenue, East Olive Avenue, and North Clovis Avenue and an easement along North Clovis Avenue for bicycle purposes. This would improve bicycle and pedestrian access in the project vicinity and further reduce VMT. Therefore, the proposed project would not conflict with a program plan, ordinance, or policy regarding bicycle facilities and impacts would be less than significant.

Transit services are provided to the City by Fresno Area Express (FAX). FAX Route 38 runs along the project site and in the project vicinity. With proposed pedestrian and bicycle improvements provided as part of the project, the proposed project would improve access to existing transit stops in the project area. Because the project is consistent with applicable General Plan policies related to roadway, bicycle, pedestrian, and transit facilities, impacts would be less than significant.

b) Would the project conflict or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b)?

Less than significant impact. SB 743 requires that relevant CEQA analysis of transportation impacts be conducted using a metric known as VMT instead of Level of Service (LOS). VMT measures how

¹ Recommended Trip Generation Rates based on User's operational information (employees/delivery drivers counts, shift structures, delivery schedules and anticipated line-haul truck schedules) and validation exercise.

much actual auto travel (additional miles driven) a proposed project would create on California roads. If the proposed project adds excessive car travel onto the roads, the proposed project may cause a significant transportation impact.

The State CEQA Guidelines were amended to implement SB 743, by adding Section 15064.3. Among its provisions, Section 15064.3 confirms that, except with respect to transportation projects, a proposed project's effect on automobile delay shall not constitute a significant environmental impact. Therefore, LOS measures of impacts on traffic facilities are no longer a relevant CEQA criteria for transportation impacts.

CEQA Guidelines Section 15064.3(b)(4) states that "[a] lead agency has discretion to evaluate a project's vehicle miles traveled, including whether to express the change in absolute terms, per capita, per household or in any other measure. A lead agency may use models to estimate a project's vehicle miles traveled, and may revise those estimates to reflect professional judgment based on substantial evidence. Any assumptions used to estimate used to estimate vehicle miles traveled and any revision to model outputs should be documented and explained in the environmental document prepared for the project. The standard of adequacy in Section 15151 shall apply to the analysis described in this section."

On June 25, 2020, the City of Fresno adopted CEQA Guidelines for Vehicle Miles Traveled Thresholds, dated June 25, 2020, pursuant to SB 743 to be effective of July 1, 2020. The thresholds described therein are referred to herein as the City of Fresno VMT Thresholds. The City of Fresno VMT Thresholds document was prepared and adopted consistent with the requirements of CEQA Guidelines Sections 15064.3 and 15064.7. The December 2018 Technical Advisory on Evaluating Transportation Impacts in CEQA (Technical Advisory) published by the Governor's Office of Planning and Research (OPR), was utilized as a reference and guidance document in the preparation of the Fresno VMT Thresholds.

The City of Fresno VMT Thresholds adopted a screening standard and criteria that can be used to screen out qualified projects that meet the adopted criteria from needing to prepare a detailed VMT analysis.

For projects that are not screened out, a quantitative analysis of VMT impacts must be prepared and compared against the adopted VMT thresholds of significance. The Fresno VMT Thresholds document includes thresholds of significance for development projects, transportation projects, and land use plans. These thresholds of significance were developed using the County of Fresno as the applicable region, and the required reduction of VMT (as adopted in the Fresno VMT Thresholds) corresponds to Fresno County's contribution to the statewide GHG emission reduction target. In order to reach the Statewide GHG reduction target of 15 percent, Fresno County must reduce its GHG emissions by 13 percent. The method of reducing GHG by 13 percent is to reduce VMT by 13 percent as well.

The City's adopted thresholds for development projects correspond to the regional thresholds set by the Fresno COG. For residential and non-residential (except retail) development projects, the adopted threshold of significance is a 13 percent reduction, which means that projects that generate

VMT in excess of a 13 percent reduction from the existing regional VMT per capita or per employee would have a significant environmental impact. Projects that reduce VMT by more than 13 percent are less than significant. For retail projects, the adopted threshold is any net increase in VMT per employee compared to existing VMT per employee.

Quantitative assessments of the VMT generated by a development project are determined using the COG Activity Based Model (ABM), which is a tour-based model.

VMT Memorandum

A VMT analysis was prepared to determine and evaluate the potential VMT impacts associated with the project. Based on the City's CEQA Guidelines for Vehicle Miles Traveled Thresholds, it was determined that a VMT analysis is required since the proposed project is expected to generate over 500 weekday daily trips, is not located within 0.5 mile of a High-Quality Transit Corridor and is over 50,000 square feet. The proposed project is required to be analyzed with the VMT per employee metric since it falls under the "other uses" category. Also, because the proposed project requires over 375 employees during typical operations, the proposed project was modeled through coordination with Fresno COG via the Fresno Council of Governments Activity Based Model (Fresno COG ABM). The proposed project generated VMT per employee was compared to the countywide average of 25.60 VMT per employee to determine if the proposed project VMT would exceed the City's significant threshold, which is 22.27 VMT (a 13 percent reduction from the existing countywide average). The proposed project's generated VMT per employee rate based on Fresno COG ABM was 16.86; 34 percent below the countywide average. As such the proposed project would not have a significant VMT impact based on City's adopted VMT thresholds.

The VMT analysis conducted for the proposed project is unique in the fact that a significant number of employees would not work within the proposed project building. Based on this supplementary analysis, the proposed project would not have a significant impact considering the delivery trips associated with the proposed project since the proposed project would result in an overall net decrease in daily VMT.

As further detailed in the VMT Memo, the proposed project would result in a net decrease of 4,763 daily VMT for employee commute trips compared to the countywide average and a net decrease of 889 family VMT associated with delivery operations for an overall net decrease of 5,652 VMT per day. As such, the proposed project would not have a significant impact based on a net change in VMT metric.

Because proposed operations are not currently reflected in the Institute of Transportation Engineers (ITE) Tip Generation Manual, 10th Edition, a custom trip rate was developed to more accurately analyze the potential VMT related impacts associated with the proposed project. This custom traffic generation estimate was developed from site specific information provided by the User; site capacity, employees required to operate the facility, shift structures, delivery schedules, assumed 10 percent reduction for transit/carpooling/active transportation, and anticipated delivery truck schedules. To validate the expected trip generation for the site, three similar existing facilities were surveyed, and trips rates calculated for comparison. Based on this validation, the proposed project is expected to generate 1,654 daily Passenger Car Equivalent (PCE) trips, a total of 46 AM commuter

peak-hour PCE trips (37 inbound and 9 outbound), and 108 PM commuter peak-hour PCE trips (73 inbound and 35 outbound).

The VMT per employee was calculated based on the proposed project's contribution toward countywide commute VMT divided by the proposed project's contribution toward an increase in the number of countywide employees. VMT statistics were calculated using trip tables and travel distance "skims" from Fresno COG ABM for both the No Project and With Project model runs and analyzed for 2019 and 2035 scenarios. The net difference in VMT between the With Project run and No Project run is the VMT attributable to the proposed project. This change includes both direct and indirect effects of the proposed project as trips are redistributed throughout the highway network.

The Fresno COG VMT Summary for the proposed project and the correspondence with staff is included in Appendix I. As shown, the proposed project VMT per employee rate based on Fresno COG ABM was determined to be 16.86. The proposed project VMT per employee is 34 percent lower than the countywide average of 25.60 VMT per employee and below the City's threshold of 22.27 VMT per employee. As such the proposed project does not have a significant VMT impact based on City's adopted VMT thresholds.

The VMT analysis concluded that proposed project VMT per employee would be 34 percent lower than the countrywide average of 25.60 VMT per employee, and below the City's threshold of 22.27 VMT per employee. Therefore, the proposed project would not have a significant impact based on the City's adopted VMT thresholds. Furthermore, the proposed project would result in a net decrease of 4,763 daily VMT for employee commute trips and a net decrease of 889 daily VMT associated with delivery operations for an overall net decrease of 5,652 VMT per day. As such, the proposed project would not have a significant impact based on a net change in VMT metric. As new delivery stations are opened and replace existing trips from existing delivery stations, an overall reduction in region-wide delivery VMT is expected.

As mentioned above, the VMT analysis prepared for the proposed project determined that project VMT per employee would be 34 percent lower than the countrywide average of 25.60 VMT per employee, and below the City's threshold of 22.27 VMT per employee. Therefore, the proposed project would not have a significant impact based on the City's adopted VMT thresholds. Furthermore, the proposed project would result in a net decrease of 4,763 daily VMT for employee commute trips and a net decrease of 889 daily VMT associated with delivery operations for an overall net decrease of 5,652 VMT per day. As such, the proposed project would not have a significant impact based on a net change in VMT metric. As new delivery stations are opened and replace existing trips from existing delivery stations, an overall reduction in region-wide delivery VMT is expected. Therefore, the proposed project would not conflict with or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b). Impacts would be less than significant.

c) Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?

Less than significant impact. The proposed project consists of the construction of a delivery service building. The proposed project design does not include any sharp curves or dangerous intersections.

Proposed driveways would seamlessly connect to the existing roadways along North Clovis Avenue, East Olive Avenue, and North Minnewawa Avenue. As such, the proposed project would not substantially increase hazards due to a geometric design feature or incompatible uses. Impacts would be less than significant.

d) Result in inadequate emergency access?

Less than significant impact. The proposed project consists of the construction of a delivery service building. Access to the site would be provided via two 30-foot driveways and one 24-foot driveway along East Olive Avenue, one 36-foot driveway along North Clovis Avenue, and one 20-foot driveway along North by Minnewawa Avenue. The driveway along North Minnewawa Avenue would be designated for EVA only. Additionally, the proposed project would include a minimum 25-foot fire lane around the building to allow for emergency access. All project driveways, fire lane, and overall internal circulation would comply with City of Fresno and Fresno Fire Department standards.

Mitigation Measures

None required.

2.1	Environmental Issues 8 Utilities and Service Systems Would the project:	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a)	Require or result in the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?				
b)	Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?				
c)	Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?				
d)	Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?				
e)	Comply with federal, State, and local management and reduction statutes and regulations related to solid waste?				

Setting

Utility Infrastructure

The project site is currently served by PG&E for electricity and natural gas. The proposed project is served by Bakman Water Company for potable water, by the City of Fresno DPU WMD for sewer and wastewater, by the City of Fresno Solid Waste Management Division, Mid-Valley Disposal for solid waste, and by AT&T for telecommunications.

Water Supply

Bakman Water Company (Bakman) oversees water distribution to the Rolling Hills and Southeast Fresno water districts. ⁹³ Bakman delivers water to approximately 1,800 connections serving 10,000 customers across 1,660 acres. Bakman currently has ten active wells, three standby wells, and three

⁹³ Bakman Water Company. Water Districts. Website: https://www.bakmanwater.com/ Accessed: December 38,2020.

inactive wells from which groundwater is pumped and transported to customers. In 2003, the groundwater pumping volume was 1,270 million gallons.

The Kings Subbasin groundwater aquifer has been classified as 'critically overdrafted' and the City is limited in surface water treatment capacities. However, the city is developing plans to expand surface water treatment capacities to reduce reliance on groundwater supplies.⁹⁴

During water shortage emergencies, many of the programs and projects in the UWMP are implemented to reduce demand, including the Water Shortage Contingency Plan (WSCP). The WSCP includes a staged plan to reduce water demands based on the type of water shortage the city is experiencing and can provide for a range of water shortages form 10 to 50 percent. ⁹⁵ The City of Fresno employs penalties, charges, and other enforcements on end uses under the plan. ⁹⁶ In the event of a supply interruption, the City has an agreement with the City of Clovis that discusses an intertie system between the two cities that could be used by either entity during an emergency. ⁹⁷

In June of 2014, Fresno's City Council adopted the City's Metropolitan Water Resources Management Plan, outlining required infrastructure for immediate-term, near-term, and long-term needed to meet projected water demands which will develop 25,000 AFY of recycled water by the year 2025.

Wastewater

The City of Fresno DPU WMD provides wastewater collection service to the County of Fresno. The City owns and operates the Fresno-Clovis Regional Wastewater Reclamation Facility (RWRF), and the North Fresno Wastewater Reclamation Facility (NFWRF). The RWRF has a wastewater treatment capacity of 80 million gallons per day (mgd) as an annual monthly average flow and 88 mgd as a maximum monthly average flow 98. The NFWRF has a permitted capacity of 0.71 mgd as an average monthly flow and 1.07 mgd as a maximum daily flow. 99 The City's master plan for the NFWRF calls for the expansion to an average monthly flow capacity of 2.25 mgd upon full development of the NFWRF service area.

Solid Waste

The City of Fresno Solid Waste Management Division provides solid waste collection services to the City of Fresno. Allied Waste Services (formerly Republic) is responsible for all commercial services north of Ashlan Avenue. Mid Valley Disposal is responsible for all commercial locations south of Ashlan Avenue, including the project site. Solid waste is transferred to two landfills within Fresno County. Table 21 shows the closest landfills to the project site with the remaining total remaining capacity and daily permitted capacity.

⁹⁴ City of Fresno. 2015. Urban Water Management Plan: System Supplies. Website: https://www.fresno.gov/publicutilities/wp-content/uploads/sites/16/2016/11/CityofFresno2015UWMP adopted.pdf Accessed: December 28, 2020.

⁹⁵ City of Fresno. 2015. Urban Water Management Plan: Water Shortage Contingency Plan. Website: https://www.fresno.gov/publicutilities/wp-content/uploads/sites/16/2016/11/CityofFresno2015UWMP_adopted.pdf Accessed: December 28, 2020.

⁹⁶ Ibid.

⁹⁷ City of Fresno. 2015. Urban Water Management Plan: System Supplies. Website: https://www.fresno.gov/publicutilities/wp-content/uploads/sites/16/2016/11/CityofFresno2015UWMP_adopted.pdf Accessed: December 28, 2020.

⁹⁸ Ibid.

⁹⁹ Ibid.

Table 21: Landfill Facility Detail

Landfill	Distance from Project Site	Remaining Capacity	Daily Permitted Capacity
American Avenue Landfill	25 miles	29,358,535 cubic yards	2,200 tons/day
City of Clovis Landfill	13 miles	7,740,000 cubic yards	2,000 tons/day
Source:			

2020 California Department of Recycling and Recovery (CalRecycle). Solid Waste Information System (SWIS) Facility Detail. 2020.

Would the project:

a) Require or result in the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?

Less than significant impact. The project site is located in an urban and developed area of the City of Fresno. Therefore, the proposed project would connect to existing water, wastewater, and stormwater infrastructure within the City. As described below under Impact 18(b), the City would have adequate water supplies to serve the proposed project. As such, the proposed project would not require the relocation or construction of new or expanded water facilities. Additionally, as described under Impact 18(c), the proposed project would be served by the existing wastewater treatment provider and would not require the construction of new or expanded wastewater facilities.

As mentioned previously, stormwater would be conveyed through the implementation of inlets, storm drains, and overland flow, which would drain into the ponding basin southwest of the project site. The construction of these stormwater support features would be required to comply with applicable federal, State, and local regulations. Finally, the proposed project would connect to existing natural gas lines located along East Olive Avenue, ¹⁰⁰ and existing power lines in the project vicinity. Natural gas and electricity connections would be coordinated with PG&E. As such, the proposed project would not require the relocation or construction of new water, wastewater treatment, stormwater drainage, electric power, natural gas, or telecommunications facilities. Therefore, impacts would be less than significant.

b) Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?

Less than significant impact. As described in the project-specific WSA and City of Fresno 2015 UWMP, there are sufficient water supplies to meet the growing demands of the City under normal, dry, and multiple dry years. Because the proposed project is included in the service area assumed as

134

¹⁰⁰ Pacific Gas and Electric (PG&E). Website: https://www.pge.com/en_US/safety/how-the-system-works/natural-gas-system-overview/gas-transmission-pipeline/gas-transmission-pipelines.page. Accessed February 21, 2021.

part of the 2015 UWMP, the proposed project would not result in insufficient water supplies during normal, dry, or multiple dry years. As such, impacts would be less than significant.

c) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?

Less than significant impact. As described above, the NRWRF has a permitted capacity of 80 mgd as an annual monthly average flow and 88 mgd as a maximum monthly average flow. Using an estimated wastewater generation rate of 150 GPD per 1,000 square feet of office space and 20 GPD per 1,000 square feet of warehouse space, is estimated that the proposed project would generate approximately 6,562 GPD of wastewater. ¹⁰¹ This estimate represents .008 percent of the permitted annual monthly average flow of 80 mgd at the NRWRF. Furthermore, the proposed project would be required to pay its fair share of applicable wastewater fees, as needed. Based on the estimated wastewater generation for the project and with payment of applicable fees, impacts related to wastewater capacity would be less than significant.

d) Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?

Less than significant impact. The City of Fresno is under contract with American Avenue Landfill to provide service. ¹⁰² The American Avenue Landfill has a daily permitted throughput capacity of 2,200 tons per day and a remaining capacity of 29,358,535 cubic yards per day. Using an industrial sector solid waste generation rate of 62.5 pounds per 1,000 square feet, the proposed project would generate an estimated 11,500 pounds of solid waste per day or 5.75 tons per day. 103,104 The proposed project's estimated maximum solid waste generation of 5.75 tons per day would represent 0.26 percent of the landfill's maximum daily permitted intake capacity for all customers. 105 Therefore, the proposed project's daily solid waste generation of 5.75 tons per day would be well within the permitted capacity of 2,200 tons per day for all customers of the American Avenue Landfill. Furthermore, consistent with AB 341 and AB 1826, the proposed project would be required to provide a recycling program that would divert recyclables and organic recyclable materials, such as yard trimmings, from landfills. Project waste diversion measures would contribute toward achieving a 50 percent waste diversion as mandated by the California Integrated Waste Management Act. As such, the proposed project would not generate solid waste in excess of State or local standards, or exceed the capacity of local infrastructure. Therefore, impacts would be less than significant.

-

Los Angeles County. 2006. CEQA Thresholds Guide. Exhibit M.2-12, Sewage Generation Factors. Website: https://planning.lacity.org/eir/CrossroadsHwd/deir/files/references/A07.pdf. Accessed February 23, 2021.

¹⁰² Personal Communication with Keith Hester, General Manager. Caglia Environmental. June 30, 2021.

 $^{^{103}}$ 184,000 square feet/1,000 = 184 x 62.5 pounds = 11,500 pounds per day

¹⁰⁴ California Department of Resources Recycling and Recovery (CalRecycle). Estimated Solid Waste Generation Rates. Industrial Sector Generation Rates. Website: https://www2.calrecycle.ca.gov/WasteCharacterization/General/Rates. Accessed June 3, 2021.

¹⁰⁵ 5.75/2,200 = .0026

e) Comply with federal, State, and local management and reduction statutes and regulations related to solid waste?

Less than significant impact. Solid waste disposal would follow the requirements of the franchised waste hauler, Mid-Valley Disposal, which must adhere to federal, State, and local statutes and regulations related to the collection of solid waste. The proposed project would comply with all State and local waste diversion requirements including FMC Chapter 6 Article 2, Waste Collection and Disposal. ¹⁰⁶ Because solid waste disposal would be compliant with federal, State, and local statutes and regulations, impacts would be less than significant.

Mitigation Measures

None required.

City of Fresno. Fresno Municipal Code (FMC). Chapter 6 Article 2, Waste Collection and Disposal. Website: https://library.municode.com/ca/fresno/codes/code_of_ordinances?nodeId=MUCOFR_CH6MUSEUT_ART2WACODI. Accessed December 30, 2020.

2.19	Environmental Issues 9 Wildfire If located in or near State Responsibility Areas or lan would the project:	Potentially Significant Impact ads classified o	Less than Significant Impact with Mitigation Incorporated as very high fire	Less than Significant Impact hazard seven	No Impact ity zones,
a)	Substantially impair an adopted emergency response plan or emergency evacuation plan?			\boxtimes	
b)	Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?				
c)	Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?				
d)	Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?				

Setting

A State Responsibility Area (SRA) refers to areas of the State in which the financial responsibility of preventing and suppressing fires has been determined pursuant to Section 4125, to be primarily the responsibility of the State. The project site is not located in a designated "Fire Hazard Severity Zone" in an SRA. 107 The closest designated "High" fire hazard zone is located approximately 42 miles to the southwest of the project site. A "Very High Fire Hazard Severity Zone" in a Local Responsibility Area (LRA) means an area designated by the Director of Forestry and Fire Protection pursuant to Government Code Section 51178 that is not an SRA. The project site is not located in a designated "Very High Fire Hazard Severity Zone" in an LRA. 108

Would the project:

a) Substantially impair an adopted emergency response plan or emergency evacuation plan?

¹⁰⁷ Office of the State Fire Marshal. 2008. FHSZ Maps. Website: https://osfm.fire.ca.gov/divisions/wildfire-planningengineering/wildland-hazards-building-codes/fire-hazard-severity-zones-maps/

¹⁰⁸ Ibid.

Less than significant impact. The proposed project is not located on or near an SRA or a FHSZ. Although this topic only applies to areas within an SRA or Very High FHSZ, out of an abundance of caution, the following information is provided:

As mentioned previously, while the City of Fresno has not adopted an EOP. The City's Noise and Safety Element (2014) outlines policies related to hazards, safety, and emergency response, such as adequate access for emergency vehicles in all new development, including adequate widths, turning radii, hard standing areas, and vertical clearance. The proposed project would not result in permanent road closures or lane narrowing that could impair an evacuation route. As a result, the proposed project would not impair emergency evacuation because access to the main evacuation routes in the project area, North Clovis Avenue, East Olive Avenue and North Minnewawa Avenue would still be accessible. The proposed project would be consistent with the most recent version of the California Fire Code and Building Code, which requires that roadways be at least 20 feet wide. Access to the site would be provided via one 30-foot driveway and one 40-foot driveway along East Olive Avenue, one 30-foot driveway and one 40-foot driveway along North Clovis Avenue, and one 30-foot driveway along North Minnewawa Avenue. The proposed project would provide a minimum 25-foot fire lane around the building to allow for emergency access. Each entrance has a width compliant with the California Fire Code. Neither construction nor operation of the proposed project would exacerbate wildfire risks. Therefore, impacts would be less than significant.

b) Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?

Less than significant impact. The project site is located within the City of Fresno and the area surrounding the project site is urbanized developed and without steep slopes. As described under Impact 7, Geology and Soils, the project site is located in an urban and developed area of the City of Fresno, and is located on two relatively flat parcels. Due to the flat topography of the site and existing development in the project vicinity, the project is not susceptible to landslides.

According to the Fresno-Drummond Air Monitoring site (approximately 4 miles southwest from the project site), the average wind speed in Fresno in 2020 ranged from 1 to 15 mph and the highest hourly wind speed ranged from 1 to 15 mph. ¹¹⁰ These wind speeds are not considered excessive. In addition, the project site has not previously experienced wildfire. Given that the project site is not located in or near an area of steep terrain or historical wildfire burn nor experiences consistent high winds, the project site would not be prone to greater wildfire risk.

The project site is not located in a Severe or Very High Fire Hazard Severity Zone. ¹¹¹ The closest designated "High" fire hazard zone is located approximately 42 miles to the southwest of the project

_

¹⁰⁹ City of Fresno. 2014. Fresno General Plan. Noise and Safety Element. Website: https://www.fresno.gov/darm/wp-content/uploads/sites/10/2019/07/ConsolidatedGP6182020.pdf Accessed January 19, 2021.

¹¹⁰ California Air Resources Board (ARB). 2020. AQMIS. Website: https://www.arb.ca.gov/aqmis2/display.php?report=SITE31D&site=2013&year=2020&mon=12&day=16&hours=all&statistic=HVAL &ptype=met¶m=SWINSPD_mph. Accessed January 19, 2021.

Office of the State Fire Marshal. 2008. FHSZ Maps. Website: https://osfm.fire.ca.gov/divisions/wildfire-planning-engineering/wildland-hazards-building-codes/fire-hazard-severity-zones-maps/. Accessed January 19, 2021.

site. In addition, as indicated in Impact 15, Public Services, Impact(a), the proposed project would be adequately served in terms of fire protection services by the Fresno Fire Department. Furthermore, proposed structures would be required to comply with the California Fire Code with regard to emergency/fire access and use of building materials that would limit the spread of wildfire to the greatest extent possible. Therefore, impacts related to exposure of future occupants to pollutant concentrations from a wildfire or uncontrolled spread of wildfire would be less than significant.

c) Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?

Less than significant impact. The project site is located in a developed area surrounded by existing roadways. Existing vegetation within the project site includes eucalyptus trees in the northern portion, most of which would be removed as part of the proposed project implementation, and would therefore reduce fire risk associated with this species. As a result, the proposed project would not require fuel breaks as the project site is not located in an area with dense vegetation that would encroach on the project development leading to an increased fire risk.

The project site is surrounded by existing East Olive Avenue, North Clovis Avenue, and North Minnewawa Avenue, all of which would be maintained by the City. The proposed project would not require emergency water sources, because the project is located in a developed area and potable water is currently provided by the Bakman Water Company. New electrical power and natural gas lines on and connecting to the project site would be installed below ground, minimizing potential ignition and related fire risk above ground, at the project site according to the CBC and Uniform Fire Code. Therefore, impacts related to infrastructure that exacerbates fire risk would be less than significant.

d) Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?

Less than significant impact. As discussed under Impact 7, Geology and Soil, landslide impacts, and soil collapse are unlikely given the existing project site soil conditions. Additionally, the project site has also not been affected by previous wildfires that could have resulted in drainage changes or loss of vegetation leading to greater risk of landslides. As previously mentioned, the existing trees would be removed as part of the project, further reducing the associated wildfire risk for future residents. Therefore, impacts related to flooding and landslide hazards due to post-fire slope instability or drainage changes would be less than significant.

Mitigation Measures

None required.

2.2	Environmental Issues O Mandatory Findings of Significance	Potentially Significant Impact	Less than Significant Impact with Mitigation Incorporated	Less than Significant Impact	No Impact
a)	Does the project have the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory?				
b)	Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)?				
c)	Does the project have environmental effects, which will cause substantial adverse effects on human beings, either directly or indirectly?				

a) Does the project have the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of the major periods of California history or prehistory?

Less than significant impact with mitigation incorporated. The proposed project may result in impacts associated with air quality, biological resources, cultural resources, geology and soils, and hazards and hazardous materials that would be significant if left unmitigated. Implementation of the mitigation measures outlined in this Draft IS/MND would reduce all impacts to a less than significant level.

b) Does the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)?

Less than significant impact with mitigation incorporated. Implementation of mitigation as outlined in this Draft IS/MND would reduce all potentially significant impacts to less than significant. Given that all impacts to a less than significant level with mitigation and given the proposed project's size, the incremental effects of the proposed project are not considerable relative to the effects of past, current, and probable future projects. Therefore, the proposed project would not result in cumulatively considerable impacts, and impacts would be less than significant with mitigation incorporated.

c) Does the project have environmental effects, which will cause substantial adverse effects on human beings, either directly or indirectly?

Less than significant impact with mitigation incorporated. As described throughout the preceding checklist portion of this Draft IS/MND, the proposed project would not have any substantial environmental effects on human beings, either directly or indirectly. All impacts identified throughout this document either do not require mitigation or would be mitigated to levels that are less than significant. In addition, the proposed project would be required to comply with existing regulations as discussed throughout the Draft IS/MND. The proposed mitigation measures, once implemented, and compliance with existing regulations would ensure that no substantial adverse effects on human beings would result from the proposed project. Therefore, impacts would be less than significant with mitigation incorporated.

Mitigation Measures

General Plan MEIR MM AES-1, MM AES-3, MM AES-4, MM CUL-1, MM CUL-2, MM CUL-3, and MM CUL-4, and project-specific MM AIR-1, MM BIO-1, MM BIO-2, MM BIO-3, MM BIO-4, MM BIO-5, MM BIO-6, MM GEO-1, MM HAZ-1, MM HAZ-2, PDF GHG-1, PDF GHG-2.



SECTION 3: LIST OF PREPARERS

FirstCarbon Solutions 7726 N. First Street, # 413 Fresno, CA 93720

Project Director	Mary Bear
Project Manager	Angela Wolfe
Assistant Project Manager	Brittany Hager
Environmental Analyst	Madelyn Dolar
Environmental Analyst	Spencer Pignott
Biologist	
Cultural Resources Leader	Dana DePietro, PhD, RPA
Archaeologist	Stefanie Griffir
Archaeological Monitor	
Senior Noise Scientist	Philip Ault, MS, LEED™ AF
Air Quality Scientist	Kimber Johnsor
Biologist	Robert Carrol
Environmental Services Analyst	Eric Soyche
Publications Manager	
Word Processor	Melissa Ramire
GIS/Graphics	Karlee McCracker

John Pape Consulting, LLC—Technical Subconsultant P.O. Box 8672

Fresno, CA 93747 Phone: 559.426.6181

Fax: 559.426.6169

 ${\bf Akel\ Engineering\ Group, Inc.--Technical\ Subconsultant}$

7433 North First Street, Suite 103

Fresno, CA 93720 Phone: 559.436.0600 Fax: 559.436.0622

