4.8 HAZARDS AND HAZARDOUS MATERIALS

4.8.1 EXISTING CONDITIONS

Fundamentals

Hazards

This description of existing conditions focuses on hazards from fire and overhead power lines, as well as hazardous materials and wastes. A hazard is a situation that poses a level of threat to life, health, property, or the environment. Hazards can be dormant or potential, with only a theoretical risk of harm. However, once a hazard becomes active, it can create an emergency. A hazardous situation that has already occurred is called an incident. Emergency response is action taken in response to an unexpected and dangerous occurrence to mitigate its impact on people, structures, and/or the environment. Emergency situations can range from natural disasters to problems with hazardous materials and transportation incidents.

Hazardous Materials and Wastes

Hazardous materials include but are not limited to hazardous materials, hazardous substances, and hazardous wastes, as defined in Section 25501 and Section 25117, respectively, of the California Health and Safety Code. A hazardous material is any material that, because of its quantity, concentration, or physical or chemical characteristics, poses a significant present or potential hazard to human health and safety or to the environment if released; and any material that a handler or an administering regulatory agency under Health and Safety Code Section 25501 has a reasonable basis for believing would be injurious to the health and safety of persons or harmful to the environment.

Various properties of a substance may cause that substance to be considered hazardous, including:

- Toxicity—causes human health effects;
- Ignitability—has the ability to burn;
- Corrosivity—causes severe burns or damage to materials; and
- Reactivity—causes explosions or generates toxic gases.

Hazardous Substances

A hazardous substance can be any biological, natural, or chemical substance, whether solid, liquid, or gas, which may cause harm to human health. Hazardous substances are classified based on their potential health effects, whether acute (immediate) or chronic (long-term). Dangerous goods are classified based on immediate physical or chemical effects, such as fire, explosion, corrosion, and poisoning. An accident involving dangerous goods could seriously harm human health or damage property or the environment. Harm to human health may happen suddenly (acute), such as dizziness, nausea, and itchy eyes or skin; or it may happen

gradually over years (chronic), such as dermatitis or cancer. Some people can be more susceptible than others. Hazardous substances and dangerous goods can include antiseptic used for a cut, paint for walls, a cleaning product for the bathroom, chlorine in a pool, carbon monoxide from a motor vehicle, fumes from welding, vapors from adhesives, or dust from cement, stone, or rubber operations. Such hazardous substances can make humans very sick if they are not used properly.

Hazardous Wastes

Hazardous waste is any hazardous material that is to be discarded, abandoned, or recycled. The criteria that define a material as hazardous also define a waste as hazardous. Specifically, materials and waste may be considered hazardous if they are poisonous (toxic); can be ignited by open flame (ignitable); corrode other materials (corrosive); or react violently, explode, or generate vapors when mixed with water (reactive). Soil or groundwater contaminated with hazardous materials above specified regulatory State or federal thresholds is considered hazardous waste if it is removed from a site for disposal. If handled, disposed of, or otherwise treated improperly, 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. The 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.

Hazardous Materials Listing

The Cortese List is a list of known hazardous materials or hazardous waste facilities that meet one or more of the provisions of Government Code Section 65962.5, including:

- The list of hazardous waste and substances sites from the DTSC EnviroStor database.1
- The list of Leaking Underground Storage Tank (LUST) sites by county and fiscal year from the California State Water Resources Control Board (State Water Board) GeoTracker database.[2]
- The list of solid waste disposal sites identified by the State Water Board with waste constituents exceeding hazardous waste levels outside the waste management unit.[3]
- The list of active cease-and-desist orders and cleanup and abatement orders from the State Water Board.[4]
- The list of hazardous waste facilities subject to corrective action pursuant to Section 25187.5 of the Health and Safety Code, as identified by the DTSC.[5]

Asbestos

Asbestos is the name given to a number of naturally occurring fibrous silicate minerals that have been mined for their useful properties such as thermal insulation, chemical and thermal

stability, and high tensile strength. The three most common types of asbestos are chrysotile, amosite, and crocidolite. Chrysotile, also known as white asbestos, is the most common type of asbestos found in buildings. Chrysotile makes up approximately 90 to 95 percent of all asbestos contained in buildings in the United States. Exposure to asbestos is a health threat; exposure to asbestos fibers may result in health issues such as lung cancer, mesothelioma (a rare cancer of the thin membranes lining the lungs, chest, and abdominal cavity), and asbestosis (a non-cancerous lung disease that causes scarring of the lungs). Exposure to asbestos can occur during demolition or remodeling of buildings that were constructed prior to the 1977 ban on asbestos for use in buildings. Exposure to naturally occurring asbestos can occur during soil-disturbing activities in areas with deposits present. Asbestos can also be found in non-building structures such as pavement and utility pipes.

Lead

Lead is a naturally occurring element found in small amounts in the earth's crust. While it has some beneficial uses, it can be toxic to human and animals, causing health effects.[7] Lead is known to cause a range of health effects, from behavioral problems and learning disabilities, to seizures and death. Exposure to building materials containing lead, such as lead-based paint, during land use development activities can occur during demolition of older buildings. Children exposed to lead can suffer from a variety of symptoms, including lowered IQ, damage to the brain and nervous system, learning and behavioral difficulties, slowed growth, hearing problems, and headaches. Adults exposed to lead can suffer from reproductive complications, high blood pressure and hypertension, nerve disorders, memory and concentration challenges, and muscle and joint pain.[8] Federal Air pollutants are regulated at the national, state, and air basin or county level; each agency has a different level of regulatory responsibility. The EPA regulates at the national level. The ARB regulates at the State level. The South County Air Quality Management District regulates at the air basin level.

Phase I Environmental Site Assessment

A Phase I Environmental Site Assessment (Phase I ESA) was prepared for the Project, which is provided as Appendix J (J2Environmenal LLC 2023a). In accordance with industry standard practice, the Phase I ESA was developed using a comprehensive review of the relevant database record search, as well as historical and aerial photographs and maps, along with site reconnaissance, and owner interviews.

As discussed more fully therein, the primary goal of the Phase I ESA was to gather data about any potential Recognized Environmental Condition(s) (RECs) associated with the Project Site's current and past use. A REC is defined as "the presence or likely presence of hazardous substances or petroleum products in, on or at a property: (1) due to a release to the environment; (2) under conditions indicative of a release to the environment; or (3) under conditions that pose a material threat of a future release to the environment."

Two additional categories of RECs were evaluated:

1. Controlled Recognized Environmental Condition (CREC): A CREC is described as "a recognized environmental condition that involves a past release of hazardous

substances or petroleum products that has been addressed to the satisfaction of the applicable regulatory authority, with hazardous substances or petroleum products allowed to remain in place *subject to the implementation of required controls* (e.g., property or activity use limitations (AULs), institutional controls, or engineering controls)."

2. Historic Recognized Environmental Condition (HREC): An HREC is described as "a past, regularly reported, release of any hazardous substances or petroleum products that has occurred in connection with the property and has been addressed to the satisfaction of the applicable regulatory authority or meeting unrestricted residential use criteria established by a regulatory authority, *without subjecting the property to any required controls."*

For the reasons set forth therein and discussed further below, the Phase I ESA determined that "No further environmental investigation relative to RECs is warranted at this time."[1]

Existing Land Uses

The Project Site consists mostly of undeveloped open space. No buildings are currently located within the Project Site. There is a paved access road within the western portion of the Project Site that connects to Santa Ana Canyon Road in the north. There are also dirt access roads throughout the Project Site (NETR Online 2024a).

The topography within the Project Site consists of rolling hills and several steep sided hilltops and ridgelines located in the eastern and western portions of the Project Site. The Project Site is situated along Deer Canyon, which drains to the north towards the Santa Ana River with canyon walls ascending to the east and west (Group Delta 2023a).

Among other things, the Project would require the removal of an existing paved roadway and an existing storm drain inlet with headwall and wing walls. Given the age of these existing facilities, it is possible asbestos and/or lead-based paint could be present in these demolition materials.

Historical Land Uses

According to historic aerial imagery going back to 1938 and other data sources evaluated, it does not appear that the Project Site has been previously developed with urban uses. The northwestern portion of the Project Site appears to have been used as an orchard and/or for agricultural purposes commencing about 1938 and continuing for decades, until at least 1960 (J2 Environmental 2023a). The groves were subsequently removed and these areas of the Project Site were regraded.

[1] The only other recommendation noted related to an abandoned light-duty pickup truck on a portion of the Project Site. The Phase I ESA recommended that it be "properly removed and disposed" including properly considering and addressing any potential releases of fuel or otherwise that may occur upon removal.

Historical aerial photographs indicate previous grading was performed along the eastern boundary of the Project Site, in the vicinity of the dirt access road, which appears to be associated with realigning Santa Ana Canyon Road to facilitate space for the SR-91.

Site Reconnaissance Results

As part of the Phase I ESA, site visits were conducted by the technical consultant. Notable observations within the Project Site include: an abandoned pick-up truck located in a remote portion of the east-central part of the Project Site; five, 55-gallon drums containing non-hazardous waste (soil cuttings and mud) that were a byproduct of the 2023 geotechnical borings that were collected for the Project; and a small area of approximately 15 feet by 10 feet of deposited discolored soil. The five, 55-gallon drums have since been removed and disposed of in accordance with all applicable regulatory requirements.

As detailed in the Phase I ESA, no significant environmental concerns were observed during the site reconnaissance.

Records Search Results

An Environmental Data Resources, Inc. Radius Map Report (EDR) records search was commissioned for the Project as a part of the Phase I ESA. The EDR searched federal, State, and local databases for the Project Site and surrounding area and focused on key substantive criteria including the reported presence of underground storage tanks (USTs), above ground storage tanks (ASTs), or leaking USTs (LUSTs) on or near the Project Site; reported soil or groundwater contamination at or near the Project Site; and whether there is evidence of the use of chlorinated hydrocarbons (e.g., tetrachloroethylene, PCE) or liquid fuel hydrocarbons (e.g., gasoline or diesel) at the Project Site.

A portion of the Project Site (where the single-family residential component would be located) was listed in two databases. The two databases consist of the California Integrated Water Quality System (CIWQS) database compiled by the State Water Resources Control Board, and the California Environmental Reporting System (CERS) database maintained by the California Environmental Protection Agency (Cal/EPA). The two listings relate to a Section 401 Water Quality Certification that was issued for the previous Stonegate Development that was pursued for a portion of the Project Site but that was never implemented. Thus, these records do not constitute an environmental hazard.

The Project Site was not identified on any hazardous material-related California or Federal databases, including facilities that were large-quantity generators (LQGs) of hazardous waste, holders of stormwater and wastewater discharge permits, and sites with USTs and ASTs.

In addition to the above findings regarding the Project Site, other off-site facilities were listed in the databases available to the technical consultant preparing the Phase I ESA (J2Environmental). Of these facilities, the most significant was the HREC that involved the Chevron Service Station, located at 8000 Santa Ana Canyon Road approximately 2,000 feet northeast and down-gradient of the Project Site. This facility was listed in various UST

databases related to the installation and use of three, 12,000-gallon gasoline USTs. All three gasoline USTs were "active" as of May 1993. A leak was reported, and a LUST case opened in September 2009, but the case was closed in October 2010, with "no further action" (NFA) required. Due to the distance from the Project Site, its location down gradient of the Project Site, and because of the closure with NFA of the LUST case, this facility does not currently represent a significant environmental threat to the Project Site.

In addition, listed in the databases were four other facilities which were relatively close (i.e., less than 1,400 feet) to the Project Site. These four facilities consisted of: Charlotte Knighton (approximately 460 feet south-southwest, at 180 South Possum Hollow), Sandra Batina (approximately 500 feet southeast, at 277 South Raspberry Lane), Vons (approximately 830 feet east-northeast, at 8010 East Santa Ana Canyon Road), and Ritz Cleaners (approximately 1,060 feet east-northeast, at 8018 East Santa Ana Canyon Road). None of these were considered to be a substantial environmental threat for a number of reasons, including their respective distances from the Project Site, no records of hazardous material releases at any of these facilities, each of these facilities' location relative to the Project Site, and/or the assumed regional groundwater flow direction (towards the Santa Ana River to the northwest).

Soils Testing

Given the past agricultural uses on-site, soils testing was conducted in 2023 by a qualified technical consultant (J2Environmental) (Appendix J). As detailed more fully therein, the focus of this analysis was to assess residential concentrations (if any) from using organochlorine pesticides and/or arsenic during agricultural activities that were apparent in historic aerial photographs. The assessment involved (1) collecting soil samples, (2) submitting those samples for analysis at a State-certified laboratory, (3) reporting results of this laboratory analysis with respect to acceptable standards, and (4) providing recommendations based on the outcome of this analysis.

As discussed more fully therein and below, the analysis concluded that (1) any residual organochlorine pesticides that may be located in portions of the Project Site do not appear to be a human health risk. However, (2) arsenic may be of concern, especially during exposure from earth moving activities in the northern portion of the Project Site. Therefore, precautions to limit soil intake (i.e., dust masks, washing of arms, hands and face) by construction workers was recommended.

Fire Hazards

Wildfire Basics

A wildfire is a non-structural fire that occurs in vegetative fuels, not including prescribed fires.[2] Wildfires can occur in undeveloped areas and spread to urban areas where the

[2] Prescribed fires, also known as controlled burns, refer to the controlled application of fire by a team of fire experts under specified weather conditions to restore health to ecosystems that depend on fire and meet various land management objectives.

landscape and structures are not designed and maintained to be resistant to ignition. The potential for wildland fires represents a hazard where development is adjacent to open space or within close proximity to wildland fuels and/or designated Fire Hazard Severity Zones. Steep hillsides and varied topography can also contribute to the risk of wildland fires.

There have been instances during which wildland fire transitioned to urban fire, whereby structures that were receptive to ignition near a wildfire event caught fire. Structure ignition depends on a variety of factors and can be prevented to a large degree through a system of protective features including fire-resistive landscapes adjacent to structures, application of ignition resistive materials and methods, and the provision of suitable infrastructure for firefighting purposes.

Fire Hazard Severity Zone Designations

Fire hazard severity zones identify the potential risk associated with wildfire. The California Department of Forestry and Fire Protection (Cal FIRE) identifies areas in the Very High Fire Hazard Severity Zone (VHFHSZ) as locations at greatest risk of wildfire. Developments in these areas are required to comply with additional requirements such as the use of less flammable building materials to reduce wildfire risk.

A State Responsibility Area (SRA) is an area in the state where the State of California has the primary financial responsibility for the prevention and suppression of wildland fires. A Local Responsibility Area (LRA), which includes portions of incorporated cities with identified wildfire hazard zones, falls to local governments in terms of the primary financial responsibility for the prevention and suppression of wildland fires.

According to the most recent mapping available, the entire Project Site is located within a VHFHSZ within an LRA (City of Anaheim 2024a, CALFIRE 2011a). Fire hazard designations are based on topography, vegetation, and weather, amongst other factors.

A VHFHSZ designation does not indicate that an area is not safe for development. Rather, the VHFHSZ designation simply indicates that specific fire protection features that minimize structure vulnerability would be required for projects proposed in such a zone. For example, the Project's buildings would be required to be built to comply with all applicable requirements and standards including those set forth in Chapter 7A of the California Building Code, Chapter 49 of the California Fire Code, and Section R337 of the California Residential Code as adopted and amended by the City of Anaheim. The Project Site and other areas that have a VHFHSZ designation would also be under the requirements of the California Minimum Fire Safe Regulations as amended.

Chapter 7A of the California Building Code includes enhanced ignition-resistant construction standards addressing roofs, eaves, exterior walls, vents, appendages, windows, and doors. These standards result in hardened structures that have been proven to perform at high levels (resist ignition) during the typically short duration of exposure to burning vegetation from wildfires.

Historic Wildfire Events Near the Project Site

According to historic wildfire mapping, the Project Site was subject to wildfire events in the past, including: the 1948 Green River Fire; the 1967 Paseo Grande Fire; and the 1982 Gypsum Fire. There have also been wildfires in recent history that have occurred in the vicinity of the Project Site, including: the 1980 Owl Fire; the 2002 Green Fire; the 2002 Evening Fire; the 2006 Sierra Fire; the 2007 241 Fire; the 2008 Freeway Complex Fire; the 2017 Canyon I Fire; the 2017 Canyon II Fire; and the 2020 Blue Ridge Fire (Anderson et al 2024a). The Preliminary Fire Protection Plan, prepared for the Project and discussed further in Section 4.18, Wildfire, of this Draft EIR, found that the areas north and east of the Project Site qualify as historic fire corridors and that the Project Site itself also likely qualifies as a historic fire corridor due to the number of fires in the area over the past century. A historic fire corridor is an area that has burned in a past wildfire event. Once a wildfire sparks in these historic fire corridor areas, fire can spread quickly due to topography and other conditions. According to the Preliminary Fire Protection Plan, a major fire incident occurs approximately every 25 years, with a range from 15 to 35 years between large fires (Fire Safe Planning Solutions 2024a).

Wildfire Environment in and Near the Project Site

Fire environments are dynamic and are shaped by many factors and site characteristics. Areas of naturally vegetated open space, like the Project Site and areas to the east and south of the Project Site, contain conditions that are favorable to wildfire spread. The three major components of the fire environment are topography, vegetation, and climate. The makeup of each of these components and their interactions with each other determines the potential characteristics and behavior of a fire at any given moment.

Topography

Topography influences fire risk by influencing fire spread rates. Typically, steep terrain results in faster fire spread upslope and slower spread down slope. Terrain that forms a funneling effect, such as canyons, chimneys, chutes, or saddles on the landscape can result in especially intense fire behavior. Conversely, flat terrain often has little effect on fire spread, resulting in fires that are influenced more so by vegetation and wind.

The topography within the Project Site consists of rolling hills and several steep sided hilltops and ridgelines located in the eastern and western portions of the Project Site. The Project Site is situated along Deer Canyon, which drains to the north towards the Santa Ana River with canyon walls ascending to the east and west (Group Delta 2023a). The Santa Ana River is located approximately 1/8 mile north of the Project Site, which contains areas of dense vegetation, some of which has burned during past wildfire events.

Vegetation

The vegetation within an area affects fire behavior. For example, vegetation communities that are dominated with non-native grass species often become seasonally prone to ignition. These vegetation communities produce lower intensity, higher spread rate fires. In

comparison, sage scrub can produce higher heat intensity and higher flame lengths under strong, dry wind patterns, but does not typically ignite or spread as quickly as light, flashy grass fuels.

A variety of vegetation types occur in the Project Site, including the following vegetation communities: sagebrush – black sage scrub; sagebrush – black sage scrub/ruderal; coyote brush scrub; toyon – sumac chaparral; toyon – sumac chaparral/ruderal; ruderal; disturbed ruderal; coastal freshwater marsh; poison oak scrub; southern willow scrub; mulefat scrub; southern coast live oak riparian forest; Mexican elderberry woodland; non-native woodland; xeric cliff face; developed areas; and disturbed areas (Psomas 2024c). To varying degrees, the vegetation communities within the Project Site are prone to burn during wildfire events.

Within the Project Site the orientation of the landscaping results in differences in vegetation types. For example, the north aspect of hills in the Project Site receives less direct sunlight and therefore retains more moisture which leads to thicker vegetation. South aspects of hills in the Project Site are the exact opposite, moisture is limited, and growth is sparer (Fire Safe Planning and Solutions 2024a).

Climate

The Project Site and vicinity, like all of Southern California and Orange County, is subject to seasonal weather conditions that can increase the likelihood of fire ignition. The climate at the Project Site is influenced by the Pacific Ocean and a seasonal, migratory subtropical high-pressure cell known as the "Pacific High." Wet winters and dry summers with mild seasonal changes characterize the Southern California climate. This climate pattern is occasionally interrupted by extreme periods of hot weather, winter storms, or dry, easterly Santa Ana winds.

In addition to climatic conditions that are already favorable to promoting wildfire, global climate change is also playing an increasing role in the local, regional, and statewide fire dynamics. California has experienced an increase in extreme wildfire behavior in recent years, which has led to substantial loss of life and property. Wildfire events in California are becoming larger and more severe. Some portion of this change in wildfire behavior is attributable to climate change (Brown at al 2023a). New research has found that the area burned by wildfires during summer in California has increased fivefold since 1971 because of more arid conditions caused by climate change (Harvey 2023a). Looking into the future, by 2100 temperatures are expected to increase in California by an average of somewhere between 5.6 and 8.8 degrees Fahrenheit from 2019 baseline conditions (California EPA 2024a).

Wildfire Scenario Modeling

In accordance with applicable CEQA requirements, as further discussed by relevant case law such as *League to Save Lake Tahoe Mountain Area Preservation Foundation v. County of Placer* (2022) 75 Cal.App.5th 63, the wildfire scenario modeling described in this Draft EIR and attached appendix provides a reasonable explanation under modeled circumstances of how the Project would affect the ability of Project residents, employees, visitors and other users

to evacuate and emergency responders' ability to access the Project Site vicinity. It also takes into appropriate account emergency access and evacuation considerations in the cumulative context.

During the preliminary design of the Project, wildfire scenario modeling was conducted for the Project (Fire Safe Planning Solutions 2024a). The results of the wildfire scenario modeling were used to develop the Project's Preliminary Fire Protection Plan, which is discussed in more detail below as well as in Section 4.18, Wildfire, of this Draft EIR.

The inputs and the scenarios that were modeled included a variety of reasonable worst-case fire conditions, including a variety of ignition points, and strong off-shore and on-shore wind events during times of the year when vegetation near the Project Site would be dry and humidity would be low. In addition, the modeling incorporated a conservative estimate as to occupancy and cumulative conditions.

Before the modeling was conducted, the technical assumptions and other relevant inputs for the fire modeling were provided to staff from Anaheim Fire and Rescue and the City for review and approval. As discussed further therein, below and in Section 4.18, Wildfire, the Preliminary Fire Protection Plan provides assessment results and objective defensible space criteria for the Project that are equal to or greater than the risk encountered in a reasonable worst-case scenario related to wind, ignition point, and vegetation conditions (Fire Safe Planning Solutions 2024a).

4.8.2 REGULATORY SETTING

Federal

Resource Conservation and Recovery Act

The United States Environmental Protection Agency (USEPA) is responsible for implementing and enforcing federal laws and regulations pertaining to hazardous materials. The Federal Resource Conservation and Recovery Act (RCRA) was enacted in 1976 and mandated a national waste management program. Under the RCRA regulations, as established by the USEPA, hazardous wastes must be tracked from the time of generation to the point of disposal. The RCRA program sets standards for hazardous waste treatment, storage, and disposal, which is intended to have hazardous wastes managed in a manner that minimizes the present and future threat to the environment and human health. At a minimum, each generator of hazardous waste must register and obtain a hazardous waste activity identification number. If hazardous wastes are stored for more than 90 days, or treated or disposed of at a facility, any treatment, storage or disposal unit must be permitted under RCRA. USEPA has largely delegated responsibility for implementing the RCRA program in California to the Department of Toxic Substances Control (DTSC), an agency within Cal/EPA, which implements this program through the California Hazardous Waste Control Law (discussed below).

Toxic Substances Control Act

The Toxic Substances Control Act of 1976 (15 USC Section 2601) gives the USEPA the ability to track 75,000 industrial chemicals currently produced in or imported into the United States. The USEPA repeatedly screens these chemicals and requires reporting or testing of those that may pose an environmental or human health hazard. The USEPA also has the ability to ban the manufacture and import of chemicals that pose an unreasonable risk. The USEPA tracks thousands of new chemicals that are developed each year with either unknown or dangerous characteristics. The production, importation, use, and disposal of these toxic substances is regulated by the USEPA, as necessary, to protect human health and the environment.

Accidental Release Prevention Program

Title 40, Part 68, of the Code of Federal Regulations (CFR) is the federal Accidental Release Prevention Program that lists regulated toxic and flammable substances and sets requirements concerning the prevention of accidental releases. It sets threshold quantities of regulated substances at which owners or operators of a stationary source are required to prepare Risk Management Plans. These Risk Management Plans must contain an assessment of the risks for accidental release, prevention measures, emergency response procedures, employee training, record keeping, and incident investigations.

Federal Occupational Safety and Health Act

Federal worker safety and health laws contain provisions with respect to hazardous materials management. The applicable federal law is the Occupational Safety and Health Act of 1970, as amended, which is implemented by the Occupational Safety and Health Administration (OSHA) of the U.S. Department of Labor (29 United States Code [USC], sec. 651-678). Federal OSHA requirements, set forth in 29 Code of Federal Regulations Section 1910, et. seq., are designed to promote worker safety, worker training, and worker right-to-know and do so by implementing and enforcing federal laws and regulations that address worker health and safety. OSHA requires specific training for hazardous materials users and handlers, provision of information (procedures for personal safety, hazardous materials storage and handling, and emergency response) to employees who may be exposed to hazardous materials, and acquisition of material safety data sheets from materials manufacturers. For example, a significant component of the federal OSHA regulations is the requirement that specified employers implement the OSHA Hazard Communication Standard (HCS), to provide information to employees about the existence and potential risks of exposures to hazardous substances in the workplace. As part of the HCS, employers must (1) obtain material safety data sheets (MSDSs) from chemical manufacturers which describe the risks as well as identify the types and handling requirements of hazardous materials used in given areas; (2) make the MSDSs available to their employees; (3) label chemical containers in the workplace; (4) develop and maintain a written hazard communication program; (5) and develop and implement programs to train employees about hazardous materials. Employee training must include response and remediation procedures for any hazardous materials releases and exposures.

Superfund Amendments and Reauthorization Act (SARA) and the Emergency Planning and Community Right-to-Know Act (SARA Title III)

The Superfund Amendments and Reauthorization Act (SARA) relates primarily to emergency management of accidental releases and requires annual reporting of continuous emissions and accidental releases of specified compounds that are compiled into a nationwide Toxics Release Inventory. The Emergency Planning and Community Right-to-Know Act of 1986 (42 USC Section 11001, *et seq*.)(SARA Title III) was created to help communities plan for chemical emergencies. It requires facilities to report on the storage, use, and releases of hazardous substances to federal, State, and local governments. The Community Right-to-Know provisions help increase the public's knowledge and access to information on chemicals at individual facilities, their uses, and releases into the environment by requiring formation of state and local emergency planning committees that are responsible for collecting material handling and transportation data for use as a basis for planning and provision of chemical inventory data to the community at large under the "right-to-know" provision of the law.

Comprehensive Environmental Response Compensation and Liability Act

The Comprehensive Environmental Response Compensation and Liability Act, 42 USC Section 9601, et. seq. (CERCLA) was enacted in 1980, and principally sets forth a framework for the identification and remediation of hazardous waste disposal sites and other contaminated sites that pose a significant environmental health threat. CERCLA provides that generators and transporters of hazardous substances, and owners and operators of facilities at which there has been a release of hazardous substances, are liable for the costs of the removal and remedial actions and can be ordered to perform the actions.

Hazardous Materials Transportation Act

The Hazardous Materials Transportation Act administered by the U.S. Department of Transportation (USDOT) governs the transport of hazardous materials on water, rail, highways, through air, or in pipelines, such as contaminated soil, asbestos, or lead-containing materials. The California Department of Transportation implements Title 49 of the CFR, enacted pursuant to the Hazardous Materials Transportation Act, and enforces these regulations created to protect human health and the environment and to reduce potential impacts by creating hazardous materials packaging and transportation requirements. It also includes provisions for material classification, packaging, marking, labeling, placarding, and shipping documentation. The USDOT provides hazardous materials safety training programs and supervises activities involving hazardous materials. In addition, the USDOT develops and recommends regulations governing the multimodal transportation of hazardous materials.

State

California Health and Safety Code

As noted above, "hazardous waste" is any hazardous material that is abandoned, discarded or recycled, as defined by Sections 25117 and 25124 of the California Health and Safety Code. In addition, hazardous waste may occasionally be generated by actions that change the composition of previously nonhazardous materials. The criteria used to characterize a material as hazardous include ignitability, toxicity, corrosivity, reactivity, radioactivity, or bioactivity.

Specifically, the California Health and Safety Code (Health and Safety Code [HSC] Section 25141)[18] defines hazardous waste as a waste or combination of waste that may: . . . because of its quantity, concentration, or physical, chemical, or infection characteristics:

(1) Cause or significantly contribute to an increase in mortality or an increase in serious irreversible or incapacitation-reversible illness.

(2) Pose a substantial present or potential hazard to human health or the environment, due to factors including, but not limited to, carcinogenicity, acute toxicity, chronic toxicity, bioaccumulative properties, or persistence in the environment, when improperly treated, stored, transported, or disposed of or otherwise managed.

These regulations establish criteria for identifying, packaging, and labeling hazardous wastes; prescribe management practices for hazardous wastes; establish permit requirements for hazardous waste treatment, storage, disposal, and transportation; and identify hazardous waste that commonly would be disposed of in landfills.

Under both the RCRA and the HWCL, hazardous waste manifests must be retained by the generator for a minimum of 3 years. The generator must match copies of the manifests with copies of manifest receipts from the treatment, disposal, or recycling facility.

In accordance with Chapter 6.11 of the California Health and Safety Code (HSC Section 25404, et seq.), local regulatory agencies enforce many federal and State regulatory programs through the CUPA program (discussed further below), including:

- Hazardous Materials Business Plans (HMBP) (HSC Section 25501, et seq.);
- Uniform Fire Code requirements (Uniform Fire Code [UFC] Section 80.103, as adopted by the State Fire Marshal pursuant to HSC Section 13143.9);
- Underground storage tanks (HSC Section 25280, et seq.);
- Aboveground storage tanks (HSC Section 25270.5(c)); and
- Hazardous Waste Generator requirements (HSC Section 25100, et seq.).

The Environmental Health Division of the Orange County Health Care Agency (OCHCA) was designated as the Certified Unified Program Agency (CUPA) is the CUPA for Orange County

(which includes Anaheim). As the CUPA, the Environmental Health Division enforces State statutes and regulations through the Hazardous Materials Unified Program Agency (HMUPA). The HMUPA oversees aboveground petroleum tanks; generation of hazardous materials; storage and treatment; USTs; generation of medical waste; the Accidental Release Prevention Program; and the Local Oversight Program (LOP), which interfaces with the State Water Board and the Santa Ana RWQCB (Region 8) on LUSTs and UST release sites. An HMBP must be submitted if a facility ever handles any individual hazardous material in an aggregate amount equal to or greater than 55 gallons (liquids), 500 pounds (solids), or 200 cubic feet (gases). An HMBP must include:

- Details that include facility floor plans and identify the business conducted at the site;
- An inventory of hazardous materials handled or stored on the site;
- An emergency response plan; and
- A training program in safety procedures and emergency response for new employees who may handle hazardous materials, with an annual refresher course in the same topics for those same employees.

California Occupational Safety and Health

The California Occupational Safety and Health Administration (CalOSHA) is responsible for enforcing State health and safety standards and implementing federal OSHA regulations. CalOSHA has regulations to protect worker safety, including during potential exposure to lead and asbestos under Title 8 of the California Code of Regulations (CCR; Section 1529, Asbestos and Section 1532.1, Lead). Asbestos is regulated as a potential worker safety hazard under the authority of CalOSHA. These rules and regulations prohibit emissions of asbestos from asbestos-related demolition or construction activities, require medical examinations and monitoring of employees engaged in activities that could disturb asbestos, specify precautions and safe work practices that must be followed to minimize the potential for release of asbestos fibers, require notice to federal and local government agencies prior to beginning renovation or demolition that could disturb asbestos, and preparation of emergency action and fire prevention plans. Demolition that could result in the release of asbestos and lead must be conducted according to CalOSHA standards. These standards were developed to protect the general population and construction workers from respiratory and other hazards associated with exposure to these materials. Young children, the elderly, and people in poor health may be more susceptible to adverse health effects from exposure to asbestos released to the environment. Cal/OSHA also enforces hazard communication program regulations, including procedures for identifying and labeling hazardous substances, and requires that safety data sheets be available for employee information and training programs. Cal/OSHA standards are generally more stringent than federal regulations. Federal and State OSHA regulations require a supervisor who is certified in identifying existing and predictable lead hazards to oversee air monitoring and other protective measures during demolition activities in areas where LBP may be present. Special protective measures and notification of Cal/OSHA are required for highly hazardous construction tasks related to lead, such as manual demolition, abrasive blasting, welding, cutting, or torch burning of structures, where LBP is present.

California Hazardous Waste Control Act

The California Hazardous Waste Control Act (HWCA), California Health and Safety Code (see Division 20, Chapter 6.5, Article 2, Section 25100, *et seq*.), is the primary hazardous waste statute in the State of California and implements RCRA as a "cradle-to-grave" waste management system for handling hazardous wastes in a manner that protects human health and the environment and reduces potential resulting impacts of hazardous waste. Specifically, the Act authorizes the California State DTSC and local Certified Unified Program Agencies (CUPA) to regulate facilities that generate or treat hazardous waste. The HWCL specifies that generators of hazardous waste have the primary duty to determine whether their waste is hazardous and to ensure proper management. The HWCL also establishes criteria for the reuse and recycling of hazardous waste used or reused as raw materials. The law exceeds federal requirements by mandating source reduction planning and a much broader requirement for permitting facilities that treat hazardous waste. In addition, it regulates several types of waste and waste management activities that are not covered by federal law.

The HWCA authorizes CUPAs to perform the following actions:

- Conduct inspections of any factory, plant, construction site, waste disposal site, transfer station, establishment, or any other place or environment where hazardous wastes are stored, handled, processed, disposed of, or being treated to recover resources;
- Maintain records of compliance with the HWCA;
- Require hazardous waste generators as provided herein, to pay inspection and administration fees to cover the costs of administering the provisions in this Act. Fees may include but shall not be limited to the costs of inspection, document development and processing, recordkeeping, enforcement activities, and informational materials development and distribution;
- Issue authorization for on-site treatment of hazardous waste to persons eligible to operate pursuant to permit-by-rule, conditional authorization, or conditional exemption; and
- Enforce against violations of the HWCA.

California Code of Regulations Title 22, Division 4.5

California Code of Regulations, Title 22, Division 4.5 contains the Environmental Health Standards for the Management of Hazardous Waste, which includes California waste identification and classification regulations. California Code of Regulations, Title 22, Chapter 11, Article 3, "Soluble Threshold Limits Concentrations/Total Threshold Limits Concentration Regulatory Limits," identifies the concentrations at which soil is determined to be a California hazardous waste. California's Universal Waste Rule (22 CCR Section 66273) provides an alternative set of management standards in lieu of regulation as hazardous wastes for certain common hazardous wastes, as defined in California Code of Regulations, Title 22, Section 66261.9. Universal wastes include fluorescent lamps, mercury

thermostats, and other mercury-containing equipment. Existing structures may contain fluorescent light ballasts that could contain mercury or lead. The Alternative Management Standards for Treated Wood Waste (22 CCR Section 67386) were developed by the DTSC to allow for disposal of treated wood as a nonhazardous waste, to simplify and facilitate the safe and economical disposal of such waste. Chemically treated wood can contain elevated levels of hazardous chemicals (e.g., arsenic, chromium, copper, pentachlorophenol, or creosote) that equal or exceed applicable hazardous waste thresholds. The Alternative Management Standards provide for less stringent storage requirements and extended accumulation periods, allow shipments without a hazardous waste manifest and a hazardous waste hauler, and allow disposal at specific nonhazardous waste landfills.

California Accidental Release Prevention Program

The California Accidental Release Prevention Program (CCR, Title 19, Division 2) merged the Federal Accidental Release Prevention Program and California Risk Management and Prevention Program to eliminate the need for two separate programs addressing the prevention of accidental releases of regulated toxic and flammable substances. Businesses using regulated substances exceeding a threshold quantity are evaluated under this program to determine the potential for and impacts of accidental releases. Depending on the potential hazards, business owners may be required to develop, submit and obtain approval of a Risk Management Plan.

California Green Building Standards Code

The 2022 California Green Building Standards Code (24 CCR, Part 11), also known as the CALGreen code, contains mandatory requirements and voluntary measures for new residential and nonresidential buildings (including buildings for retail, office, public schools, and hospitals) throughout California) (CBSC 2023a).

New construction in any FHSZ must comply with California Building Standards Code (CBSC) Chapter 7A, Materials and Construction Methods for Exterior Wildfire Exposure. CBSC Chapter 7A sets forth requirements pertaining to roofing; vents (covered with metal wire mesh or other materials with openings no larger than 0.125 inch); exterior coverings; floor projections; underfloor protection; exterior windows, skylights, and doors; decking; accessory structures; and use of ignition-resistant materials. (DGS 2018a).

The 2022 California Green Building Standards Code (24 CCR, Part 11), also known as the CALGreen Ccode, contains mandatory requirements and voluntary measures for new residential and nonresidential buildings (including buildings for retail, office, public schools, and hospitals) throughout California) (CBSC 2023a). The development and implementation of the CALGreen Code is intended to improve public health, safety, and general welfare by enhancing the design and construction of buildings through the following construction practices: (1) planning and design; (2) energy efficiency; (3) water efficiency and conservation; (4) material conservation and resource efficiency; and (5) environmental quality. In short, the Ccode is established to reduce construction waste; make buildings more

efficient in the use of materials and energy; and reduce environmental impact during and after construction.

California Building Code

The State of California provided a minimum standard for building design through the 2019 California Building Standards Code (CBC), which is located in Part 2 of Title 24 of the California Code of Regulations. The current CBC is based on the relevant International Building Code, but has been modified for California conditions. It is generally adopted on a jurisdiction by-jurisdiction basis, subject to further modification based on local conditions. Commercial and residential buildings are plan checked by local City and County building officials for compliance with the CBC. Typical fire safety requirements of the CBC include the installation of sprinklers in all new high-rise buildings and residential buildings; the establishment of fire resistance standards for fire doors, building material; and specific types of construction.

California Public Resources Code

The California Public Resources Code includes fire safety regulations that restrict the use of equipment that may produce a spark, flame, or fire; require the use of spark arrestors on construction equipment that use an internal combustion engine; specify requirements for the safe use of gasoline-powered tools in fire hazard areas; and specify fire suppression equipment that must be provided on-site for various types of work in fire prone areas.

These regulations include the following:

- Earthmoving and portable equipment with internal combustion engines would be equipped with a spark arrestor to reduce the potential for igniting a wildland fire (PRC Section 4442);
- Appropriate fire suppression equipment would be maintained during the highest fire danger period—from April 1 to December 1 (PRC Section 4428);
- On days when a burning permit is required, flammable materials would be removed to a distance of 10 feet from any equipment that could produce a spark, fire, or flame, and the construction contractor would maintain the appropriate fire suppression equipment (PRC Section 4427); and
- On days when a burning permit is required, portable tools powered by gasoline-fueled internal combustion engines would not be used within 25 feet of any flammable materials (PRC Section 4431).

California Environmental Protection Agency

Cal/EPA was formed in 1991 as the State's primary environmental authority. Cal/EPA has a mission to ensure public health, environmental quality, and economic vitality while working to restore, protect, and enhance the environment. Cal/EPA oversees several State agencies, including these agencies that handle hazardous materials: Air Resources Board (asbestos) and the DTSC (lead and polychlorinated biphenyls).

California Department of Transportation/California Highway Patrol

Hazardous materials are routinely transported in the region by truck or rail. The USDOT, Office of Hazardous Materials Safety prescribes strict regulations for the safe transportation of hazardous materials, as outlined in Title 49 of the Code of Federal Regulations and implemented by Title 13 of the CCR. Transportation of hazardous materials along any city or State roads within or near the Project Site is also subject to all hazardous materials transportation regulations established by the California Highway Patrol pursuant to the California Vehicle Code. In addition, universal waste handlers are subject to Title 22 of the CCR (Section 66273.30 through Section 66273.39 and Section 66273.70 through Section 66273.77), which identify standards for hazardous waste handlers and authorization requirements for universal waste handlers who treat hazardous wastes.

State Water Resources Control Board

The State Water Board enforces, among other regulations, those regulations pertaining to implementation of underground storage tank programs. It also allocates monies to eligible parties who request reimbursement of State funds to clean up soil and groundwater pollution from LUSTs. The State Water Board also enforces the Porter-Cologne Act through its nine regional boards, including the Santa Ana Regional Water Quality Control Board (Region 8), described below.

California Air Resources Board

The California Air Resources Board (ARB) is responsible for coordination and oversight of State and local air pollution control programs in California, including implementation of the California Clean Air Act of 1988. CARB has developed State air quality standards and is responsible for monitoring air quality in conjunction with the local air districts.

California Fire Code

The California Fire Code, California Code of Regulations, Title 24, Part 9 includes requirements for the installation of fire sprinkler; building materials, and particular types of construction; and the clearance of debris and vegetation within a prescribed distance from occupied structures within wildfire hazard areas. In addition, the California Fire Code addresses fire flow requirements, fire hydrant spacing, and access road specifications.

California Fire Code Chapter 49, Requirements for Wildland-Urban Interface Fire Areas, sets forth requirements for hazardous vegetation and fuel management and defensible space and requires compliance with construction methods mandated in CBSC Chapter 7A (CBSC 2022a).

California Emergency Response Plan

California has developed an emergency response plan to coordinate emergency services provided by federal, State, and local governments and private agencies. Responding to hazardous materials incidents is one part of this plan. The plan is administered by the

California Governor's Office of Emergency Services, which coordinates the responses of other agencies. The Orange County Emergency Management Division provides emergency management and preparedness services coordinates response to emergencies to the unincorporated areas of Orange County and supports the efforts of the Orange County Operational Area.'"

Local

South Coast Air Quality Management District

The South Coast Air Quality Management District (SCAQMD) regulates exposure to asbestos. Because it is a hazardous air pollutant, asbestos is subject to regulation by the SCAQMD under Rule 1403. The purpose of Rule 1403 is to specify work practice requirements to limit asbestos emissions from building demolition and renovation activities, including the removal and associated disturbance of asbestos containing materials (ACMs).

City of Anaheim General Plan – Safety Element

The Safety Element of the City of Anaheim General Plan addresses fire hazards, geologic and seismic hazards, flood hazards, risk-reduction strategies, hazard abatement measures, and potential hazard locations throughout the City (City of Anaheim 2023a). An analysis of Project consistency with the goals and policies from the Safety Element that are related to hazards and hazardous materials and that are applicable to this analysis are provided in Table 4.10-1 in Section 4.10, Land Use.

4.8.3 THRESHOLDS OF SIGNIFICANCE

In accordance with the City of Anaheim's Environmental Checklist, the Project would result in significant impacts related to hazards and hazardous materials if it would:

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?

4.8.4 IMPACT ANALYSIS

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

Less Than Significant With Mitigation Incorporated.

Construction

During construction, the Project would be expected to involve the routine transport, use, and disposal of hazardous materials, such as diesel and gasoline fuels, aerosols, and paints, which are typical for this type of mixed-use developments. It should be noted that a residential use on portion(s) of the Project Site could be operational during the construction of other Project components. Among other things, the Project would require the removal of an existing paved roadway and an existing storm drain inlet with headwall and wing walls. Given the age of these existing facilities, it is possible asbestos and/or lead-based paint could be present in these demolition materials. If present, such substances would require specialized removal, handling, and disposal in accordance with all applicable regulatory requirements to ensure there is no significant impact in this regard, as required by **MM HAZ-1,** which would minimize, to the extent feasible, potential for hazard to the public and the environment. More generally, throughout construction, the Project would be subject to the Hazardous Materials Transportation Act, California Public Resources Code, and other State and local laws and regulations (delineated further above) that would reduce and limit the associated risks.

As explained above, the Phase I ESA did not note any RECs that would create a significant environmental concern. Any handling, transporting, use, or disposal of hazardous materials would be required to comply with applicable laws, policies, and programs set forth by various federal, State, and local agencies and regulations, including the EPA, RCRA, California Department of Transportation (Caltrans), and HMP. For example, the abandoned light-duty pickup truck that is located within the Project Site would be removed and disposed of in accordance with all applicable requirements and standards. Moreover, the Project would incorporate standard CARB Airborne Toxic Control Measures (ATCMs) that would further reduce fugitive dust, as described in more detail in section 4.2, Air Quality, of this Draft EIR. Also, as discussed in Section 4.9, Hydrology and Water Quality, of this Draft EIR, the Project would be required to prepare and implement a Storm Water Pollution Prevention Plan (SWPPP) prior to and throughout construction. The SWPPP would be designed to ensure that erosion, siltation, and flooding are prevented or minimized to the maximum extent feasible during construction. In addition, the SWPPP would include both structural (physical devices or measures) and operational (timing of construction)

In summary, with respect to construction-related impacts, with adherence to the robust regulatory framework that addresses the removal, handling and disposal of hazardous materials, combined with implementation of MM HAZ-1, impacts would be reduced to a less than significant level.

Operation

The Project's proposed land uses consist of residential, commercial, and open space land uses. The Project would not include any industrial or manufacturing land uses, which would routinely utilize large quantities of hazardous materials.

That said, the Project's proposed land uses would result in the on-site handling of materials that are common in similar residential and commercial developments, such as commercial cleansers, solvents, and other janitorial use materials; paints; diesel and gasoline, and landscape fertilizers and pesticides. While many such common materials are labeled as hazardous, the presence of such materials is common in a residential and commercial environment and the quantities of these materials would be relatively limited consistent with standard practices and would not represent a significant hazard to the public or the environment. Furthermore, these materials would be required to be transported, used, stored, and disposed of in accordance with all applicable regulatory requirements, as further assured by implementation of **MM HAZ-1**.

In summary, with respect to operation-related impacts, with adherence to the robust regulatory framework that addresses the removal, handling and disposal of hazardous materials, combined with implementation of **MM HAZ-1,** the Project would result in a less than significant impact related to this threshold.

b) Would the Project 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 With Mitigation Incorporated.

Construction

Project construction activities would involve the use and handling of limited volumes of commonly used hazardous materials, such as petroleum (fuel), paints, adhesives, and solvents. In addition, as described above, given the age of the existing paved road and other facilities to be removed from within the Project Site, it is reasonable to assume that ACM and/or LBP may exist within these structures. Removal of these existing structures could potentially create a significant hazard to construction workers on the Project Site. Furthermore, there is some residential arsenic in the soils that, when exposed in connection with earth-moving activity, could be released and thus pose a risk to construction workers. Also, a residential use on portion(s) of the Project Site could be operational during the construction of other Project components.

Therefore, during construction, there is a limited risk of spills and/or accidental release of hazardous materials that are used for the operation and maintenance of construction equipment. However, as specified in **MM HAZ-1,** the Project would be required to comply with all applicable federal, State and local laws and regulations, which would ensure that on-site temporary handling, storage, and usage of these materials would be conducted in accordance with all applicable regulatory requirements.

During the Project Site visit that was conducted as part of the preparation of the Project's Phase I ESA, an abandoned pick-up truck was observed that is located in a remote portion of the east-central part of the Project Site. Based on aerial imagery and other observations, the truck appears to have been abandoned for approximately 19 years. No fuel odors were apparent to the surveyors during the Project Site visit. Therefore, as determined in the Phase I ESA, the pick-up truck does not represent a REC, meaning it does not likely contain any hazardous substances. During Project grading, the pick-up truck would be removed and disposed of pursuant to all applicable laws and regulations, as set forth in the Phase I ESA recommendation. To minimize potential impacts related to the potential release of fuel or other hazardous materials during truck removal, **MM HAZ-2** would be implemented. As required by **MM HAZ-2,** if there is any fuel or other hazardous materials that are released during removal of the abandoned pick-up truck, or if odors or soil discoloration are observed on the ground beneath the truck when it is being removed, the Property Owner/Developer would be required to hire a specialized environmental professional to assess and properly address the extent of any subsurface contamination and to identify remediation measures, for which the Property Owner/Developer would be required to implement. If needed, any potential contaminated soil would be removed and disposed of off-site at a permitted disposal facility pursuant to all applicable laws and regulations.

Five, 55-gallon "non-hazardous waste" drums were observed during the Project Site visit for the Phase I ESA that presumably contained soil cuttings and mud left over from a geotechnical borings that were collected at the Project Site. The drums have since been removed and disposed of in accordance with regulatory requirements.

A small area of approximately 15 feet by 10 feet of deposited discolored soil was observed during the Project Site visit; however, the soil did not appear to contain any petroleum nor was there any evident chemical odors coming from the soil. Therefore, the Phase I ESA concluded this area of discolored soil does not represent a REC requiring further testing.

The Project Site was not identified on any hazardous material-related California and Federal databases, including facilities that were LQGs of hazardous waste, holders of stormwater and wastewater discharge permits, and sites with USTs and ASTs. In addition, the Phase I ESA concluded that nearby sites listed on the databases did not present any RECs of concern that would pose a substantial risk of potential for contaminating the Project Site.

Historical aerial photographs from 1938 to 2016 were reviewed to determine past land uses that may have impacted the Project Site in the past through the use, storage, or disposal of hazardous substances and/or petroleum. No conditions were observed on the aerial photographs that would suggest the potential presence of RECs on the Project Site or adjoining or nearby properties, except for past agricultural uses which are discussed below.

Based on review of aerial photographs, the Phase I ESA Report identified that the northern portion of the Project Site was intermittently used for agricultural purposes. Thus, there is a potential that agricultural-related chemicals such as pesticides, herbicides, and fertilizers, may have been used and stored on the Project Site. Agricultural uses (i.e., orchards) were present on the northwestern portion of the Project Site in the past. As discussed above, in 2023 soil sampling was conducted in the Project Site to assess whether there was any residual concentration from the potential past use of organochlorine pesticides and arsenic during agricultural activities in the Project Site. Five soil samples were collected and submitted to a State-certified laboratory for evaluation. Low concentrations of organochlorine pesticides were detected in four of the soil samples. The detectable concentration of 4,4'-DDT and its two degradation products (4,4'-DDD and 4,4'-DDE) in soils suggest that organochlorine pesticides were used during agricultural activities on the Project Site decades ago. However, there were no detected concentration of organochlorine pesticides in any of the samples that were collected that exceeded its DTSC-SL; therefore, the residual concentrations do not appear to be a health risk according to the analyses conducted by J2 Environmental (J2 Environmental 2024a). Arsenic was detected in three of the soil samples. These samples all exceed the arsenic DTSC-SL by two to three times. Therefore, exposure to arsenic may result from earthmoving activities if soils in the northern portion of the Project Site are not handled appropriately. Therefore, as required by **MM HAZ-3**, prior to issuance of the Project's first grading permit additional soil sampling would be conducted for arsenic in the northern portion of the Project Site. A soil management plan would be required to be developed based on the results of the soil sampling to specify the appropriate handling, transport, and disposal procedures for the soils within the Project Site to minimize potential exposure in accordance with State and Federal regulations.

In summary, with respect to construction-related impacts, with adherence to the regulatory framework that addresses the handling, storage and disposal of hazardous materials, combined with implementation of **MM HAZ-1, MM HAZ-2,** and **MM HAZ-3**, construction of the Project would result in a less than significant impact related to this threshold.

Operation

During operation, Project residents, visitors, employees and other users may use potentially hazardous substances that are typical for this type of mixed-use development, including diesel and gasoline, common household cleaners, lubricants, hydraulic oils, and other substances. While small quantities of hazardous materials would be used on-site during operation of the Project, this would not occur in sufficient quantities to create significant hazard in the unlikely event of upset or accident. These types of materials are common in such mixed-use development and represent a low risk to people and the environment when used and handled as intended and would not be expected to result in the release of hazardous materials into the environment. The handling, transport, and disposal of such substances would be required to comply with all applicable laws and regulations, which would reduce risks of accident conditions.

As such, operational impacts related to this threshold would be less than significant.

Conclusion

In conclusion, with implementation of **MM HAZ-1, MM HAZ-2,** and **MM HAZ-3**, the Project would result in a less than significant impact related to this threshold.

b) Would the Project 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 With Mitigation Incorporated. There are no existing or proposed schools that are located within one-quarter mile of the Project Site. The closest existing school is El Rancho Charter School, which is located approximately 0.65 mile west of the Project Site.

During construction and operation of the Project, additional vehicular and truck trips would occur on Santa Ana Canyon Road that would not occur otherwise. Santa Ana Canyon Road is adjacent to El Rancho Charter School and Canyon High School. As such, the Project would result in a minor increase in the amount of additional nitrogen oxides, carbon monoxide, and particulate matter within the air that would not occur otherwise without the Project. However, such air quality effects would be minor as described in more detail in the air quality analyses contained in Section 4.2 of this Draft EIR.

As noted above under threshold 4.8(a), and as required by **MM HAZ-1,** hazardous materials utilized during Project construction and operation would be stored, transported, used, and disposed of according to applicable regulatory requirements.

With implementation of **MM HAZ-1**, the Project would result in a less than significant impact related to this threshold.

c) Would the Project 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. As noted above, Section 65962.5 requires the development of a hazardous waste and substances site list, also known as the Cortese List, which provides the location of known hazardous materials release sites.

According to the database record searches that were conducted as a part of the Phase I ESA, the Project would not be located on a site that is included on the Cortese List, and therefore, the Project would not create a significant hazard to the public or the environment in this regard. There is one Cortese List property 0.5 miles northeast of the Project Site, which is the Chevron Service Station located at 8000 Santa Ana Canyon Road. This property was listed in various UST databases related to the installation and use of three, 12,000-gallon gasoline USTs, which were considered "active" beginning as of May 1993. A leak was reported, and a LUST case was later opened in September 2009, but the case was closed in October 2010, with No Further Action (NFA) required by the regulatory agencies, indicating the LUST was

repaired and remediated. Due to the distance and the closure with NFA of the LUST, this property does not represent a significant environmental threat to the Project Site.

Therefore, the Project would have a less than significant impact related to this threshold and no mitigation is required.

d) Would the Project be 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. The Project would not be located within an airport land use plan or within two miles of a public airport or public use airport. The nearest public airport is the Corona Municipal Airport, which is located in the City of Corona approximately 10 miles northeast of the Project Site. Fullerton Municipal Airport and Los Alamitos Joint Forces Training Base are more than 12.50 and 14.25 miles west of the Project Site, respectively. Therefore, because of the foregoing, the Project would not result in a safety hazard or excessive noise for people residing or working in the Project area (Google Maps 2024a).

Therefore, the Project would have no impact related to this threshold and no mitigation is required.

e) Would the Project impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?

Less Than Significant With Mitigation Incorporated.

Emergency Operations Plan

The City of Anaheim's Emergency Operations Plan was adopted by the Anaheim City Council on May 9, 2017. The Emergency Operations Plan provides an overview of potential hazards affecting the City, as well as general policy-level guidance related to future development within the City (Anaheim 2017a). The Emergency Operations Plan contains an overview of the City and the hazards that the City is exposed to including wildfires, flooding, earthquakes, disease outbreak events, aircraft incidents, civil unrest events, terrorism, train derailments, and other situations. The Emergency Operations Plan also includes a chapter describing the response structure for emergency operations in the City, which includes the methods by which the City would collect, analyze, and disseminate information in an emergency as well as the method by which an emergency operations center would be established and operated.

The Project would not impair implementation of physically interfere with the Emergency Operations Plan because there is nothing within the Emergency Operations Plan that is specific to the Project Site or its nearby vicinity. Also, the Emergency Operations Plan does not include any policies that apply directly to individual projects.

Therefore, the Project would not impair implementation of or physically interfere with the City's Emergency Operations Plan

Local Hazard Mitigation Plan

The City's Local Hazard Mitigation Plan, which is referred to as the "Be Ready Anaheim" plan, was approved by the City in 2022 (City of Anaheim 2022b). The Be Ready Anaheim plan includes policies that seek to foster a more resilient community, so that when hazard events do ultimately occur, the community suffers minor damage and can recover more quickly and effectively. The Be Ready Anaheim plan includes an overview of the City's setting, a hazard assessment, a vulnerability assessment, and mitigation strategies.

The Be Ready Anaheim plan identifies eastern Anaheim as susceptible to wildfires due to its topography and because of the relatively high temperatures, low humidity, and low precipitation that often occur in this area of the City during summer. The Be Ready Anaheim plan states that fires in eastern Anaheim are also exacerbated in the fall by Santa Ana winds and that the City's wildfire modeling has determined that the wildland-urban interface in eastern Anaheim has the highest risk of wildfire out of all areas within the City. The Be Ready Anaheim plan contains a list of mitigation actions, all of which are the responsibility of the City and none of which apply to the Project directly. Therefore, the Project would not directly conflict with any aspects of the Be Ready Anaheim plan.

Know Your Way

"Know Your Way" is a City initiative that provides guidance on primary and secondary evacuation routes in case of wildfire, flood, or earthquake events in the eastern portion of the City. Know Your Way consists of a website that contains maps that cover east Anaheim. The maps designate evacuation zones within east Anaheim as well as primary and secondary evacuation routes for each evacuation zone to use during a typical evacuation event. The maps also designate where APD would typically close or divert traffic; however, APD takes an adaptive approach to evacuations. Therefore, APD may implement different traffic controls from what is shown in Know Your Way maps during an evacuation event based upon the particular details of that event. Generally, the Know Your Way maps direct motorists to take local arterial streets to get to SR-91, and then to travel west on SR-91.

As part of Know Your Way, students from schools within an evacuation zone would be evacuated to Orange High School during evacuation events to avoid creating additional congestion in east Anaheim that could hinder emergency response and/or evacuation. During future evacuation events, horses and livestock from affected evacuation zones would be temporarily evacuated to the Orange County Fairgrounds or to other stables in the County.

The Project Site is within Know Your Way Evacuation Zone 8, which is also referred to as the "Sycamore" zone. According to the evacuation map for this zone, individuals should generally evacuate the Project Site and the rest of Evacuation Zone 8 for most evacuation events by going to the east via Santa Ana Canyon Road, then by turning north on Weir Canyon Road, then going west on SR-91. However, as discussed further below and in Section 4.18, Wildfire, of this Draft EIR, as shown in the Evacuation Travel Time Analysis report that was prepared for the Project and as determined in consultation with the City and APD, for a specific wildfire

event occurring in the undeveloped areas immediately east and/or south of the Project Site, APD would instead likely direct evacuees from the Project Site (a portion of Evacuation Zone 8[3]) and from Evacuation Zones 9 and 10 to the west via Santa Ana Canyon Road towards Imperial Highway (LLG 2024c). For most other evacuation events not involving a wildfire in the undeveloped areas east and/or south of the Project Site, Zones 8, 9, and 10 would still evacuate east to Weir Canyon Road and then north to SR-91 consistent with the Know Your Way evacuation maps. Based on coordination with APD and Anaheim Fire and Rescue staff, there are no changes needed to the Know Your Way maps to accommodate the Project. APD and Anaheim Fire and Rescue stated that in existing conditions, if a fire were to break out in the Project Site or Deer Canyon Park Preserve, APD would direct individuals from Zones 8, 9, and 10 to the west along Santa Ana Canyon Road towards Imperial Highway as they would with implementation of the Project and as modeled in the Evacuation Travel Time Analysis report. However, for most other wildfire events, APD confirmed that they would generally direct individuals eastbound on Santa Ana Canyon Road to Weir Canyon Road and then westbound on SR-91. The Project's circulation plan would enable this evacuation strategy and not conflict with or impair implementation of Know Your Way, nor does the Project necessitate any changes to Know Your Way. Furthermore, as noted above, the Project would incorporate numerous features to enable emergency access to the Project Site, and would enhance the wildfire resilience of the Project Site and neighboring communities. In doing so, this would help to decrease the risk of emergencies related to wildfire, thereby reduce the need for evacuation in the first instance.

Analysis of Construction Effects Related to Evacuation Plan Consistency

Project construction would result in a temporary increase in traffic on local roads related to construction employees, material deliveries, and haul trucks when compared to existing conditions. During Project construction there would be limited instances where there would be temporary closures of up to one lane in each direction on Santa Ana Canyon Road. These temporary lane closures would be needed to allow for roadway and utility improvements that are required to accommodate the Project. These typical temporary closures and additional construction traffic could potentially impair implementation of emergency access and evacuation if an evacuation event were to occur during construction while said closures were in place. Therefore, as required by **MM HAZ-4**, the Project would minimize potential effects to local circulation and to emergency response times and to evacuation through the preparation and implementation of a City-approved Construction Management Plan that would specify the methods by which traffic would be maintained along Santa Ana Canyon Road and other local roads throughout the Project's construction process.

Analysis of Operational Effects Related to Evacuation Plan Consistency

Given that the Project Site is currently vacant, there are no vehicles that need to evacuate from the Project Site during evacuation events in existing conditions. However, during operation of the Project, the Project would result in additional vehicles entering and leaving

[3] During a wildfire east and/or south of the Project Site, the portion of Evacuation Zone 8 that contains the Festival Shopping Center would still evacuate to the east to Weir Canyon Road, then north on Weir Canyon Road to westbound SR-91.

the Project Site that would need to evacuate the area during a wildfire or other evacuation event. The multiple-family residential component of the Project would provide approximately 958 parking spaces. The proposed commercial uses would provide approximately 320 parking spaces. The six single-family residential lots would result in approximately 15 parking spaces in total. The foregoing parking space figures are relevant approximations to be used in this analysis in terms of the number of vehicles that should conservatively be assumed to need to evacuate in a reasonable worst-case scenario.

As part of the CEQA analysis of the Project and as described above and in the Preliminary Fire Protection Plan that is provided as Appendix R to this Draft EIR, wildfire modeling has been conducted to evaluate a variety of potential wildfire scenarios that could occur in the future involving the undeveloped open space areas to the east and south of the Project Site. The wildfire modeling was informed, in part, by available information on past wildfire events that have occurred in the vicinity of the Project Site.

Due to the additional vehicles that would need to evacuate the Project Site, when compared to conditions without the Project, it was determined that approximately 24 additional minutes would be required for vehicles to evacuate from the Project Site and from nearby neighborhoods during an evacuation event. With the Project, it would take approximately 210 minutes to fully evacuate the Project Site and other properties in the evacuation zone that was analyzed in the Project's Evacuation Study, instead of the approximately 186 minutes it would take to fully evacuate these areas without the Project (LLG 2024c).

Under actual emergency circumstances, evacuation events are typically more strategic, surgical, and phased than the mass evacuation scenarios that were conservatively modeled in the evacuation scenario modeling for the Project. For example, APD typically focuses on evacuating smaller areas that are at highest risk using situational awareness rather than evacuating an entire zone. Wildfire evacuations are managed to move smaller populations in a successive phased manner to minimize traffic surges. Populated areas are typically evacuated based on their proximity to the wildfire event and their risk levels. APD has the capability to designate small areas in a more surgical approach that can target neighborhoods or individual streets for alert messaging.

Therefore, the evacuation scenarios in the modeling were conservative in that they did not account for APD controlling intersections and directing traffic as is typically implemented during an evacuation event. Traffic control would result in prioritization of the most at risk residents and increase efficiency of the evacuation, thereby reducing evacuation time.

Nevertheless, the Project would result in additional congestion during evacuation events for several neighborhoods that do not have alternative access points other than Santa Ana Canyon Road, as discussed below.

Under existing and future conditions with implementation of the Project, the intersection of Santa Ana Canyon Road and Eucalyptus Drive does not have a signal or stop sign. During most anticipated wildfire events, individuals from Eucalyptus Drive and tributary roads would evacuate eastbound on Santa Ana Canyon Road by turning right at Eucalyptus Drive and Santa Ana Canyon Road. The Project would result in increased delays during these

eastbound evacuations for residents of Eucalyptus Drive and others from Know Your Way Zones 8, 9, and 10 that would also be traveling eastbound. However, for a wildfire that is directly east/south of the Project Site and/or in Deer Canyon Park Preserve, Eucalyptus Drive and tributary roads would evacuate westbound. This traffic movement would potentially create a delay for individuals trying to evacuate from Eucalyptus Drive and other tributary roads since these vehicles would not have right-of-way priority. As such, Eucalyptus Drive would likely queue up longer than in existing conditions. Local roads that would likely be congested during such an evacuation event that do not have another outlet except for Eucalyptus Drive include Eucalyptus Way, Autry Drive, Eucalyptus Way, Silver Dollar Lane, and Trish Court. These local roads would all likely be backed up to a greater extent than in pre-Project evacuation conditions waiting to evacuate without implementation of traffic controls or other measures. Vehicles evacuating from these streets would have to queue up and make a left turn onto Santa Ana Canyon Road where they would then need to merge with vehicles evacuating from the Project Site and from the self-storage land use across the street from the Project Site.

Also, during evacuation events requiring the Project Site and Zones 8, 9, and 10 to evacuate westbound on Santa Ana Canyon Road, such as a fire south or east of the Project Site, neighborhoods that outlet to Santa Ana Canyon Road via Martin Road and Mohler Drive would also experience increased vehicular delays as a result of the Project. Similar to Eucalyptus Avenue, there are locations along Mohler Drive that could expose individuals to direct harm from flames and/or smoke due to the immediate adjacency of undeveloped parcels containing flammable vegetation. However, these hazards are existing conditions that would only be altered through the increased evacuation times.

While additional congestion would occur during an evacuation event, as discussed above, various Project design features actually enhance emergency access and the wildfire resilience for the Project Site and surrounding neighborhoods, thereby decreasing the need for evacuation in the first instance.

Moreover, to improve the City's ability to more effectively manage traffic along Santa Ana Canyon Road during a future evacuation, the Project would be required to include implementation of **MM HAZ-5,** which requires that prior to issuance of a certificate of occupancy for the first multiple-family residential unit, the Property Owner/Developer would be required to fund and implement closed-circuit television (CCTV) cameras at Imperial Highway/Santa Ana Canyon Road, Anaheim Hills Road/Santa Ana Canyon Road, Fairmont Boulevard/Santa Ana Canyon Road, Deer Canyon Road/Santa Ana Canyon Road, Festival Drive/Santa Ana Canyon Road, and Weir Canyon Road/Santa Ana Canyon Road.

Also, as required by **MM HAZ-9,** prior to issuance of a certificate of occupancy, the Property Owner/Developer shall participate through the payment of a fair share contribution to Anaheim Fire and Rescue to support education and outreach including community exercises in support of "Know Your Way" evacuation planning and protocols. The community education and outreach for the larger eastern portion of the City would help to improve the Community's understanding of "Know Your Way", which will better facilitate more efficient and safer future evacuation events.

In summary, although the Project would result in additional congestion that would result in a potential extension of time to evacuate (by approximately 24 minutes), given the Project's numerous design features that enhance wildfire resilience and facilitate emergency access (described further below), combined with adherence to all applicable laws and regulations as well as local policies and programs and implementation of **MM HAZ-4**, **MM HAZ-5**, and **MM HAZ-9**the Project would not impair implementation of or physically interfere with the City's Emergency Operations Plan, Be Ready plan or its Know Your Way initiative. Know Your Way does not contain any goals, policies, or other metrics that the Project can be compared against.

With implementation of **MM HAZ-4, MM HAZ-5**, and **MM HAZ-9**the Project would result in a less than significant impact related to this threshold.

f) Would the Project expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?

Less Than Significant With Mitigation Incorporated. The Project would result in an anticipated population increase of approximately 1,664 new City residents and new structures within the Project Site. Similar to surrounding areas, the Project Site is located within a VHFHSZ and is prone to wildfire based on topography, fuels, and meteorological patterns affecting the Project Site.

There would be a significant increase in impervious surfaces and a concomitant reduction in vegetation in those portions of the Project Site where the residential and commercial components would be developed. This reduction of vegetation would help decrease existing wildfire risk. Moreover, the Project would be designed to meet all applicable Fire Code requirements and other standards, thereby facilitating emergency access, introducing sprinklers and fire hydrants, as well as hardening structures, fuel modification zones, etc., all of which would help to reduce the risk of loss, injury and death involving wildland fires. Furthermore, the Project would help to enhance wildfire resilience for the surrounding existing communities as discussed below.

Nevertheless, given the significant open space component of the Project, much of the existing vegetation within the Project Site would remain with implementation of the Project, which has the potential to act as fuel during a wildfire event.

Also, wind-blown embers, or firebrands can float miles ahead of a wildfire that could lead to spot fires in areas miles from a wildfire event. Embers can ignite structure fires by landing on dry vegetation and through blowing into ventilation ducts or other openings into attics and crawl spaces of buildings (Zhou et al 2024a). Therefore, embers from wildfire events could also expose buildings in the Project Site to risk of fire when future wildfire events occur in the region.

Human Presence and Fire Ignition

As noted above, the Project would introduce additional residents, employees, and visitors to a Project Site that is within the urban wildland interface and designated as a VHFHSZ. Recent

research has shown that the risk of wildfire along with the intensity of wildfires increase relative to a corresponding increase in human activity/presence within an area (Hantson 2022a). Research has shown that bringing more people into or near flammable wildlands can in some cases lead to more frequent, intense, destructive, costly, and dangerous wildfires (Attorney General 2022a)

However, the Project Site is already subject to human-induced wildfire risk from existing developed neighboring properties and highly trafficked local roads including Santa Ana Canyon Road and SR-91. For example, under existing conditions, individuals regularly utilize the access road in the Project Site to access Deer Canyon Park Preserve.

Although humans are the main cause of igniting wildfires, humans can also be a part of the solution. For example, the wildfire risk for an existing community can be significantly reduced when fire protection is implemented at the project level and a project uses ignition-resistant building materials, infrastructure improvements, and landscape design (Newman et al., 2013). When wildfire is planned for and incorporated into the building design, such as with the Project, it can not only withstand wildfire, but prevent it. This prevention benefits the Project and the surrounding areas by reducing the landscape-level fire risk.

Common Ignition Sources

Common ignition sources for wildfires in southern California include powerlines and vehicles.

The Project would underground the new powerlines in the Project Site that are necessary to serve the Project; therefore, this would not be a potential source of wildfire ignition. The Project would not alter the off-site power lines that are east of the Project Site; therefore, in the event of damage these existing power lines could be a potential source of wildfire ignition. However, this is an existing condition for which the Project would not exacerbate.

The Project would introduce new roads that could increase wildfire risks through the introduction of vehicles to new areas; however, if ignition were to occur on or near the Project interior roadways it is highly unlikely it would spread beyond the Project Site and due to the level of hardscape and the adjacent proposed fuel modifications areas. Moreover, these additional roads would facilitate emergency access and evacuation, thereby helping to balance out risks in this regard.

Furthermore, the Project would include a gate on Deer Canyon Road to prevent people from heading into the Deer Canyon Park Preserve after dark. Also, to avoid wildfire risk from individuals that may wish to park and loiter along the end of Deer Canyon Road, this portion of the road would be built to only contain through lanes and would not allow parking. In taking these steps, the Project would help to enhance security in the area generally and diminish unlawful and/or problematic activities that could increase ignition sources.

Density of Development and Fire Ignition

As demonstrated in Syphard and Keeley (2015), development density directly influences susceptibility to fire because in higher density developments (like the Project), there is one interface (the Project perimeter) with the wildlands whereas lower density development creates more structural exposure to wildlands, less or no ongoing landscape maintenance (an intermix rather than interface), and consequently more difficulty for limited fire resources to protect well-spaced buildings. The intermix includes development amongst the unmaintained fuels whereas the proposed Project would convert all fuels within the development footprint and would provide wide, managed fuel modification zones separating buildings from unmaintained fuel and creating a condition that makes defense easier.

In summary, building and operating a more dense development such as the proposed Project actually enhances opportunities to appropriately manage and defend the space from wildfire as compared to a lower density development.

Designing for Wildfire Resilience

Through the design process for the Project, Project-specific fire protection measures have been evaluated, accounted for and incorporated into the Project design, including requirements for adequate water supply, fuel modification and defensible spaces, access, building ignition and fire resistance, and fire protection systems. These topics are discussed in more detail below. These measures have been combined and formalized in a Preliminary Fire Protection Plan that was developed for the Project, which is provided as Appendix R of this Draft EIR (Fire Safe Planning Solutions 2024a). The Project would be required to adhere to this Plan during construction and operation.

As discussed above, the way that a project is developed within the landscape can determine to what extent it would influence wildfire risk. For example, topography affects the speed at which a wildfire spreads. According to FEMA, a wildfire moving up a slope causes hot gases to rise in front of it. The hot gases pre-heat and dry vegetation ahead of the wildfire, causing it to catch fire more rapidly. A grass fire can advance four times faster moving up a slope than on level ground (FEMA 2024a). Therefore, building at lower locations can help to reduce wildfire risk.

Here, the Project has been designed with this consideration in mind. Specifically, the tops of slopes within the Project Site are the locations that are most exposed to Santa Ana Wind gusts during the fall season. Therefore, the Project has been designed to generally develop buildings on the lower elevations of the Project Site, thereby working with the topography of the Project Site to minimize wildfire risks related to these physical phenomena.

In addition, the Project would result in several benefits that relate to the nearby community's overall wildfire resilience that would reduce the risk of loss, injury and death for future Project residents, visitors, and employees as well as the overall surrounding community. These aspects of the Project have been incorporated to minimize risks to the proposed

Project as well as to help ensure protection of existing communities. These benefits include the following:

- Once the Project is built, the on-site fire potential would be lower than its current conditions due to the incorporation of numerous fire safety requirements that would be implemented on the Project Site pursuant to applicable Fire Code and other requirements.
- The Project would develop the Project Site in a way that would improve wildfire resilience for the Project's residents, employees, visitors and other users, and buildings within the Project Site, as well as for neighboring off-site properties by enhancing the existing street network and by providing active fuel modification of fire-prone vegetation near structures to help prevent wildfire spread to neighboring communities.
- The Project would install numerous new fire hydrants and new fire access roads in the Project Site pursuant to applicable Fire Code and other requirements that could be used by first responders in the future during wildfire events. Currently there are no fire hydrants and no water service within the Project Site.
- Development of the Project would remove significant amounts of highly combustible vegetation from the Project Site and would replace it with fuel-modified slopes, landscaping, and new structures that would be built in compliance with the latest Fire Code and other requirements. By doing so, the Project would result in decreased wildfire exposure for existing private properties that are directly west of the Project Site as well as for motorists and cyclists using Santa Ana Canyon Road by developing the Project Site in a way that would slow the spread of fire in this area of the City.
- The Project's buildings would be built to the more rigorous requirements for materials and construction methods that are contained in the State's Wildland Building Code Requirements, thereby further helping to minimize risk of loss.
- The Project's multiple family residential building would be built according to the additional access and fire protection requirements that have been established by the California Building Code as amended in the AMC for "high-rise buildings", resulting in a fire-resistant structure, thereby further helping to minimize risk of loss, injury, and death.

With the conversion of much of the landscape in the Project Site to ignition-resistant development, wildfires may still encroach upon and drop embers on the Project Site in the future with implementation of the Project, but wildfire is not expected to burn through the developed portion of the Project Site or to produce sustainable spot fires due to the lack of available fuels and due to the fire suppression capabilities that would be available.

Fuel Modification Zones

Proposed fuel modification zones (FMZs) for the Project are shown in Exhibit 3-13. The Project would be required to establish and consistently maintain these FMZs around all proposed buildings and around fire access roads.

These FMZs would provide managed buffer areas where fire spread would not be facilitated toward the Project or away from the Project into wildland areas. FMZs typically minimize the risk of surface fires but can also reduce the likelihood of canopy fires and lower ember cast. FMZs can also have a shadow effect on the untreated landscape by reducing the probability of burning and the potential fire size (Cochrane et al., 2012). Because of these factors, the risk of structures being damaged from a fire event is lower when FMZs and defensible space are implemented; such would be the case for the Project.

Also, defensible space next to structures limits the spread of fire from developed areas into vegetation off-site because these irrigated and maintained landscapes in the fuel modification zones do not readily facilitate vegetation ignition or fire spread. Research has shown that FMZ areas can function as fuel breaks which can be crucial in reducing fire risk and facilitating effective fire prevention (Wang et al., 2021).

Project FMZs would be required to be maintained a minimum of two times per year – once in middle to late spring, and again in early to middle fall. During maintenance activities, dead and dying vegetation would be removed, shrubs and trees would be trimmed, grasses would be cut back, undesirable/invasive plant species would be removed, and site observations would be recorded.

Zone A of the Project's proposed fuel modification plan consists of the "Setback Zone", which is a setback irrigated zone that is generally a 20-foot minimum width with level ground that extends from each of the building's foundations. The purpose of the Setback Zone is to provide a defensible space for fire suppression to occur and to protect structures from radiant heat and convective heat. No combustible construction would be allowed within the 20-foot Setback Zone. Also, this zone would be located on a level graded that is immediately adjacent to the protected buildings. Other requirements for this area include: automatic irrigation systems be provided to maintain healthy vegetation with high moisture content; pruning of foliage to reduce fuel load; removal of plant litter and dead wood; plants used in this zone would be highly fire resistant and selected from the approved fire-resistant plant list for the Setback Zone; all combustible plant species would be removed in this zone; this zone would be setback from the edge of a slope; no combustible construction would be allowed in this zone; and no wood or solid fuel burning fireplaces, fire pits, or similar fire features would be allowed in this zone. This area would be maintained by the Property Owner/Developer or a Homeowners Association pursuant to recorded Conditions, Covenants and Restrictions.

Zone B of the Project's proposed fuel modification zone, referred to as the "Wet Zone", would be a minimum 50-foot width (and up to 150-feet in width) from Zone A, and would consist of permanently irrigated landscaping. Zone B would be cleared of all combustible plant species and would be planted with plants from the approved fire-resistant plant list that are drought tolerant, deep rooted, and moisture retentive. Other requirements for Zone B would include requirements for minimum plant spacing. This area would be maintained by the Property Owner/Developer or a Homeowners Association pursuant to recorded Conditions, Covenants and Restrictions.

Zone C consists of the "Thinning Zone", which would be up to 100-feet out from the outer edge of Zone B. Zone C would consist of non-irrigated plantings with adequate spacing. These areas would be actively thinned twice per year down to 50% native shrubs, and all combustible plant species shall be removed in this zone. This area would be maintained by the Property Owner/Developer or a Homeowners Association pursuant to recorded Conditions, Covenants and Restrictions.

In addition, the Project would be required to include the ongoing maintenance of Roadside Protection Zones, which would be up to 50-feet in width from the edge of the Project's fire access roads. These areas would be required to meet the same requirements as fuel modification Zone B. This area would be maintained by the Property Owner/Developer or a Homeowners Association pursuant to recorded Conditions, Covenants and Restrictions.

There would be additional weed abatement areas that would be maintained annually be the City's weed abatement requirements. This area would be maintained by the Property Owner/Developer or a Homeowners Association pursuant to recorded Conditions, Covenants and Restrictions.

Ignition Resistant Construction

As depicted in the Project's fuel modification plans provided as Exhibit 3-13, all of the Project's proposed structures are considered to be within radiant heat construction zones. Therefore, all new structures within the Project Site would be constructed in compliance with the enhanced ignition-resistant construction standards of Chapter 7A of the California Building Code. These requirements address roofs, eaves, exterior walls, vents, appendages, windows, and doors and result in hardened structures that have been proven to perform at high levels (resist ignition) during the typically short duration of exposure to burning vegetation from wildfires. Adherence to these standards would provide a high level of protection to structures in the Project Site, as contemplated by the Building Code, thereby helping to reduce risk to people and structures as a result of wildfire.

The Project's fuel modification zones have been designed to comply with the requirements of the AMC and other applicable requirements. Fuel modification mitigation strategies would be used throughout the Project Site in adherence to all applicable requirements and standards, including, among others, the installation and maintenance of fire protective Radiant Heat walls where required on the Project Site, thereby helping to reduce wildfire risk to the Project as well as existing nearby residential neighborhoods.

There are areas along the west side of the proposed multiple-family residential building and the north side of the proposed commercial component that would have reduced fuel modification zones and instead would incorporate alternate mitigation strategies applied. These areas would include a fire apparatus access roadway as shown in the Preliminary Fire Protection Plan sheets provided within Exhibit 3-20.

Fire Code High Rise Classification

As determined in consultation with Anaheim Fire and Rescue staff, the multiple-family residential building would be constructed as a "high-rise" (i.e., Building Code designation) since there would be inhabited floors above 75' from the lowest point of fire department access. This means that a number of additional safety features would be required to be incorporated into the Project design. For example, from an operational perspective, no floor would be permitted to exceed 75' from adjacent street access and all of the aerial laddering access point on all side of the building would be required to be able to reach roofs of the portion of the structure which is immediately adjacent to the fire access roadway. This is due to the fact that the access elevation increase as the roadway progresses to the rear (terraced) which places portions of the structure below the surface at the rear (subterranean), mostly in the parking structure. Specifically, the multiple-family residential building would be required to meeting the additional safety requirements of Fire Code Section 9.14.3 for high-rise, which include:

- Secondary Water Supply in accordance with Fire Code Section 914.3.2.
- Fire Pump to service the secondary water supply.
- Smoke Detector system in accordance with Fire Code Section 907.2.13.1.
- Fire Standpipe system as required by Fire Code Section 905.3.3
- Emergency voice/alarm communications system in accordance with Fire Code Section 907.5.2.2
- Emergency communications coverage in accordance with Fire Code Section 510.
- Fire Command Center complying with Fire Code Section 508.
- Smoke Control system in accordance with Building Code Section 909.
- Standby power complying with Building Code Section 2702 and 3003 with power loads specified in Section 403.4.8.3.
- Emergency power complying with Building Code Section 2702 with power loads specified in Section 103.4.8.4.
- Stairway door simultaneous unlock from fire commend center if locked from the stair side.
- Where stairway doors are locked from the stair side, a telephone or other two-way communications system provided at not less than every fifth floor within the stairway capable of contacting the commend center or 911 center.
- Smokeproof enclosures in accordance with Building Code Sections 909.20 and 1023.11.
- Luminous egress path markings in accordance with Building Code Section 1025.
- Fire Service elevator access in accordance with Building Code Section 403.6.

Fire Sprinklers

All of the structures within the Project would be required to be protected with automatic fire sprinklers. The single-family units would be NFPA 13D[4] unless construction and area thresholds are exceeded requiring additional protection. The commercial and multi-family structures (including parking structures) would be protected with full NFPA 13[5] systems and standpipe systems as required by code (Building and Fire Codes). In accordance with NFPA standards, all NFPA 13 systems would be supervised and monitored.

Radiant Heat Walls

Radiant heat walls help protect structures from igniting by reducing the amount of radiant heat that is transmitted to structures during a fire event. Radiant heat walls are proposed at two locations in the Project Site adjacent to the proposed single-family residential uses where a full 170-foot-wide FMZ cannot feasibly be provided. As described in more detail in the Preliminary Fire Protection Plan, these areas are proposed to be avoided due to their biological resource value. These walls would be a minimum of 6-feet in height as depicted in Exhibit 3-13.

Emergency Evacuation

As discussed above in response to threshold (f) above, the Project would result in some amount of additional delay for vehicles evacuating the Project Site and nearby neighborhoods during a future evacuation event.

As noted in comments provided during the NOP scoping process for this Draft EIR, an increase in delay for evacuees could result in direct and indirect effects to individuals that are trying to evacuate from the Project Site and nearby vicinity. For example, individuals in vehicles that are further delayed by the Project could be exposed to additional wildfire smoke, which is a public health hazard given that wildfire smoke is a major contributor to particulate air pollution (Black et al. 2017a). Wildfires produce fine (under 2.5 microns) and ultrafine (under 1 micron) particulate. Recent studies have shown that wildfire smoke exposure has led to instances of increased cardiovascular- and respiratory-related health effects (Black et al 2017a, Attorney General 2022a).

Also, the additional congestion during an emergency event could result in increased fear, anxiety, and other mental health impacts on individuals in these neighborhoods (Malhi and Marwaha 2023a, Lane 2021a).

Increased delays during evacuations can be especially harmful to certain populations that are already more vulnerable to wildfire risks including those aged over 65, those living with a disability, and households living under the poverty limit (City of Anaheim 2022b). For example, these populations could have difficulty receiving/accessing emergency messages.

4 NFPA 13D is a residential sprinkler design standard focused on one- and two- family dwellings and manufactured homes. The intent is to provide an affordable sprinkler system in homes while maintaining a high level of life safety.

5 The industry benchmark for design and installation of automatic fire sprinkler systems, NFPA 13 addresses sprinkler system design approaches, system installation, and component options to prevent fire deaths and property loss.

Similarly, some individuals in these populations may require additional time to evacuate due to mobility or other conditions. Near the Project Site, there are single-family residences as well as apartments where it is likely that individuals from these more vulnerable populations live, including the Overlook at Anaheim Hills Apartments which is exclusively for residents 55 years of age and older (Attorney General 2022a, Google Maps 2024a).

In some of the recent wildfire events in California and elsewhere in the United States, there have been instances where individuals have perished in their vehicles while trying to evacuate from a wildfire event (Guardian 2022a, Islands News 2022a). Although unlikely, there is potential that the additional evacuation time that would result from the Project could lead to additional vehicular back-up onto existing residential streets that would be greater than the back-up that would occur in existing conditions and in future conditions without implementation of the Project. That said, for many evacuees despite some potential additional delay as a result of congestion from Project traffic during an evacuation event, there would be limited direct risk from fire as the roads that these individuals would be traveling on are typically set back from vegetated open space areas and have sidewalks, emergency lanes, and curb and gutter areas that limit the potential for flames and radiant heat to reach and cause harm to vehicles on the roads.

However, due to the adjacency and limited setback from natural open space areas, vehicles evacuating northbound on Eucalyptus Drive would be at greater risk of direct threat from flames while evacuating. Specifically, approximately 650 feet south of Santa Ana Canyon Road, Eucalyptus Drive is directly adjacent to and at the top of a vegetated slope that occurs within APN 356-581-01, which is a part of the Project Site that would not be developed. During a wildfire event with a Santa Ana Wind condition blowing from the east flames could travel up this slope and could burn vegetation that is immediately adjacent to the road at this location which could result in risk of injury and death to individuals trying to evacuate along Eucalyptus Drive. Therefore, the Project would be required to implement **MM HAZ-6** to minimize these risks, which requires that the Property Owner/Developer conduct weed abatement along the entire western boundary of the Project Site, including at this location.

Based on coordination with staff from APD and Anaheim Fire and Rescue, the increased time it would take to evacuate the Project Site and vicinity would not result in any substantial delays for emergency response providers to fight a future wildfire event given that road closures would be implemented during any such evacuation event and half of Santa Ana Canyon Road would be available to first responders to access the Project Site and nearby properties (APD 2024a, Anaheim Fire and Rescue 2024a). Further, as noted previously, the new intersection and new roads within the Project Site would improve first responders' access to the Project Site. Moreover, as discussed above in detail, the Project would incorporate numerous features that actually decrease the risk of loss from fire and enhance wildfire resilience, for both the Project Site and surrounding communities, compared to existing conditions.

As described above in response to threshold (f), to minimize potential for the Project to result in vehicular congestion that would impair emergency access and/or evacuation, the Project would be required to implement **MM HAZ-4**, which requires the preparation and implementation of an approved Construction Management Plan that would specify the

methods by which traffic would be maintained along Santa Ana Canyon Road and other local roads throughout the Project's construction process.

To improve the City's ability to more effectively manage traffic along Santa Ana Canyon Road during a future evacuation, the Project would include implementation of **MM HAZ-5,** which requires that prior to issuance of a certificate of occupancy for the first multiple-family residential unit, the Property Owner/Developer shall fund and implement closed-circuit television (CCTV) cameras at Imperial Highway/Santa Ana Canyon Road, Anaheim Hills Road/Santa Ana Canyon Road, Fairmont Boulevard/Santa Ana Canyon Road, Deer Canyon Road/Santa Ana Canyon Road, Festival Drive/Santa Ana Canyon Road, and Weir Canyon Road/Santa Ana Canyon Road.

Also as described above in response to threshold (f), **MM HAZ-7** would be implemented which requires that the Property Owner/Developer develop and implement an approved wildfire evacuation and awareness plan.

Emergency Response

As discussed in more detail in Section 4.13, Public Services, the Project would not negatively significantly impact emergency response capacity or on emergency response times for Anaheim Fire and Rescue or APD. Moreover, the Project would be required to pay applicable development impact fees, which would help to fund new equipment and hiring of firefighters to serve the Anaheim community more broadly pursuant to APD and Anaheim Fire and Rescue's master planning and capital improvement goals.

Further, the new roads that would be provided in the Project Site would provide improved and sufficient access for fire apparatus in a high fire risk area. The Project would be required to provide adequate water supply and fire flow which are critical resources in firefighting. The Project would be required to include defensible space areas that would allow firefighters to safely position to respond to future off-site wildfire events. Using the Project's fire protecting features, firefighters would be able to use the Project Site as a tactical resource for fighting on- and off-site fires.

To enhance emergency response times along Santa Ana Canyon Road the Project would be required to implement **MM HAZ-8**, which requires that prior to issuance of a certificate of occupancy for the first multiple-family residential unit, the Property Owner/Developer would be required to fund and implement emergency vehicle preemption at traffic signals on Santa Ana Canyon Road from Weir Canyon Road to Imperial Highway. Emergency vehicle preemption interrupts normal traffic signal timing to provide a green light to approaching emergency vehicles so that they can pass through intersections to get to emergencies more safely and more quickly. The goal with implementation of **MM HAZ-8** being that if emergency service providers can reach the scene of a wildfire more quickly, there would be greater potential to slow the spread of the wildfire and greater capacity for emergency service personnel to protect those individuals in the greatest need.

Community Education and Outreach

As required by **MM HAZ-9,** prior to issuance of a certificate of occupancy, the Property Owner/Developer shall participate through the payment of a fair share contribution to Anaheim Fire and Rescue to support education and outreach including community exercises in support of "Know Your Way" evacuation planning and protocols. The community education and outreach for the larger eastern portion of the City would help to improve the Community's understanding of "Know Your Way", which will better facilitate more efficient and safer future evacuation events.

Emergency Access

Access roads to the Project Site would be required to be built and maintained to comply with applicable Anaheim Fire and Rescue requirements for road widths, vertical clearances, and connectivity. The Project's roads have been designed and would be required to be built to allow for sufficient turning radii and slope grade requirements to enable adequate access for fire apparatus and other emergency vehicles as well as to enhance emergency evacuation for the Project as well as nearby neighborhoods.

Primary access to the Project Site would be provided from one new signalized intersection and one driveway from Santa Ana Canyon Road.

Vertical clearance of vegetation (lowest-hanging tree limbs), along roadways would be maintained at clearances of 13 feet, 6 inches to allow fire apparatus passage.

All internal roads would be required to be all weather roads with a maximum grade of 10%, and the roads would be required to be designed and maintained as fire apparatus access roads that are capable of supporting an imposed load of 78,000 pounds.

Any roads that have traffic lights would be required to have approved traffic pre-emption devices (Opticom) compatible with devices on the Fire Apparatus.

No parking would be allowed along any of the internal fire access roads in the Project Site. Signage would be required to be installed and vehicles would be towed to ensure adequate access is maintained.

The Project Developer/Owner would be responsible for long term funding and maintenance of internal private roads.

Emergency Evacuation of the Interior Areas of Multiple-Family Residential Building

Pursuant to applicable requirements and standards, the proposed multiple-family residential building would contain a total of six stairwells that would allow for building occupants to readily access the exterior of the structure in cases of any emergency evacuation.

Water Supply and Fire Hydrants

Water service for the Project would be provided by APW. Adequate water supply and fire water pressure have been confirmed for the Project during the preliminary design process, as discussed in more detail in Section 4.17, Utilities and Service Systems, of this Draft EIR.

Fire hydrants would be required to be installed throughout the Project Site as depicted in Exhibit 3-13 in accordance with the applicable requirements of the AMC and California State Building Code. Currently, there are no fire hydrants within the Project Site. Accordingly, the Project would be enhancing fire protection opportunities for the Project Site and surrounding neighborhoods as compared to existing conditions.

As detailed in Section 4.17, Utilities and Service Systems, of this Draft EIR, water supply and fire flow have been evaluated as part of the Project's engineering studies and this CEQA process. To begin, a Water Supply Assessment was prepared for the Project to determine the adequacy of available (both existing and planned) water supplies to serve the Project. To confirm existing water pressure at fire hydrants in the vicinity of the Project Site, hydrant flows were tested, and Hydrant Flow Text Reports were prepared in December 2022 (SoCal Flow Testing 2022a, 2022b). Also, the Public Utilities Department Water Engineering Division has provided several reviews of the proposed Project. During these reviews, City staff have provided their recommendations, suggested plan corrections, and requested additional information, which would be required to be included in the final design and building plans to ensure that potable water infrastructure is designed in accordance with the City's applicable requirements.

Booster stations are not anticipated to be required for the Project given that the existing static pressure of 125 pounds per square inch of flow is above the 20 pounds per square inch of flow that is needed for the Project.

Shelter In Place Capability

Sheltering-in-place is the practice of going or remaining indoors during or following an emergency event. This procedure is recommended if there is little time for the public to react to an incident and in cases when it is safer for the public to stay indoors for a short time rather than travel outdoors. The Project would be in a position to implement this tactic to the extent directed to shelter in place by APD.

For example, the Project has been designed to include ignition-resistant structures through the use of non-combustible construction materials, defensible space, FMZs, ember protection, and other measures.

Sheltering in place has several advantages over evacuating because it can be implemented immediately, allowing people to remain in their familiar surroundings, and providing individuals with everyday necessities such as telephone, radio, television, food, and clothing.

Sheltering in place is also an option for emergency events that are not directly adjacent to the Project Site and that do not pose a direct threat to the Project Site itself. In these

situations, rather than issuing an evacuation order for the Project Site, APD may instead decide to evacuate other neighborhoods that are closer to the wildfire or other emergency event. An advantage to sheltering in place in an appropriately protected location is that there would be a proportional reduction in the number of evacuees that would need to be managed, allowing those evacuees at greater risk (i.e., in older, less protected communities) to more quickly evacuate.

Wildfire Risk Awareness Education

As required by **MM HAZ-7,** the Property Owner/Developer would be required to develop and implement a wildfire awareness program to disclose the potential wildfire risk and the requirements contained in the Project's approved fire protection plan. The awareness program would be required to include information regarding the necessary landscape maintenance and structural-based fire protection features that need to be maintained in the Project Site. The awareness program would be required to include informational handouts, a community website, annual mailers, inspections, and/or seasonal reminders.

Construction Phase Wildfire Risk Management

During construction of the Project, construction activities could result in increased wildfire risk associated with human presence, the operation of heavy equipment, etc.

To minimize these risks, as required by **MM HAZ-10,** the Property Owner/Developer would be required to prepare and implement a construction fire prevention plan that would designate specific fire safety measures that would be implemented by the Project's contractor to reduce the possibility of fires during the construction phase of the Project. The plan would be required to include requirements for adequate fuel breaks between areas with flammable vegetation and all grading, site work, and other construction activities. The plan would also be required to include the following measures: fire watch/fire guards during hot work and during use of heavy machinery; hose lines attached to hydrants or a water tender at multiple accessible locations throughout the construction site; Red Flag warning weather period work restrictions; required on-site fire resources; and other measures as determined to be necessary.

There is potential that staged materials could pose a fire risk temporarily during construction. As required by the Project's fuel modification plans, prior to the dropping of lumber at the Project Site, the Project Developer/Owner would be required to provide a fuel modified separation of combustible vegetation for a minimum distance of 100 feet from the location of the structures and lumber stockpile.

Also, prior to occupancy of any of the Project's buildings, a fuel modification inspection would be required to be conducted by the City to ensure that FMZs have been established and maintained and related requirements have been implemented.

With implementation of these measures, construction phase fire risk would be minimized.

Conclusion

With implementation of **MM HAZ-4** through **MM HAZ-10,** the Project would result in a less than significant impact related to this threshold.

4.8.5 CUMULATIVE IMPACTS

Projects considered in the cumulative impact analysis consist of eight projects within the City of Anaheim. These related projects are described in more detail in Table 4-1, Cumulative Projects List, which is provided in Section 4.0.

The Project, along with other cumulative development, could increase the potential exposure of persons or the environment to hazards and hazardous materials, including common hazardous materials that would be used in the construction and operation of same; however, the use, transport, storage, and disposal of hazardous materials are regulated by numerous federal, State, and local laws and regulations including, but not limited to those set forth in or otherwise governed by the comprehensive regulatory framework detailed above, as well as applicable goals and policies of the General Plan, the Municipal Code, the City's Emergency Operations Plan, Be Ready plan, and Know the Way initiative (among others).

Furthermore, similar to the Project, other cumulative projects would be required to mitigate, to the extent necessary, any significant impacts in this regard on a project-by-project basis. With respect to potential impacts associated with impairment of or physical interference with an adopted emergency response plan or emergency evacuation plan, the Project, as well as other cumulative projects, would be required to adhere to applicable federal, State, and local laws and regulations, including, but not limited to applicable goals and policies of the General Plan, the Municipal Code, the Emergency Operations Plan, the Be Ready plan and the Know the Way initiative. Regarding potential impacts associated with wildland fires, while the Project Site and vicinity is in an area of high threat to people and structures from wildland fire, each development would be required to mitigate such risks to the extent feasible on a project-by-project basis, similar to the above-described mitigation for the Project. In doing so, this could help reduce combustible fuel loads, harden structures, increase access roadways, and otherwise enhance wildfire resilience. In addition, cumulative development would be required to adhere to applicable federal, State, and local laws and regulations, including, but not limited to applicable goals and policies of the General Plan, as well as applicable provisions in the Municipal Code and Fire and Building Codes.

To avoid potential effects related to known hazardous materials sites and contaminated soils, it is reasonably foreseeable that lead agencies for each of the cumulative projects would require the developer for each of these projects provide a Phase I Environmental Site Assessment or similar documentation that provides evaluation of hazardous waste sites nearby and which recommend additional studies and/or remediation that may be needed on each of these cumulative project sites. Therefore, with implementation of standard environmental review of each of these projects, less than significant impacts would result related to known hazardous materials sites.

None of the cumulative projects are located with an airport land use plan or within two miles of a public airport or a public use airport. Therefore, none of the cumulative projects have the potential to result in a safety hazard or in excessive noise for people residing or working in the Project Site or vicinity.

Particularly with respect to cumulative impacts associated with emergency access and evacuation, there are two cumulative projects that have the potential to increase evacuation traffic on Santa Ana Canyon Road, which are discussed below.

- DEV2023-00043 consists of a project that would include approximately 450 multiple-family residential units within the Anaheim Hills Festival Specific Plan area. This project site is currently developed as a movie theater; therefore, the existing land use generates some demand for emergency evacuation routes. Using a 2.5 car per unit assumption, which is the same as was used in the Project's Evacuation Travel Time Analysis report, this cumulative project could result in up to approximately 1,125 additional cars needing to evacuate the area during an emergency, which does not account for existing traffic/people on-site associated with the movie theater use. This cumulative project is near the center of the Anaheim Hills Festival shopping center and distant from natural open space areas, and is assumed to evacuate eastbound in the event of a wildfire event, while the Proposed Project would evacuate westbound, which is consistent with Know Your Way. Therefore, this cumulative project would not substantially add to evacuation travel time for individuals in the Project Site or in evacuation zones 8, 9, 10, or 13.
- DEV2020-00204 consists of a project that would include a 180-acre cemetery just east of Gypsum Canyon Road and Santa Ana Canyon Road. This project site is currently undeveloped and it therefore does not result in any evacuation demand. This cumulative project would result in visitors and employees at the cemetery site throughout each day of the week. Therefore, this project would increase demands for evacuation routes above existing conditions. Know Your Way does not cover this far east within the City of Anaheim; however, it is unlikely that users of the cemetery site would compete for evacuation routes with individuals coming from the Project Site or from other cumulative project sites given the proposed cemetery's location near the intersection of Gypsum Canyon Road and Santa Ana Canyon Road. During an evacuation event, it is likely that individuals would evacuate the cemetery by going north on Gypsum Canyon Road, then westbound on SR-91. Therefore, this cumulative project would not substantially add to evacuation travel time for individuals in the Project Site or in evacuation zones 8, 9, 10, or 13.

Except for DEV2020-00204, the cemetery project, the cumulative projects would not occur on project sites that are particularly prone to wildfire hazards. Therefore, based on the foregoing reasons, these cumulative projects would generally not result in a substantial direct fire risk to people, property, or structures. DEV2020-00204 would be required to develop any proposed structures using urban wildland interface best practices. Also, DEV2020-00204 would be required to implement fuel modification zones and other measures to minimize potential wildfire risk. Collectively, DEV2020-00204, other cumulative developments and the Project would increase demand for fire protection from

Anaheim Fire and Rescue during a future wildfire event; however, through coordination with Anaheim Fire and Rescue staff the Project's increased demand on fire department resources has been evaluated and was confirmed to not be significant. This conclusion is further supported by the above-described considerations.

Therefore, for the foregoing reasons, there would be less than significant cumulative impacts with respect to hazards and hazardous materials.

The Project would be required to implement identified mitigation to reduce impacts associated with hazardous materials, which would help to ensure that any such hazardous materials are not allowed to migrate off-site and combine with other hazardous materials handling operations. Furthermore, similar to the other cumulative developments, the Project would be required to adhere to all applicable laws, regulations, plans and policies, which would further ensure impacts in this regard are less than significant. As described above, development of the Project could increase the potential exposure of persons to hazardous materials, including hazardous building materials; however, the use, storage, and disposal of hazardous materials are regulated by various federal, State, and local laws and regulations including those described in detail above. Furthermore, the Project would be required to adhere to numerous mitigation measures and otherwise ensure compliance with all applicable laws and regulations governing hazards and hazardous materials. Moreover, the Project would be required to implement the above-described numerous design features and proactive planning and management tools intended to enhance wildfire resilience, increase safety and reduce risk to both persons and structures in the event of fire. In particular, these features, mitigation measures and programs, along with compliance with all applicable laws and regulations, would ensure that the Project would not make a cumulatively considerable contribution to this already less than significant cumulative impact, including, without limitation, those related to evacuation and emergency access.

4.8.6 MITIGATION PROGRAM

MM HAZ-1 The Property Owner/Developer shall include appropriate contractual provisions in the agreement with the Project Contractor that obligates the Contractor adhere to the following requirements. First, the Contractor shall transport materials deemed as hazardous in compliance with the applicable requirements of Title 22, Division 4.5 of the California Code of Regulations, the U.S. Department of Transportation regulations in the Code of Federal Regulations (specifically, Title 49, Hazardous Materials Transportation Act and Title 40, Part 263, Subtitle C of Resource Conservation and Recovery Act), California Department of Transportation (Caltrans) standards, and Occupational Safety and Health Administration (OSHA) standards. To ensure implementation of these requirements, the Contractor shall complete the required tracking and reporting in accordance with applicable provisions of the EPA's Hazardous Waste Manifest System requirements. In addition, the Contractor shall ensure that City is copied on all reporting to regulatory agencies throughout the construction process. Prior to issuance of an occupancy permit, the Contractor shall submit to the City a log of all reporting

to regulatory agencies for review to document compliance with the foregoing requirements.

MM HAZ-2 Prior to issuance of the Project's first grading permit, the Property Owner/Developer shall properly remove and dispose of the abandoned light-duty pickup truck located on the Project Site's east-central portion pursuant to applicable laws and regulations. If during truck removal, fuel or other hazardous materials are released or if odors or soil discoloration are observed on the ground, the Property Owner/Developer shall hire a specialized environmental professional to assess, address the extent of any subsurface contamination, and identify appropriate remediation pursuant to applicable laws and regulations, for which the Property Owner/Developer shall implement. After completion of the activities set forth in this **MM HAZ-2**, a memorandum shall be submitted to the City documenting the completion of **MM HAZ-2**.

MM HAZ-3 Prior to issuance of the Project's first grading permit, the Property Owner/Developer shall submit reasonable documentation to the City that additional soil sampling has been conducted for arsenic in the northern portion of the Project Site where past agricultural uses occurred, the purpose of which is to confirm the levels of any residual arsenic. Based on the results of this additional soil sampling, the Property Owner/Developer shall develop and submit a soil management plan based on the results to specify the proper handling and transport procedures (if any) for the impacted soils within the Project Site to minimize potential exposure in accordance with applicable State and Federal laws and regulations. The soil management plan shall be provided to the relevant governing regulatory agency (e.g., DTSC, County, etc.) (or the City, if no other governing regulatory agency) for review pursuant to applicable laws and regulations, which shall be approved prior to the issuance of the applicable grading permit. The approved soil management plan shall be implemented by the Contractor during construction.

MM HAZ-4 Prior to the issuance of each grading permit, a Construction Management Plan shall be prepared by the Property Owner/Developer for the review and approval of the City of Anaheim. The Construction Management Plan shall be prepared in accordance with the applicable requirements contained in the Manual on Uniform Traffic Control Devices (MUTCD). Construction activities shall comply with the approved Construction Management Plan to the reasonable satisfaction of the City of Anaheim. The Property Owner/Developer shall begin coordination with the City on the Construction Management Plan as soon as practicable during the final design process and in advance of construction so that effective measures can be developed to avoid, minimize, and mitigate, to the extent feasible, construction impacts to parking and circulation on-site and in the vicinity of the Project Site.

At a minimum, the Construction Management Plan shall:

- Describe the durations and locations of any temporary lane closures that are needed on Santa Ana Canyon Road.
- Describe the traffic control measures that would be implemented for any temporary lane closures or other disruptions to traffic that would result from Project construction.
- Identify the routes that construction vehicles shall utilize for the delivery of construction materials to access the Project Site and for egress from the Project Site.
- Identify the location of parking and materials storage for construction workers during all phases of construction. Parking for construction workers shall be provided on-site or at additional off-site locations that are not on public streets. Also see **MM BIO-13**.
- Identify emergency access points and emergency access routes to allow for adequate emergency access to/within the Project Site and to parcels to the south of the Project Site throughout all Project construction phases.
- Specify the hours during which transport activities can occur and methods to mitigate construction-related impacts to adjacent streets.
- Requirements that the Contractor keep all haul routes reasonably clean and free of debris including but not limited to gravel and dirt as a result of its operations. The Contractor shall take reasonable and diligent steps to clean adjacent streets of any material which may have been spilled, tracked, or blown onto adjacent streets or areas. Also see **MM BIO-10**.
- The Property Owner/Developer shall obtain a transportation permit pursuant to applicable laws and regulations for oversized loads which will list the applicable haul routes and haul hours. All hauling or transport of oversized loads shall occur between the hours of 8:30 AM and 3:30 PM only, Monday through Friday, unless approved otherwise by the City Engineer. No hauling or transport shall be allowed during nighttime hours, weekends or Federal holidays.
- Include details on the reasonable maintenance of existing bicycle and pedestrian facilities and connectivity through the Project Site during construction to the reasonable satisfaction of the City Engineer.
- Require that haul trucks entering or exiting public streets shall at all times yield to public traffic, pedestrians, bicyclists, and other users.
- Provisions for the Contractor to repair existing pavement, streets, curbs, sidewalks, and/or gutters that may be damaged during Project construction. The repairs shall be completed in consultation with and to the reasonable satisfaction of the City Engineer.

- Require that all construction-related parking and staging of vehicles shall be kept out of the adjacent public roads and shall occur either on-site or on designated off-site parcels that would not adversely affect access to or parking for nearby residences or businesses.

MM HAZ-5 Prior to issuance of a certificate of occupancy for the first multiple-family residential unit, the Property Owner/Developer shall fund and implement closed-circuit television (CCTV) cameras at Imperial Highway/Santa Ana Canyon Road, Anaheim Hills Road/Santa Ana Canyon Road, Fairmont Boulevard/Santa Ana Canyon Road, Deer Canyon Road/Santa Ana Canyon Road, Festival Drive/Santa Ana Canyon Road, and Weir Canyon Road/Santa Ana Canyon Road.

MM HAZ-6 To minimize wildfire risks to the residents of the existing residences west of the Project Site as they wait to evacuate their neighborhood during a future evacuation event, the Property Owner/Developer shall maintain a fuel modification zone along the entire western boundary of the Project Site. As with other fuel modification zones, these additional fuel modification areas shall be maintained twice annually and in perpetuity by the Property Owner/Developer, with this requirement being implemented by the Property Owner/Developer or a Homeowner's Association pursuant to recorded Conditions, Covenants and Restrictions (CC&Rs). The additional areas that are added to the Project's fuel modification zones by this measure are depicted in Exhibits 4.8-1 and 4.8-2 of the Draft EIR, which shall be incorporated into this **MM HAZ-6** by this reference.

MM HAZ-7 Prior to issuance of a certificate of occupancy for the first multiple-family residential unit, the Property Owner/Developer shall develop and implement a project-specific wildfire evacuation and awareness plan. The plan shall be subject to review and approval by the City of Anaheim Planning Department, APD, and Anaheim Fire and Rescue staff. The plan shall include the following minimum requirements:

- The plan shall be provided to all tenants along with all lease agreements for tenants.
- The plan shall include provisions and travel movements for evacuating the Project Site during a wildfire event that is located in the undeveloped areas immediately adjacent to the Project Site and for other events where the wildfire threat is further away.
- The plan shall include the development and dissemination of wildfire evacuation outreach materials. These materials shall be provided to residents and employees within the Project Site annually. The outreach materials shall depict evacuation routes to use in case of a wildfire event and shall provide other practical wildfire preparedness information.

- The plan shall include requirements for annual emergency evacuation drills for residents and employees in the Project Site.
- The plan shall include the development, implementation, and ongoing maintenance of a method for the Property Owner/Develop to quickly and effectively communicate evacuation instructions to individuals at the Project Site, such as through the installation and maintenance of a wireless Public Address (PA) system and/or wireless texting services.
- The plan shall include the provisions and ongoing maintenance of a camera. The camera would be oriented towards the southern edge of the Project Site with the primary purpose of providing additional information for emergency service providers to facilitate enhanced emergency response. The Property Owner/Developer shall provide a connection to the City's real-time crime center.

MM HAZ-8 Prior to issuance of a certificate of occupancy for the first multiple-family residential unit, the Property Owner/Developer shall fund and implement emergency vehicle preemption at traffic signals on Santa Ana Canyon Road from Weir Canyon Road to Imperial Highway.

MM HAZ-9: Prior to issuance of a certificate of occupancy, the Property Owner/Developer shall participate through the payment of a fair share contribution to Anaheim Fire and Rescue to support education and outreach including community exercises in support of "Know Your Way" evacuation planning and protocols.

MM HAZ-10 The Property Owner/Developer shall prepare and implement a construction fire prevention plan that shall designate fire safety measures that shall be implemented by the Project's contractor to reduce the possibility of fires during all construction phases of the Project. The plan shall include requirements for adequate fuel breaks between areas with flammable vegetation and all grading, site work, and other construction activities in accordance with applicable requirements and standards. The plan shall also include the following measures: fire watch/ fire guards during hot work and during use of heavy machinery; hose lines attached to hydrants or a water tender at multiple accessible locations throughout the construction site; Red Flag warning weather period work restrictions; required on-site fire resources; and other measures as determined to be necessary.

4.8.7 SIGNIFICANCE AFTER MITIGATION

With implementation of mitigation measures **MM HAZ-1** through **MM HAZ-10**, potentially significant impacts related to hazards and hazardous materials would be reduced to less than significant levels.

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