3.5 HAZARDS AND HAZARDOUS MATERIALS

This section describes the existing setting related to hazards and hazardous materials based on the current conditions, a regulatory database search for the project area, and the federal, state, and local regulations related to hazardous materials that may apply to the project area. The impacts of airborne toxics risks are discussed in Section 3.3, "Air Quality."

3.5.1 REGULATORY SETTING

DEFINITIONS OF TERMS

For purposes of this section, the term "hazardous materials" refers to both hazardous substances and hazardous wastes. A "hazardous material" is defined in the Code of Federal Regulations (CFR) as "a substance or material that … is capable of posing an unreasonable risk to health, safety, and property when transported in commerce" (49 CFR 171.8). California Health and Safety Code Section 25501 defines a hazardous material as follows:

> "Hazardous material" means 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 into the workplace or the environment. "Hazardous materials" include, but are not limited to, hazardous substances, hazardous waste, and any material which a handler or the administering agency has a reasonable basis for believing that it would be injurious to the health and safety of persons or harmful to the environment if released into the workplace or the environment.

"Hazardous wastes" are defined in California Health and Safety Code Section 25141(b) as wastes that:

> … because of their quantity, concentration, or physical, chemical, or infectious characteristics, [may either] cause, or significantly contribute to an increase in mortality or an increase in serious illness [, or] pose a substantial present or potential hazard to human health or the environment when improperly treated, stored, transported, disposed of, or otherwise managed.

FEDERAL

U.S. ENVIRONMENTAL PROTECTION AGENCY

The U.S. EPA is the agency primarily responsible for enforcement and implementation of federal laws and regulations pertaining to hazardous materials. Applicable federal regulations pertaining to hazardous materials are contained mainly in CFR Titles 29, 40, and 49. Hazardous materials, as defined in the CFR, are listed in 49 CFR 172.101. Management of hazardous materials is governed by the following laws (which are described below):

- Resource Conservation and Recovery Act of 1976 (RCRA) (42 U.S. Code [USC] 6901 et seq.);
- Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (CERCLA, also called the Superfund Act) (42 USC 9601 et seq.); and
- Superfund Amendments and Reauthorization Act (SARA) of 1986 (Public Law 99-499).

These laws and associated regulations include specific requirements for facilities that generate, use, store, treat, and/or dispose of hazardous materials. The U.S. EPA provides oversight and supervision for federal Superfund investigation/remediation projects, evaluates remediation technologies, and develops hazardous materials disposal restrictions and treatment standards.

RESOURCE CONSERVATION AND RECOVERY ACT

RCRA establishes a framework for national programs to achieve environmentally sound management of both hazardous and nonhazardous wastes. RCRA was designed to protect human health and the environment, reduce/eliminate the generation of hazardous waste, and conserve energy and natural resources. RCRA also promotes resource recovery techniques. A waste can legally be considered hazardous if it is classified as ignitable, corrosive, reactive, or toxic. Under RCRA, the U.S. EPA regulates hazardous waste from the time that the waste is generated until its final disposal ("cradle to grave"). The Hazardous and Solid Waste Amendments of 1984 (HSWA) both expanded the scope of RCRA and increased the level of detail in many of its provisions. The Hazardous Waste Management subchapter of the RCRA deals with a variety of issues regarding the management of hazardous materials including the export of hazardous waste, state programs, inspections of hazardous waste disposal facilities, enforcement, and the identification and listing of hazardous waste.

CERCLA

Under CERCLA, the U.S. EPA has authority to seek the parties responsible for releases of hazardous substances and ensure their cooperation in site remediation. CERCLA also provides federal funding (the "Superfund") for remediation.

SARA

SARA Title III, the Emergency Planning and Community Right-to-Know Act (EPCRA), requires companies to declare potential toxic hazards to ensure that local communities can plan for chemical emergencies. The U.S. EPA maintains a National Priority List of uncontrolled or abandoned hazardous waste sites identified for priority remediation under the Superfund program. The U.S. EPA also maintains the Comprehensive Environmental Response, Compensation, and Liability Information System database, which contains information on hazardous waste sites, potential hazardous waste sites, and remedial activities across the nation.

TOXIC SUBSTANCES CONTROL ACT

The Toxic Substances Control Act of 1976 (15 USC 2605) banned the manufacture, processing, distribution, and use of polychlorinated biphenyls (PCBs) in totally enclosed systems. PCBs are considered hazardous materials because of their toxicity; they have been shown to cause cancer in animals, along with effects on the immune, reproductive, nervous, and endocrine systems, and studies have shown evidence of similar effects in humans (U.S. EPA 2013a). The U.S. EPA Region 9 PCB Program regulates remediation of PCBs in several states, including California.

HAZARDOUS MATERIALS TRANSPORTATION ACT

The transportation of hazardous materials is regulated by the Hazardous Materials Transportation Act (HMTA), which is administered by the Research and Special Programs Administration of the U.S. Department of Transportation (DOT). HMTA provides DOT with a broad mandate to regulate the transport of hazardous materials, with the purpose of adequately protecting the nation against risk to life and property that is inherent in the commercial transportation of hazardous materials. The HMTA governs the safe transportation of hazardous materials by all modes, excluding bulk transportation by water. DOT regulations that govern the transportation of hazardous materials are applicable to any person who transports, ships, causes to be transported or shipped, or is involved in any way with the manufacture or testing of hazardous materials packaging or containers. DOT regulations pertaining to the actual movement govern every aspect of the movement, including packaging, handling, labeling, marking, placarding, operational standards, and highway routing.

WORKER SAFETY

The U.S. Occupational Safety and Health Administration (OSHA) Hazard Communication Standard (29 CFR 1910.1200) requires that workers be informed of the hazards associated with the materials they handle. For instance, manufacturers must appropriately label containers, material safety data sheets must be available in the workplace, and employers must properly train workers. Workers at hazardous waste sites must receive specialized training and medical supervision according to the Hazardous Waste Operations and Emergency Response regulations (29 CFR 1910.120).

The OSHA Bloodborne Pathogens Standard requires the use of universal precautions (handling all human blood and certain body fluids as if they contain infectious agents) in the workplace.

ASBESTOS AND LEAD

Renovation and demolition of asbestos contaminated buildings is subject to the U.S. EPA National Emissions Standards for Hazardous Air Pollutants and OSHA worker health and safety regulations. Asbestos is the common name for a variety of naturally occurring, fibrous silicate minerals mined for uses including thermal insulation, acoustic insulation, and fireproofing. When asbestos is inhaled it may become lodged in the lungs. Resulting health effects include asbestosis, characterized by irritation and scaring of lung tissue; mesothelioma, a rare form of cancer that targets the lung, chest, abdomen, and heart; and lung cancer (U.S. EPA 2013b).

The U.S. EPA regulates environmental lead through several statutes, including the Toxic Substances Control Act, RCRA, and EPCRA. OSHA regulates workplace lead exposure. In adults, lead poisoning can cause reproductive problems, high blood pressure, hypertension, nerve disorder, memory and concentration problems, and muscle and joint pain. In children, high levels of lead absorption can result in developmental problems, such as damage to the brain, learning difficulties, slowed growth, headaches, and hearing problems (U.S. EPA 2013c).

SAFE DRINKING WATER ACT

Under the Safe Drinking Water Act (Public Law 93-523), passed in 1974, the U.S. EPA regulates contaminants of concern to domestic water supply. Contaminants of concern relevant to domestic water supply are defined as those that pose a public health threat or that alter the aesthetic acceptability of the water. These types of contaminants are regulated by the U.S. EPA's primary and secondary maximum contaminant levels (MCLs), which are applicable to treated water supplies delivered to a distribution system. MCLs and the process for setting these standards are reviewed triennially. Amendments to the Safe Drinking Water Act enacted in 1986 established an accelerated schedule for setting MCLs for drinking water.

The U.S. EPA has delegated to the California Department of Public Health (CDPH) the responsibility for administering California's drinking-water program. CDPH is accountable to the U.S. EPA for program implementation and for adopting standards and regulations that are at least as stringent as those developed by the U.S. EPA. The applicable state primary and secondary MCLs are set forth in Title 22, Division 4, Chapter 15, Article 4 of the California Code of Regulations.

STATE

CALIFORNIA DEPARTMENT OF TOXIC SUBSTANCES CONTROL

The California Department of Toxic Substances Control (DTSC), a division of the California Environmental Protection Agency (Cal/EPA), has primary regulatory responsibility over hazardous materials in California, working in conjunction with the U.S. EPA to enforce and implement hazardous materials laws and regulations. DTSC can delegate enforcement responsibilities to local jurisdictions. The hazardous waste management

program enforced by DTSC was created by the Hazardous Waste Control Act (California Health and Safety Code, Section 25100 et seq.), which is implemented by regulations described in California Code of Regulations (CCR) Title 26. The state program thus created is similar to but more stringent than the federal program under RCRA. The regulations list materials that may be hazardous and establish criteria for their identification, packaging, and disposal. Environmental health standards for management of hazardous waste are contained in CCR Title 22, Division 4.5. In addition, as required by California Government Code Section 65962.5, DTSC maintains a Hazardous Waste and Substances Site List for the state, called the Cortese List.

HAZARDOUS MATERIALS HANDLING AND TRANSPORT

The California Hazardous Materials Release Response Plans and Inventory Law of 1985 (Business Plan Act) requires preparation of hazardous materials business plans and disclosure of hazardous materials inventories. A business plan includes an inventory of hazardous materials handled, facility floor plans showing where hazardous materials are stored, an emergency response plan, and provisions for employee training in safety and emergency response procedures (California Health and Safety Code, Division 20, Chapter 6.95, Article 1). Statewide, DTSC has primary regulatory responsibility for management of hazardous materials, with delegation of authority to local jurisdictions that enter into agreements with the state. Local agencies are responsible for administering these regulations.

Several state agencies regulate the transportation and use of hazardous materials to minimize potential risks to public health and safety, including Cal/EPA and the California Emergency Management Agency. The California Highway Patrol and California Department of Transportation enforce regulations specifically related to the transport of hazardous materials. Together, these agencies determine container types used and license hazardous waste haulers for hazardous waste transportation on public roadways.

HAZARDOUS WASTE CONTROL

The Hazardous Waste Control Act regulates the generation, treatment, storage, and disposal of hazardous waste. Hazardous waste is any material or substance that is discarded, relinquished, disposed of, or burned, or for which there is no intended use or reuse, and the material or substance causes or substantially contributes to an increase in mortality or illness; or the material or substance poses a substantial present or potential hazard to human health or the environment. These materials or substances include spent solvents and paints (oil and latex), used oil, used oil filters, used acids and corrosives, and unwanted or expired products (e.g., pesticides, aerosol cans, cleaners). If the original material or substance is labeled *Danger*, *Warning*, *Toxic*, *Caution*, *Poison*, *Flammable*, *Corrosive*, or *Reactive*, the waste is very likely to be hazardous.

REGULATORY DEFINITIONS FOR HAZARDOUS WASTE

"Hazardous waste" is a subset of hazardous materials and is defined as "wastes that, because of their quantity, concentration, or physical, chemical, or infectious characteristics, may either cause, or significantly contribute to, an increase in mortality or an increase in serious illness, or pose a substantial present or potential hazard to human health or the environment when improperly treated, stored, transported, disposed of, or otherwise managed" (Health and Safety Code, Section 25517). Hazardous materials can be categorized as nonradioactive chemicals materials, radioactive materials, and biohazardous materials. Nonradioactive chemical materials typically fall within the definitions of hazardous materials and hazardous waste, as defined above. Radioactive and biohazardous materials are further defined below:

- Biohazardous materials are materials that contain certain infectious agents (microorganisms, bacteria, molds parasites, viruses) that normally cause or significantly contribute to increased human mortality, or organisms that are capable of being communicated by invading and multiplying in body tissues. *(Health and Safety Code, Section 117635)*

- Medical waste includes both byproducts of biohazardous materials and devices capable of cutting or piercing (commonly referred to as "sharps"), such as hypodermic needles, razor blades, and broken glass, resulting from the diagnosis, treatment, or immunization of human beings, or research pertaining to these activities. *(Health and Safety Code, Section 117690)*
- Radioactive materials contain atoms with unstable nuclei that spontaneously emit ionizing radiation to increase their stability. Radioactive wastes are radioactive materials that are discarded, including waste in storage, or abandoned. *(Health and Safety Code, Section 114710)*

GOVERNMENT CODE SECTION 65962.5

The provisions of Government Code Section 65962.5 are commonly referred to as the "Cortese List." The Cortese List is a planning document used by state and local agencies to comply with CEQA requirements in providing information about the location of hazardous materials release sites. Government Code Section 65962.5 requires Cal/EPA to develop and updated Cortese List annually, at minimum. DTSC is responsible for a portion of the information contained in the Cortese List. Other California state and local government agencies are required to provide additional hazardous material release information for the Cortese List.

MULTI-HAZARD MITIGATION PLAN

The California Emergency Management Agency adopted the 2007 State Hazard Mitigation Plan on October 8, 2007. This plan is the official statement of California's statewide hazard mitigation goals, strategies, and priorities. Hazard mitigation can be defined as any action taken to reduce or eliminate long-term risk to life and property by natural and human caused disasters. The plan, required under federal law, includes chapters on hazard assessment, local hazard mitigation planning, and mitigation strategy and must be updated every three years.

PUBLIC HEALTH AND WORKER SAFETY REQUIREMENTS

The California Human Health Screening Levels (CHHSLs) are concentrations of 54 hazardous chemicals in soil or soil gas that Cal/EPA considers to be below thresholds of concern for risks to human health. The CHHSLs were developed by the Office of Environmental Health Hazard Assessment on behalf of Cal/EPA. The thresholds of concern used to develop the CHHSLs are an excess lifetime cancer risk of one-in-a-million and a hazard quotient of 1.0 for noncancer health effects. The CHHSLs were developed using standard exposure assumptions and chemical toxicity values published by the U.S. EPA and Cal/EPA.

The California Division of Occupational Safety and Health (Cal/OSHA) is responsible for developing and enforcing workplace safety standards and assuring worker safety in the handling and use of hazardous materials. Among other requirements, Cal/OSHA requires many entities to prepare injury and illness prevention plans and chemical hygiene plans, and provides specific regulation to limit exposure of construction workers to lead.

The California Department of Public Health (formerly California Department of Health Services) regulates the generation, handling, storage, treatment, and disposal of medical waste in accordance with the California Medical Waste Management Act (California Health and Safety Code, Sections 117600–118360). This law requires medical waste generators to register with the CDPH, Medical Waste Management Program, and submit a medical waste management plan to the local enforcement agency.

The use of radiologic materials is governed by the Radiologic Health Branch of the California Department of Public Health's Food, Drug, and Radiation Safety Division. The branch enforces the following laws and regulations designed to protect the public, radiation workers, and the environment:

- Radiation Control Law (Health and Safety Code, Section 114960 et seq.);

- Radiologic Technology Act (Health and Safety Code, Section 27[f]); and
- Nuclear Medicine Technology Certification (Health and Safety Code, Sections 107150–107175).

Regulations implementing the above laws are in CCR Title 17, Division 1, Chapter 5, Subchapters 4.0, 4.5, and 4.6.

The Dangerous Weapons Control Laws (Title 2 of Part 4 of the California Penal Code), enforced by the California Department of Justice, lay out specific "safe storage" requirements for firearms and other weapons.

STATE WATER RESOURCES CONTROL BOARD AND REGIONAL WATER QUALITY CONTROL BOARDS

The State Water Resources Control Board (SWRCB) and nine regional water quality control boards (RWQCBs) are responsible for ensuring implementation and compliance with the provisions of the federal Clean Water Act and the Porter-Cologne Act of 1969. The Porter-Cologne Act is California's statutory authority for the protection of water quality. Along with the SWRCB and RWQCBs, water quality protection is the responsibility of numerous water supply and wastewater management agencies, as well as city and county governments, and requires the coordinated efforts of these various entities. Individual RWQCBs are responsible for identifying, monitoring, and cleaning up leaking underground storage tanks (LUSTs). The SFRWQCB's underground storage tank (UST) cleanup unit provides technical and regulatory oversight for the investigation and cleanup of sites with leaks from USTs. LUSTs are an important threat to groundwater and pose a potential threat to human health, safety, and the environment.

FIRE HAZARD SEVERITY ZONES

Sections 4201–4204 of the California Public Resources Code and Sections 51175–51189 of the Government Code require identification of fire hazard severity zones within the state of California. Fire prevention areas considered to be under state jurisdiction are referred to as "state responsibility areas." In state responsibility areas, the California Department of Forestry and Fire Protection (CAL FIRE) is required to delineate three hazard ranges: moderate, high, and very high; whereas "local responsibility areas," which are under the jurisdiction of local entities (e.g., cities, counties), are required to only identify very high fire hazard severity zones. The hazard ranges are measured quantitatively, based on vegetation, topography, weather, crown fire potential (a fire's tendency to burn upward into trees and tall brush), and ember production and movement within the area of question.

LOCAL

NAPA COUNTY GENERAL PLAN

The Safety Element of the *Napa County General Plan* (2008) contains the following policies that are potentially pertinent to the proposed project in regards to hazards and hazardous materials:

- **Policy SAF-3**. The County shall evaluate potential safety hazards related when considering General Plan Amendments, rezonings, or other project approvals (including but not limited to new residential developments, roads or highways, and all structures proposed to be open to the public and serving 50 persons or more) in areas characterized by: 1) slopes over 15%, 2) identified landslides, 3) floodplains, 4) medium or high fire hazard severity, 5) former marshlands, or 6) fault zones.
- **Policy SAF-20**. All new development shall comply with established fire safety standards. Design plans shall be referred to the appropriate fire agency for comment as to:
  - Adequacy of water supply.
  - Site design for fire department access in and around structures.

- Ability for a safe and efficient fire department response.
- Traffic flow and ingress/egress for residents and emergency vehicles.
- Site-specific built-in fire protection.
- Potential impacts to emergency services and fire department response.

- **Policy SAF-31**. All development projects proposed on sites that are suspected or known to be contaminated by hazardous materials and/or are identified in a hazardous material/waste search shall be reviewed, tested, and remediated for potential hazardous materials in accordance with all local, state, and federal regulations.

CERTIFIED UNIFIED PROGRAM AGENCY

Senate Bill 1082 (1993) established the Unified Hazardous Waste and Hazardous Materials Management Regulatory Program. The Unified Program consolidates, coordinates, and makes consistent hazardous materials and hazardous waste program elements. A Certified Unified Program Agency (CUPA) is a county, city, or joint powers agency approved and designated by Cal/EPA to implement the Unified Program and is responsible for all six program elements of the Unified Program within its jurisdiction. The Napa County Planning, Building, & Environmental Services Department (PBES) is the CUPA for Napa County, including all of its cities. As the CUPA, the Napa County PBES administers the following Unified Programs:

- Hazardous Materials Release Response Plans and Inventory (Business Plan) Program,
- California Accidental Release Prevention Program,
- Underground Storage Tank Program,
- Hazardous Waste Generator and Hazardous Waste On-Site Treatment Programs, and
- Above Ground Storage Tank Program (Spill Prevention, Control and Countermeasure Plans).

NAPA COUNTY CODE, UNDERGROUND STORAGE OF HAZARDOUS SUBSTANCES (CHAPTER 16.20)

In conformity with the provisions of Division 20, Chapter 6.7 (commencing with § 25280) of the California Health and Safety Code and regulations adopted by the SWRCB (in conformity with Title 23, Subchapter 16 of the California Code of Regulations), Napa County Code contains a program to prevent contamination from and improper storage of hazardous substances stored underground.

NAPA OPERATIONAL AREA HAZARD MITIGATION PLAN

In 2004, Napa County adopted the *Napa Operational Area Hazard Mitigation Plan* (OAHMP), which includes mitigation for addressing the most significant hazards in the County (floods, earthquakes, wildland interface fires, and terrorism and technological hazards). The OAHMP's Mitigation Strategy includes goals, programs, objectives and action items that help to ensure effective emergency response to significant hazards. Objectives and action items in the OAHMP include community education programs, post-emergency power generation plans, remote area detection systems, and communication and response systems that contribute to effective emergency response in the County (Napa County 2004).

The OAHMP is required to be updated every 5 years; the last update was initiated in 2009 and the updated OAHMP was submitted to State and Federal review parties in 2010. As part of the adoption process, the California Emergency Management Agency and the Federal Emergency Management Agency (FEMA) must review and approve the content and the planning process used to develop the OAHMP. The State approved the OAHMP; however, FEMA "rejected" it through a number of draft submittal processes. Over the last year, the County has been working with FEMA to improve plan content and documentation.

3.5.2 ENVIRONMENTAL SETTING

PROJECT SITE

The Boca parcel is approximately 55 acres, and is currently leased out for a number of uses. The Boca parcel is occupied by at least three industrial buildings, industrial and/or commercial manufacturing purposes, and paved areas in the western portion; unimproved roads and undeveloped land in the eastern portion; and a concrete apron that appears to have been used as a working surface for site activities in the northern portion. The three industrial buildings were constructed by Basalt Rock Company between 1948 and 1982. Several smaller structures are located throughout the Boca parcel.

The Pacific Coast parcel is approximately 27 acres, and is currently used by Pacific Coast Supply for warehousing of retail and wholesale building materials, including roofing, insulation, drywall, waterproofing, acoustical, and masonry products. The Pacific Coast parcel contains a complex of eight abandoned industrial buildings; two small modern buildings; and a rectangular, open bay, partitioned sand/gravel storage area. A majority of the western portion of the Pacific Coast parcel has in the past or continues to be used for industrial and/or commercial manufacturing purposes. The northern half of the Pacific Coast parcel is mostly aggregate fill material with some undeveloped land.

Domestic water is currently supplied to the project site (both parcels) from a private water system that uses local groundwater wells.

PHASE I ENVIRONMENTAL SITE ASSESSMENT

In early 2012, a preliminary and limited Phase I Environmental Site Assessment (ESA) was conducted for the Boca parcel by EBA Engineering (Napa County 2012). Because no legal address appears to be associated with the Boca parcel, the environmental record search included two addresses associated with the Boca parcel, 2301 and 2303 Napa Vallejo Highway. Based on this report, it appears that the 2301 Napa Vallejo Highway address is also associated with the Pacific Coast parcel. It should be noted that 2301 Napa Vallejo Highway is also associated with several neighboring parcels and historic properties in the immediate area of the project site; therefore, it is difficult to discern which listings apply to the project site at this time.

The environmental record search identified both of these addresses on several environmental databases related to the historic quarry operations and the use and/or generation of hazardous materials or liquid by various site owners and/or tenants over time. Both addresses were listed in the record search under the Hazardous Waste Information System (HAZNET) and/or Small Quantity Generator (SQG) database under various business names. As defined in 40 CFR 260.10, a SQG generates more than 100 kilograms, but less than 1,000 kilograms, of hazardous waste per month. Information reviewed from DTSC's database indicates 13 U.S. EPA identification listings under the address 2301 Napa Vallejo Highway. Of these listings, three were considered active in early 2012 under the operations of Thompson Metal Fabrication Inc., Syar, and Superior Equipment Company Inc. There are also active U.S. EPA identification listings for 2303 Napa Vallejo Highway under the operations of Boca Company LLC, Rammed Earth Works, and R & M Grading, Inc. (Napa County 2012). Of these listings, there were no violations reported except for at the Basalt Rock/Rock Company. The Phase I ESA provides minimal detail related to these violations, indicating that they occurred on July 21, 1988, and consisted of the following areas of violation: LDR-General and Generators – General. No additional detail is available regarding this listing; however, subsequent property owners have occupied the site and no additional remediation actions have been noted on agency databases; therefore, it is likely that the issue has been resolved (Napa County 2012).

Waste discharge requirements (WDRs) issued by the SFRWQCB are associated with the address 2301 Napa Vallejo Highway under Basalt Rock Company. Files reviewed at the Napa County PBES included information related to WDRs for Basalt Rock Company regarding the discharge of wash water to the Napa River from a

settling pond. Several complaints were noted in regulatory agency files with regard to the operation of the settling pond and discharge of wastewater to the Napa River. The complaints appear to have been resolved through the actions of regulatory agencies requirements to the operators at the project site. The settling pond was located on the neighboring property east of the Boca parcel, however due to the common ownership and operation of these properties together at that time, it is unknown if activities at the project site contributed to or were associated with the operation and/or discharge from the pond (Napa County 2012:8).

Historic information reviewed at the Napa County Historical Museum for the Basalt Rock Quarry indicates that the largest building on the Boca parcel was used for the production of precast panels for concrete homes and buildings. Information indicates that the panels were cured in pits located within the building that measured 65 feet long by 8 feet wide by 13 feet deep (Napa County 2012:8).

Aerial photos indicate two aboveground fuel tanks (AGTs) located in the central portion of the Boca parcel. Due to restricted access to the site, the current use of these AGTs or other tanks on the site is unknown. The 2301 Napa Vallejo Highway address was identified under Basalite Block/Rock for having a 10,000-gallon diesel underground fuel storage tank (UST) and Basalt Rock Division of Dillingham for having at least two 500-gallon waste oil USTs near a maintenance shop. (Napa County 2012:8). The Pacific Coast parcel is listed in databases and agency files for having completed an investigation related to a former UST. A 10,000-gallon diesel UST was reportedly removed from the site in 1994 and analytical results indicated impacts to soil and groundwater in the area of the UST, dispenser island, and associated piping. Subsurface investigation activities were conducted to determine the extent of impacts resulting from the former UST and groundwater monitoring was conducted from 1996 to 2001. The monitoring indicated the presence of petroleum hydrocarbons in groundwater at the Pacific Coast parcel and subsequently concluded that environmental impacts to groundwater were naturally attenuating and that no additional monitoring was required. The Napa County PBES concurred and issued a remedial action completion letter for the Pacific Coast site in January 2002 (Napa County 2012:8, 10).

ADDITIONAL DATABASE SEARCHES

The U.S. EPA's Envirofacts database was searched to confirm the information presented in the 2012 Limited Phase I ESA prepared for the project area, and to identify potential hazardous contamination sites within the project site and in the immediate surrounding area. The Envirofacts database presents information from several regulatory agencies and databases. Under the address 2301 Napa Vallejo Highway, Basalite Block/Rock, Syar, and Syar Shooting Range are listed as active RCRA SQGs of hazardous wastes. The database indicates site cleanup was certified in 2005 at Syar Quarry Shooting Range. No active RCRA generators of hazardous waste were associated with 2303 Napa Vallejo Highway (U.S. EPA 2013d).

DTSC's EnviroStor database was also searched to confirm the information presented in the 2012 Limited Phase I ESA prepared for the Boca parcel. EnviroStor maps properties regulated by DTSC and identifies where extensive investigation and/or cleanup actions have been completed. Four listings under the 2301 Napa Vallejo Highway address are listed in the Envirostor database. Syar is listed as a LUST cleanup site and a Spills, Leaks, Investigation, and Cleanups (SLIC) site that contained two USTs (one removed and one closed in place in 1998) and three aboveground storage tanks (ASTs) (removed in 2003). These two cleanup cases were completed and closed in March 2007 and associated groundwater monitoring wells were destroyed in April 2007. Under the same address, Pacific Coast Supplies is listed as a LUST cleanup site with freon as the potential contaminant of concern and soil as the affected media on the site. As indicated above, this cleanup case was completed and closed in January 2002. Syar Industries Shooting Range, located west of Napa Vallejo Highway, is listed as a voluntary cleanup site. The Basalt Rock Company began operations at the Napa Rock Quarry (Quarry) in 1924. Operations included a rock quarry and aggregate manufacturing facilities. Syar purchased the Quarry from Basalt Rock Company in 1986. Syar has continued operations since the acquisition of the Quarry. Certification of completion of all remedial actions outlined in the Final Removal Action Workplan was completed in March 2005

(DTSC 2013). There are no DTSC listings associated with the 2303 Napa Vallejo Highway address or other properties located adjacent to the project site.

WILDFIRE RISK

The term "wildland/urban interface" was coined in 1976 by CAL FIRE to identify the condition where highly flammable native vegetation meets high value structures, primarily residences. In most cases, there is not a clearly defined boundary or interface between the structures and vegetation that present the hazard. Historically, residences in these ill-defined wildland/urban intermix boundary areas were particularly vulnerable to wildfires because they were constructed with a reliance on fire department response for protection rather than fire resistance, survivability and self-protection. However, in the recent past, there has developed a greater appreciation for the need to regulate development in these hazardous areas as a result of a number of serious statewide wildland fire conflagrations.

The severity of the wildfire hazard is determined by the relationship between three factors: fuel classification, topographic slope and critical fire weather frequency. Napa County's Fire Hazard Areas generally fall into the Medium Fuel category. Critical fire weather conditions occur in periods of relative low humidity, high heat and high winds. Napa County typically has critical fire weather from two to seven days annually. Based on CAL FIRE's map of Fire Hazard Severity Zones within State Responsibility Areas, the project site is classified as having a "Moderate" fire hazard rating (CAL FIRE 2007).

3.5.3 ENVIRONMENTAL IMPACTS AND MITIGATION MEASURES

METHODS AND ASSUMPTIONS

This analysis considers the range and nature of foreseeable hazardous materials use, storage, and disposal resulting from the project and identifies the primary ways that these hazardous materials could expose individuals or the environment to health and safety risks. Local and State agencies would be expected to continue to enforce applicable requirements to the extent that they do so now.

The following reports documenting potential hazardous conditions at the project site were reviewed for this analysis:

- Limited Phase I Environmental Site Assessment, APN 046-370-024, Napa, California, February 2012, by EBA Engineering;
- preliminary design plans for the proposed project; and
- available literature, including databases and maps published by County, State, and Federal agencies.

The information obtained from these sources was reviewed and summarized to establish existing conditions and to identify potential environmental effects, based on the standards of significance presented in this section. In determining the level of significance, the analysis assumes that development of the project would comply with relevant federal, State, and local ordinances and regulations.

THRESHOLDS OF SIGNIFICANCE

Based on Appendix G of the State CEQA Guidelines, a hazards and hazardous materials impact is considered significant if implementation of the proposed project would:

- create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials;

- 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;
- emit hazardous emissions or require handling of hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school;
- be located on a site that is included on a list of hazardous materials sites compiled pursuant to Section 65962.5 of the California Government Code and, as a result, would create a significant hazard to the public or the environment;
- result in a safety hazard for people residing or working in the project area, where the project is located within an airport land use plan or, where such a plan has not been adopted, within 2 miles of a public airport or public-use airport;
- result in a safety hazard for people residing or working in the project area, where the project is located near a private airstrip;
- impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan; or
- expose people or structures to a significant risk of loss, injury, or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands.

ISSUES OR POTENTIAL IMPACTS NOT DISCUSSED FURTHER

Construction activities would involve the use of hazardous materials such as solvents, gasoline, asphalt, and oil. Existing structures would be demolished to allow for construction of new facilities and could contain hazardous building materials, such as lead-based paint (LBP), asbestos containing materials (ACMs), or PCBs, which could potentially expose and adversely affect workers, the public, or the environment as a result of improper handling or use; accident; environmentally unsound disposal methods; or fire, explosion, or other emergencies, resulting in adverse health effects. During operations, the new jail facilities may use solvents, cleaning agents, gasoline, and other hazardous materials. However, all allowable uses would be subject to compliance with federal, state, and local hazardous materials regulations, and would be monitored by the state (e.g., Cal/OSHA and DTSC) and/or County. Therefore, it is not anticipated that the routine use of these materials handled in accordance with these laws and regulations would create a significant hazard to the public or the environment. This issue is not discussed further in this DEIR.

Napa Valley Community College is located approximately 0.15 mile northwest of the project site. As previously discussed, all allowable uses of hazardous materials would be subject to compliance with federal, state, and local hazardous materials regulations, and would be monitored by the state (e.g., Cal/OSHA and DTSC) and/or County. Therefore, it is not anticipated that the routine use of these materials handled in accordance with applicable laws and regulations would create a significant hazard to the public or the environment. Therefore, this issue is not discussed further in this DEIR.

The project site contains sites identified as meeting the “Cortese List” requirement, due to leaking USTs at Pacific Coast Supplies and Syar. Both sites have completed remediation and are considered to be “closed” cases (SWRCB 2013). Therefore, this issue is not discussed further in this DEIR.

Based on a review of available maps and information, no private airstrips are located in the immediate vicinity of the proposed project site. The nearest airport is located approximately three miles southwest of the project site, which is located outside of the Napa County Airport land use compatibility plan area (Napa County 1999:3-17). As such, no safety hazards related to private airstrips or public airports are anticipated. This issue is not evaluated further in this DEIR.

With respect to wildland fire risk, the project site is located within a State Responsibility Area classified as a Moderate Hazard Severity Zone (CAL FIRE 2007), which is the lowest fire hazard designation provided by Napa

County. The majority of the project site is developed. The site is bound by development, including the Napa State Hospital, Syar Napa Quarry, vineyard, and the Napa-Vallejo Highway/SR 221, with minimal frontage to natural space at the northeastern corner of the project site. Based on the location of the proposed development, the construction and operation of the jail and ancillary facilities are not anticipated to pose a greater risk of fire that would expose people or structures to injury or loss. The project would be required to comply with Policy SAF-20 of the *Napa County General Plan* (2008), which requires all new development in the County to comply with established fire safety standards. Therefore, project implementation would not expose people or structures to a significant wildland fire risk, and this issue is not evaluated further in this DEIR.

IMPACT ANALYSIS

Impact 3.5-1	**Exposure of Construction Workers and the Environment to Hazardous Materials.** A 2012 environmental record search identified two addresses associated with the project site on several environmental databases related to historic quarry operations and the use and/or generation of hazardous materials by various site owners and/or tenants over time. Both addresses were listed in the record search under the HAZNET and/or Small Quantity Generator (SQG) database under various business names. Currently, the project site is used for various industrial purposes. Based on prior history of the project site and surrounding area, proposed demolition, excavation, and facility construction activities on the project site could result in the exposure of construction workers and the general public to previously undiscovered hazardous materials contamination. This impact is considered ***potentially significant.*** This impact could be reduced to a less-than-significant level through implementation of Mitigation Measure 3.5-1.

Construction-related activities, such as the use of equipment that contains hazardous materials (e.g., diesel-fueled equipment), the excavation and transportation of contaminated soil, and the demolition and renovation of existing aged structures, could expose construction workers and the environment to hazardous materials. Development of the new jail would involve grading, excavation, and building construction. Potential sources of hazardous materials that exist within the project site are described below.

Aerial photos indicate two AGTs located in the central portion of the Boca parcel. Due to restricted access to this parcel, the current use of these AGTs or other tanks within the parcel is unknown. In addition, four listings for previous cleanup sites under the 2301 Napa Vallejo Highway address are listed in the Envirostor database, three of which may be located within the boundaries of the project site (Boca and Pacific Coast parcels). These cleanup sites include two LUST cleanup sites, and one SLIC site that contained two USTs (one removed and one closed in place in 1998) and three ASTs (removed in 2003). All of these cleanup site cases have been completed and closed. Because a portion of the project site (Pacific Coast parcel) was unavailable for inspection and a Phase I ESA has not been performed for this parcel, it is unknown whether past operations at this parcel have resulted in any site contamination issues that could result in an adverse environmental condition. Further, due to the historic quarry operations and the past use and/or generation of hazardous materials at the project site, there is potential for the presence of undiscovered hazardous materials at the project site that could be uncovered during site construction activities.

Because of the age of the existing industrial buildings and structures, there is a possibility that LBP and ACM may be present in building materials. In addition, electrical switches, light ballasts, and transformers containing PCBs may also be present. If allowed to deteriorate, these materials could result in localized lead and asbestos contamination. Further, construction activities could encroach upon structures containing these materials, which could cause a release to the environment. These materials could also become airborne during demolition and construction activities and create a hazard for construction workers at the project site. Exposure to asbestos and/or lead as well as PCBs could lead to adverse health effects.

With the proposed demolition of existing facilities at the project site and excavation of the site for utilities, trenching, backfilling, and construction of proposed facilities associated with project development, there is potential for construction workers and the general public to be exposed to previously undiscovered hazardous materials contamination. These hazardous materials could include petroleum hydrocarbons, pesticides, herbicides, and fertilizers; freon; contaminated debris; elevated levels of chemicals that could be hazardous; or hazardous substances that could be inadvertently spilled or otherwise spread. Release and/or exposure to hazardous materials could result in a safety hazard for people residing or working in the project area.

Because soils, groundwater, and existing structures at the project site could contain unknown hazardous materials associated with the historic quarry operations and the past industrial use of the site, as well as hazardous building materials such as lead and asbestos, construction workers and the environment could be exposed to these materials during project construction and operation. This impact is considered **potentially significant**.

Mitigation Measure 3.5-1: Prepare and Implement Health and Safety Plan

To avoid health risks to construction workers, the County will prepare a Health and Safety Plan prior to initiating any demolition, grading, or other earthmoving activities. This plan will outline measures that will be employed to protect construction workers and the public from exposure to hazardous materials during demolition and construction activities.

These measures could include, but would not be limited to, posting notices, limiting access to the site, air monitoring, watering, and installation of wind fences. Contractors will be required to comply with state health and safety standards for all demolition work. If necessary, this will include compliance with OSHA and Cal-OSHA requirements regarding exposure to asbestos and lead-based paint.

In addition, the plan shall include procedures to follow in the event that contaminated soil and/or groundwater or other hazardous materials are generated or encountered during construction. Such procedures could include, but would not be limited to, the following:

- *all work shall be halted in the affected area and the type and extent of the contamination shall be determined.*
- *the project contractor will notify the Napa County Environmental Health Division if evidence of previously undiscovered soil or groundwater contamination (e.g., stained soil, odorous groundwater) is encountered during excavation.*
- *any contaminated areas will be remediated in accordance with recommendations made by the Napa County Environmental Health Division, SFRWQCB, and DTSC.*
- *remediation activities could include but would not be limited to the excavation of contaminated soil areas and hauling of contaminated soil materials to an appropriate off-site disposal facility, mixing of on-site soils, and capping (i.e., paving or sealing) of contaminated areas.*

Before demolition of any structure, or removal of building materials, the County will hire a qualified consultant to investigate whether any building materials to be removed contain lead or asbestos-containing materials that could become friable or mobile during demolition/construction activities. If found, the lead- or asbestos-containing materials will be removed by an accredited inspector in accordance with U.S. EPA and Cal-OSHA standards. In addition, all activities (construction or demolition) in the vicinity of these materials will comply with Cal-OSHA asbestos worker construction standards. The lead- or asbestos-containing materials will be disposed of properly at an appropriate off-site disposal facility.

Implementation of this mitigation measure would reduce potentially significant impacts associated with the potential exposure of construction workers and the general public to previously undiscovered hazardous materials contamination to a **less-than-significant** level because the County will prepare a site Health and Safety Plan; investigate the extent to which soil and/or groundwater has been contaminated from past operations; and identify in the Health and Safety Plan any necessary remediation activities appropriate for proposed land uses, including appropriate removal of any ACMs or LBPs, excavation and removal of on-site contaminated soils, and redistribution of clean fill material on the project site.

Impact 3.5-2	**Impacts From Implementation Of Or Physical Interference With An Adopted Emergency Response Plan Or Emergency Evacuation Plan.** The specific access and circulation plan for the proposed project is still in the design phase and a site-specific emergency response plan has not been prepared. Therefore, the project's compatibility with implementation of or physical interference with an adopted emergency response plan or emergency evacuation plan is currently unknown. This would be a ***potentially significant*** impact. This impact could be reduced to a less-than-significant level through implementation of Mitigation Measure 3.5-2.

As noted above, the OAHMP includes goals, programs, objectives and action items that help to ensure effective emergency response to significant hazards. Objectives and action items in the OAHMP include community education programs, post-emergency power generation plans, remote area detection systems, and communication and response systems that contribute to effective emergency response in the County (Napa County 2004).

The specific access and circulation plan for the proposed project is still in the preliminary design phase and a site-specific emergency response plan has not been prepared. Therefore, the project's compatibility with adopted emergency response plans and emergency evacuation plans is unknown. This would be a **potentially significant** impact.

Mitigation Measure 3.5-2: Prepare Emergency Response Plan Consistent with the County's OAHMP

The County will prepare an emergency response plan for the new jail in coordination with first responders and other emergency agencies. The plan will include an evacuation plan for the site that will detail what parties are responsible for specific response actions. The plan will also identify applicable mitigation from the OAHMP; this may include community education programs, post-emergency power generation plans, remote area detection systems, and communication and response systems that contribute to effective emergency response in the County. The emergency response plan for the new jail will be approved by the Napa County PBES and the Napa County Fire Chief prior to issuance of occupancy permits.

Implementation of this mitigation measure would reduce the project's potential impacts to adopted emergency response plans and evacuation plans to a **less-than-significant** level because the County would prepare a site-specific emergency response plan that would be consistent with the County's OAHMP.