3.8 HAZARDS AND HAZARDOUS MATERIALS

This section of the Environmental Impact Report (EIR) describes the existing conditions related to hazards and hazardous materials at the Beach Cities Health District (BCHD) campus and assesses the potential for impacts that could result from the implementation of the proposed BCHD Healthy Living Campus Master Plan (Project). A range of other types of hazards are addressed in other sections of this EIR, including: hazardous air pollutants (e.g., toxic air contaminants [TACs] and diesel particulate matter [DPM]) addressed in Section 3.2, *Air Quality*; geologic hazards (e.g., earthquakes) addressed in Section 3.6, *Geology and Soils*; urban fire protection services and response/suppression systems discussed in Section 3.13, *Public Services*; and transportation-related hazards (e.g., pedestrian and bicycle safety) discussed in Section 3.14, *Transportation*.

Hazardous materials are defined as substances with physical and chemical properties of flammability, corrosivity, reactivity, or toxicity, which may pose a threat to human health or the environment. The term *"hazardous materials"* is used in this section to refer to chemicals such as petroleum products, solvents, agricultural pesticides, herbicides, paints, metals, asbestos-containing material (ACM), lead-based paint (LBP), and other regulated materials (e.g., polychlorinated biphenyls [PCBs]). Additionally, the term *"release"* as used in this section includes known historical spills, leaks, illegal dumping, or other methods of release of hazardous materials to soil, sediment, groundwater, or surface water.

- **PHASE I ESA:** Phase I ESAs are due diligence reports prepared in advance of real estate transactions to identify existing or potential environmental contamination liabilities. The scope and requirements of a Phase I ESA are described in American Standard for Testing and Materials (ASTM) E-1527-13. Phase I ESAs generally rely on a site inspection, interviews, and database searches to identify the potential for Recognized Environmental Conditions (RECs) (i.e., potential sources of environmental contamination) associated with the underlying land as well as the physical improvements to the property.
- **PHASE II ESA:** If the Phase I ESA determines that there are RECs (i.e., potential sources of environmental contamination), then a Phase II ESA may be conducted. Phase II ESAs include targeted sampling, investigation, and analysis of the potential soil and/or groundwater contamination identified in the Phase I ESA.

The analysis of potential impacts associated with hazards and hazardous materials is based the findings of a Phase I Environmental Site Assessment (ESA) (2019) and a Phase II ESA (2020) prepared by Converse Consultants (see Appendix G). The Phase I ESA included an environmental regulatory database search as well as visual inspection of the Project site and the adjacent properties (e.g., Redondo Village Shopping Center, Dominguez Park, etc.). Based on the findings of the Phase I ESA, which identified potential sources of contamination including a previously abandoned and plugged oil and gas well located on the Flagler Lot as well

as a former dry cleaner located within the Redondo Village Shopping Center, a Phase II ESA was prepared. The Phase II ESA included the collection of soil borings to test for soil contaminants and soil vapor on the Project site. Based on the results of the soil testing, ambient indoor and outdoor air samples were also collected.

3.8.1 Environmental Setting

Historic Land Uses at the Project Site and within the Surrounding Vicinity

A review of available data – including aerial photographs, Sanborn Fire Insurance Maps, topographic maps, and local directories – indicates that the BCHD campus was historically developed as an agricultural use before its redevelopment as the South Bay Hospital beginning in 1958. Surrounding properties were similarly originally developed for agricultural uses and later converted in the 1960s to residential and commercial uses (see Table 3.8-1).

Table 3.8-1. Summary of Aerial Photographs Depicting Previous Development on the Project Site and within the Surrounding Vicinity

Year	Previous Development
1924	The Project site is developed for agriculture uses with a small pond located on-site. The adjacent properties are similarly developed for agricultural uses.
1947	The Project site is vacant with the exception of a second pond located on the vacant Flagler Lot. The adjacent properties are primarily developed for agricultural uses.
1951	The Project site is partially graded; however, there are no substantial changes in development. The adjoining properties are primarily vacant; however, the adjoining property to the northeast appears to be developed as a landfill.
1956	The Project site is developed with a baseball field. There are no substantial differences in development at the surrounding properties.
1963	Former South Bay Hospital (currently Beach Cities Health Center; 514 North Prospect Avenue) is developed; however, adjacent Flagler Lot remains vacant.
1972	There are no substantial changes in development at the Project site. The adjoining properties are developed for residential uses and the property to the northwest is developed as a commercial shopping center with a gas station. The property to the northeast is developed with a park.
1976	The Beach Cities Advanced Imaging Building (510 North Prospect Avenue) has been developed on the Project site.
1989	The Providence Little Company of Mary Medical Institute Building (520 North Prospect Avenue) and an aboveground parking structure are developed on the Project site.

Notes: Available building permits, maintained by the Redondo Beach Building & Safety Division, were reviewed and are described in detail in Appendix G. These permits more specifically describe the timeline of development at 510, 512, 514, and 520 North Prospect Avenue
Source: Converse Consultants 2019, 2020.

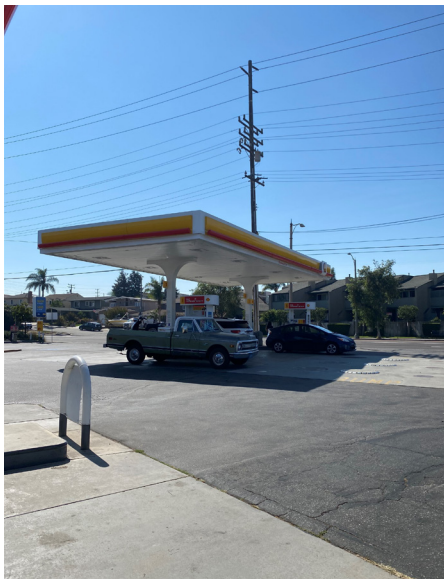
Potential Presence of Hazardous Materials

As previously described, a Phase I ESA was prepared for the proposed Project by Converse Consultants in May 2019 to evaluate current environmental conditions at the Project site (Converse Consultants 2019; see Appendix G). Consistent with the requirements of ASTM E-1527-13, the Phase I ESA included an environmental regulatory database search (e.g., Department of Toxic Substances Control [DTSC] EnviroStor [Cortese List] and the State Water Resources Control Board [SWRCB] GeoTracker databases) as well as a visual inspection of the Project site and the adjacent properties.

Potential Sources of Contamination within the Vicinity of the Project Site

The Phase I ESA identified several potential environmental concerns adjacent to the Project site including:

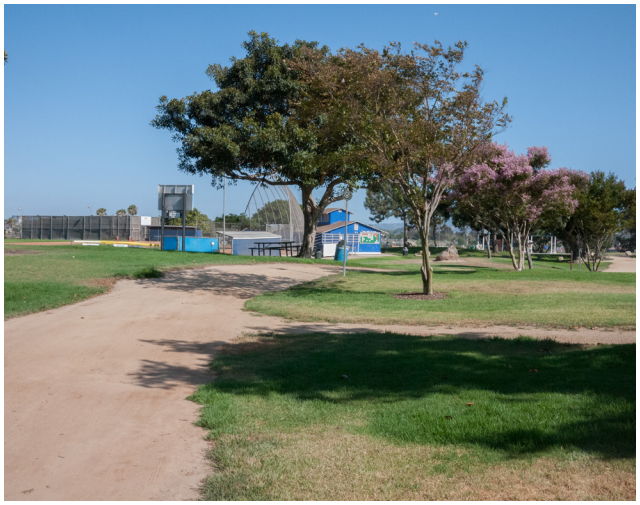
- **Shell Gas Station at 1200 Beryl Street.** The existing Shell gas station is located adjacent to the northwest of the Project site within the Redondo Village Shopping Center. This site has been listed in various environmental regulatory databases for violations related to improper paperwork, improper monitoring, failure to maintain copies of relevant permits/plans on-site, failure to maintain an approved response plan, and other miscellaneous regulatory violations. However, each of these violations has been addressed and the site is currently in compliance (Converse Consultants 2019). This site is also listed in the Leaking Underground Storage Tank (LUST) database for an unauthorized release that was discovered in 2004. However, this release was remediated and a No Further Action was letter was issued by the Los Angeles Regional Water Quality Control Board (RWQCB) on April 12, 2012 (Converse Consultants 2019).



The Redondo Village Shopping Center, located immediately north of the Project site along Beryl Street, includes a Shell gas station, which regularly handles and stores petroleum and diesel products. The Shell gas station was previously listed as a LUST Cleanup Site but has since been remediated with no further action required.

- **Former Dry Cleaner at 1232 Beryl Street.** This site is listed in the Federal Drycleaners Database and appears to have operated from as early as 1990 to 2018 (Converse Consultants 2019). More recently, the location was operated as Coury & Son Cleaners; however, this business permanently closed in January 2018 (Converse Consultants 2019). As described in further detail below, the former dry cleaner that operated at the Redondo Village Shopping Center is suspected to be a source of tetrachloroethylene (PCE) soil contamination at the Project site and the neighboring properties (Converse Consultants 2020). Beginning in the mid-1930s, the dry cleaning industry began to use PCE as a primary solvent due to its cleaning power and compatibility with most clothing. Machines of this era were *"vented,"* meaning that their exhaust was expelled to the atmosphere, much like modern day tumble-dryer exhausts. Much stricter controls on solvent emissions have ensured that modern-day dry cleaning machines are now fully enclosed so no solvent fumes are vented to the atmosphere. PCE is a liquid that has the potential to enter into groundwater and/or volatize (i.e., to become a vapor) and permeate building foundations. The effects of PCE on human health depend greatly on the length and frequency of exposure. Short-term, high-level inhalation exposure (i.e., in confined spaces) can result in irritation of the upper respiratory tracts and eyes, kidney dysfunction, and neurological effects. Long-term exposure (e.g., in confined spaces) can result in neurological impacts including impaired cognitive and motor neurobehavioral performance as well as adverse effects in the kidney, liver, immune system and hematologic system, and on development and reproduction (U.S. Environmental Protection Agency [USEPA] 2016). In contrast exposure to PCE in unconfined spaces presents very limited risk given its rapid volatilization (i.e., evaporation or dispersal in vapor form). As described in further detail below a Phase II ESA – including soil sampling and indoor ambient air quality testing – was conducted at the Project site to determine the extent of PCE contamination as well as the potential for exposure to unsafe levels of PCE within confined spaces (i.e., buildings) on the campus.

- **Former Landfill at 200 Flagler Lane.** This landfill operated from 1904 to 1967, during which time it accepted "inert, residential" waste. The landfill was closed and underwent cleanup beginning in January 1989, after which it was issued a "completed-case closed" designation by the Los Angeles RWQCB on October 1, 2012 (Converse Consultants 2019). The property is currently developed as Dominguez Park, a 24-acre park with grass and trees, picnic areas and play equipment, a dog park, Heritage Court, and two Little League fields.



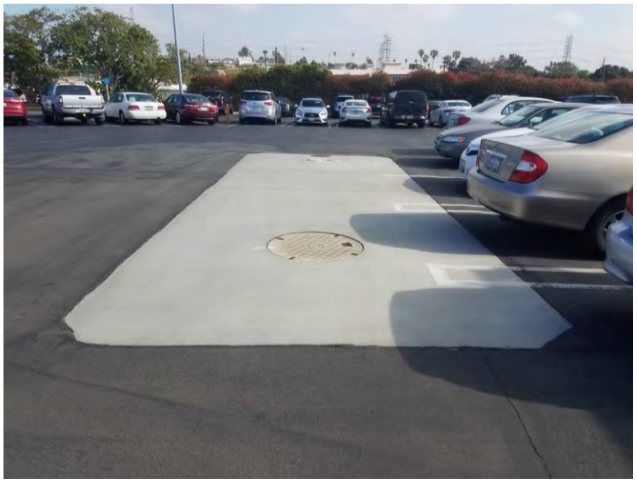
Dominguez Park, which is located immediate adjacent to the northeast of the Project site, was formerly a landfill that was operated from 1904 to 1967.

- **Redondo Village Shopping Center.** Multiple retail store/grocery store listings from within the shopping center were identified in the report as sources of small quantities of hazardous wastes (Converse Consultants 2019). However, no evidence suggesting any unauthorized releases was identified during the Phase I ESA, including the visual site inspection (Converse Consultants 2019).

Potential Sources of Contamination at the Project Site

The Phase I ESA identified several potential environmental concerns at the Project site including:

- **Underground Storage Tank.** One 10,000-gallon underground storage tank (UST) was identified on the existing BCHD campus. This UST, which is located beneath the northern surface parking lot, is plumbed to three back-up generators located within the Maintenance Building at 514 North



One 10,000-gallon UST is located beneath the existing north surface parking lot on the BCHD campus and is associated with back-up generators located within the attached maintenance building.

Prospect Avenue. One transformer was observed in the Maintenance Building and three pad-mounted transformers were observed outdoors adjacent to the building. However, the Phase I ESA determined that neither the UST nor the transformers would be considered hazardous (Converse Consultants 2019).

- **Former Oil and Gas Well.** The Phase I ESA also identified a former oil and gas well (Simmons Well #2) located on the vacant Flagler Lot (Converse Consultants 2019). The well was drilled in the 1930s and, according to production data, was in operation by Decalta International Corporation from July 1977 to October 1989. The well was no longer in production in November 1989 and has been listed by the California Geologic Energy Management Division (CalGEM; formerly the California Department of Conservation, Division of Oil, Gas, and Geothermal Resources [DOGGR]) as *"abandoned and plugged"* (Converse Consultants 2019). CalGEM requires that all well casings shall be cut off at least 5 feet but no more than 10 feet below the surface of the ground. According to available records, it appears that the top of the well casing was cut off at a depth of approximately 6 feet below grade at the time it was abandoned (Converse Consultants 2019, 2020). As described in further detail below a Phase II ESA – including soil sampling – was conducted at the vacant Flagler Lot to determine the potential for soil contamination associated with the former oil and gas well (Converse Consultants 2020).

Hazardous Building Materials at the Project Site

Based on aerial photographs, Sanborn Fire Insurance Maps, and other real estate documents, it was determined that construction of the existing buildings at the Project site occurred between 1958 and 1995. Based on the age of the buildings, the following hazardous building materials may be present on the BCHD campus:

- **Asbestos-Containing Material –** Asbestos is a naturally occurring carcinogenic fiber that was widely used in a variety of building materials as well as in friction and heat-resistant products. The use and manufacturing of ACM was banned in 1977 in California; however, older buildings constructed prior to 1978 may still contain ACM. Materials typically suspected of containing asbestos include drywall, floor tile and mastic, drywall joint compound, drop ceiling tile, stucco, window putty, and roofing materials. Asbestos release can occur after ACMs are disturbed by cutting, sanding or other remodeling activities. Improper attempts to remove ACM can release asbestos fibers into the air, increasing asbestos levels and affecting human respiratory health. The USEPA recommends removal of all ACM prior to renovation or demolition activities (USEPA 2017). Additionally, the

South Coast Air Quality Management District (SCAQMD) has specific regulations concerning demolition and renovation activities involving ACM. Under SCAQMD Rule 1403, Asbestos Emissions from Demolition/Renovation Activities (see Section 3.8.2, *Regulatory Setting*), if renovation or demolition would disturb any suspected ACM a licensed California Certified Asbestos Consultant must first survey the materials for asbestos. If asbestos is found, an asbestos abatement contractor must remove the ACM prior to the renovation or demolition. Physical sampling of ACM was not included in the scope of the Phase I ESA. However, due to the age of the existing buildings on-site it is assumed that ACM is present in one or more of the buildings (Converse Consultants 2019, 2020).

- **Lead-Based Paint –** Lead is a recognized harmful environmental pollutant exposed through air, drinking water, food, contaminated soil, deteriorating paint, and dust. Before the dangers of lead were documented, it was widely used in paint. In 1978, the State of California banned the use of LBP. However, older buildings constructed prior to 1978 may still contain LBP. If LBP is improperly removed from surfaces by dry scraping or sanding, LBP can be absorbed into the body and could pose a potential health risk. Physical sampling of LBP was not included in the scope of the Phase I ESA. However, due to the age of the existing buildings on-site it is assumed that LBP is present in one or more of the buildings (Converse Consultants 2019, 2020).
- **Polychlorinated biphenyls** – PCBs are a group of man-made compounds that were widely used in the past (e.g., in electrical equipment such as transformers and used as hydraulic fluid in older elevators), but which were banned at the end of the 1970s because of environmental concerns. During the visual site inspection associated with the Phase I ESA, one transformer was observed in the Maintenance Building and three pad-mounted transformers were observed outdoors adjacent to the building (Converse Consultants 2019). No leaking or

The former South Bay Hospital was developed by 1963 and the Beach Cities Advanced Imaging Building was developed by 1976, before regulations banned use of ACM, LBP, and PCBs in construction materials. Due to the age of the structures and their location in a coastal area the existing buildings may contain hazardous materials or mold.

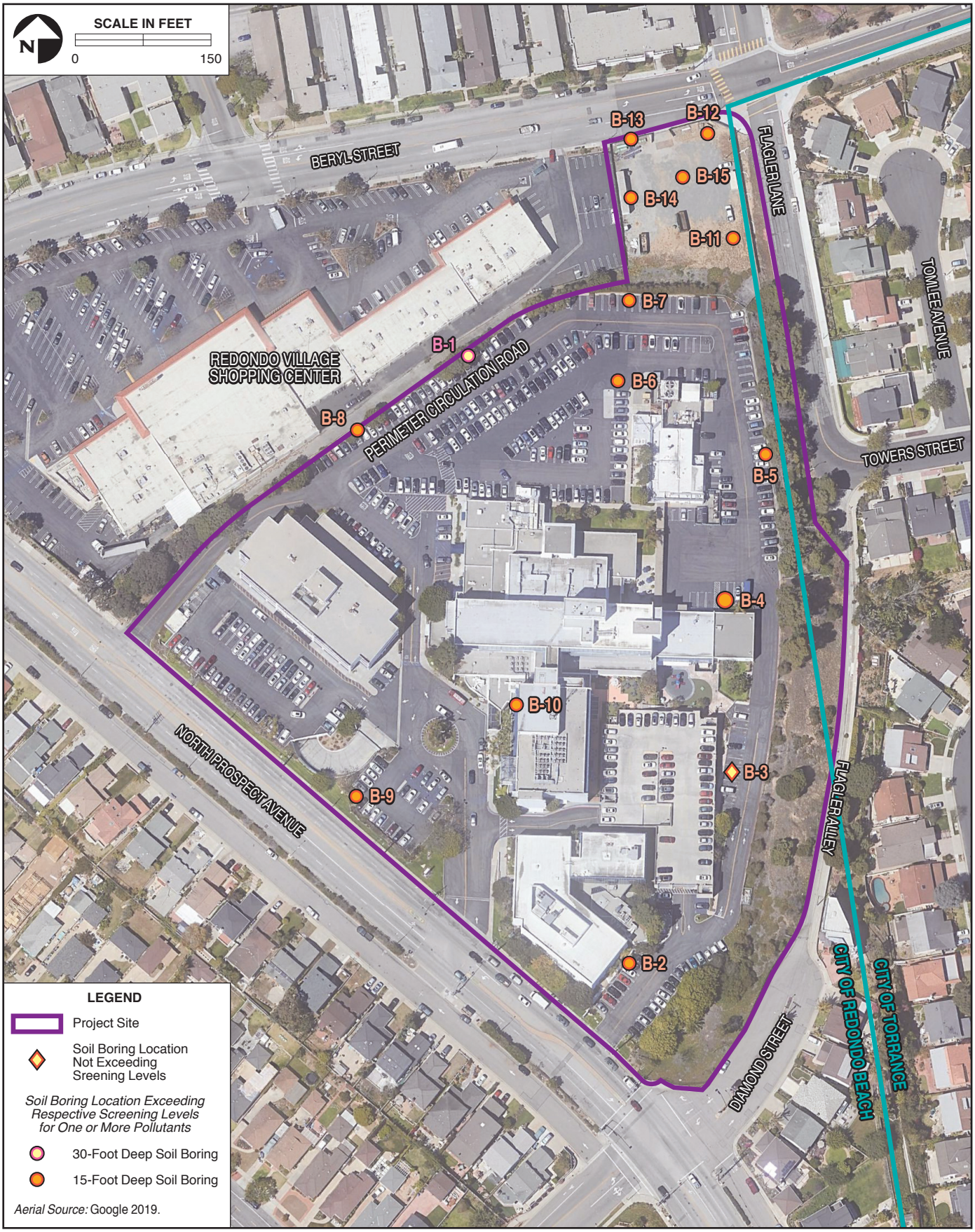
staining was observed (Converse Consultants 2019). Because the buildings currently located on the Project site were constructed prior to the 1960s, the florescent light ballasts may also contain PCBs. However, there was no evidence of leaks from the ballasts and therefore, the potential for hazards associated with PCBs at the BCHD campus is low (Converse Consultants 2019, 2020).

The Phase I ESA prepared for the proposed Project identified the potential for PCE contamination on the BCHD campus, due to former dry cleaner located at 1232 Beryl Street as well as the potential for soil contamination as a result of the previously abandoned and plugged oil and gas well located on the vacant Flagler Lot. These issues were investigated further in a Phase II ESA prepared by Converse Consultants in February 2020. The Phase II ESA included the collection of soil borings to test soil and soil vapor on the Project site. Based on the results of soil testing ambient air samples were also collected.

- **SCREENING LEVELS:** Phase II Environmental Screening Levels are comparative concentrations of chemicals in soil or soil-gas, which represent a threshold for human health concern. In a Phase II ESA, these numbers are tools to compare directly with the contaminant detection on site. The Phase II prepared for the Project site used RWQCB Environmental Screening Levels (August 2019), DTSC Human Health Risk Assessment Note 3 Screening Levels (April 2019), and/or USEPA Regional Screening Levels (November 2019), as appropriate.
- **RESIDENTIAL SCREENING LEVEL:** There is a higher anticipation of exposure to toxic vapors at residential properties. This is because occupants are normally present 168 hours a week. As a result, residential screening levels tend to be more conservative (i.e., have a lower threshold limit). During a Phase II ESA, if the existing development includes residential land-use, it is most appropriate to compare results to residential screening levels, and secondarily to commercial screening levels.
- **COMMERCIAL SCREENING LEVEL:** There is a lower anticipation of exposure to subsurface vapors at commercial properties. This is because occupants are normally present approximately 40 hours a week. Thus, commercial environmental screening levels generally have a higher threshold limit.

Soil Samples

During preparation of the Phase II ESA, a total of 15 soil borings were collected throughout the Project site, including 10 borings on the existing BCHD campus and 5 soil borings within the vacant Flagler Lot (see Figure 3.8-1). Of the 10 soil borings located on the existing BCHD campus, 9 were completed to a depth of 15 feet below ground surface (bgs). The other soil boring, which was located within the northern surface parking lot along the border with the Redondo Village Shopping Center, was completed to a depth of 30 feet bgs. This soil boring (i.e., B-1; see Figure 3.8-1) was completed to a greater depth in order to investigate the potential for the migration of potential PCE contamination from the former dry cleaner at 1232 Beryl Street. The 5 soil borings within the vacant Flagler Lot were completed to a depth of 15 feet bgs.



wood.

Soil Boring Sample Locations

FIGURE 3.8-1

- **Metals.** Ten metals were reported in the soil samples: barium, cadmium, chromium, cobalt, copper, lead, mercury, nickel, vanadium, and zinc. Each of these the metals were reported at concentrations less than their respective DTSC and USEPA residential screening levels (Converse Consultants 2020).
- **Total Petroleum Hydrocarbons.** Total Petroleum Hydrocarbons (TPH) in the heavy oil range was detected in two samples at boring locations within the vacant Flagler Lot (i.e., B-14 and B-15; refer to Figure 3.8-1) at concentrations of 20.9 and 123 milligrams per kilogram (mg/kg), respectively, which are well below the DTSC and USEPA residential screening level of 180,000 mg/kg. These concentrations are most likely related to the previously abandoned and plugged oil and gas well located at this site (Converse Consultants 2020). TPH in the gasoline and diesel ranges was not detected in any of the samples (Converse Consultants 2020).
- **Organochlorine Pesticides.** Concentrations of 4,4'-dichlorodiphenyldichloroethylene (DDE) and dichlorodiphenyltrichloroethane (DDT) were detected at concentrations of 254 and 30 micrograms per kilogram (µg/kg), respectively, near the entrance to the Beach Cities Health Center (i.e., B-10). These concentrations, which likely result from the historic agricultural use of the Project site, are well below their DTSC and USEPA residential screening levels of 2,000 mg/kg, and 1,900 µg/kg, respectively. No other organochlorine pesticides were identified in any of the samples analyzed.

Soil Vapor Samples

Soil vapor samples were also collected from the boreholes associated with each of the soil borings. The following 16 volatile organic compounds (VOCs) were detected in one or more of the soil vapor samples: benzene; PCE; chloroform; toluene; dichlorodifluoromethane; trichloroethylene (TCE); 1,1-dichloroethene; trichlorotrifluoromethane; ethylbenzene; 1,2,4-trimethylbenzene; 4-isopropyltoluene 1,3,5-trimethylbenzene; n-propylbenzene; m,p-xylene; styrene; and o-xylene. Of the 16 VOCs detected, 13 were detected at levels below their residential screening levels. Only three were reported at concentrations in excess of their respective residential screening levels: PCE, benzene, and chloroform.

- **PCE.** PCE was detected in 24 of the 30 samples at concentrations in excess of the RWQCB Environmental Screening Levels (August 2019) residential screening level. The former dry cleaner that operated at the Redondo Village Shopping Center is suspected to be the source of the PCE, because concentrations generally decrease to the south across the Project site with distance from the historical dry cleaner location. As previously described, PCE is a

liquid that has the potential to enter into groundwater and/or volatize and permeate building foundations. This is considered a potential risk to human health.

BCHD notified the Los Angeles County Fire Department (LACoFD) Health Hazardous Materials Division, which is the Certified Unified Program Agency (CUPA) for Redondo Beach, [1] as well as the Los Angeles Regional Water Quality Control Board (RWQCB). BCHD also notified the owners at 1232 Beryl Street, where the historical dry cleaner was located (BCHD 2020). BCHD is working with these entities (e.g., City of Redondo Beach and City of Torrance) to address the sampling results and identify the responsible party. As the CUPA for Redondo Beach, LaCoFD will be responsible for overseeing the required remediation activities by the responsible landowner. The responsible landowner will be required to determine the extent of the PCE contamination, develop a treatment plan, notify surrounding landowners, and implement the cleanup. The most common remediation method for PCE is vapor extraction, which involves drilling wells and installing carbon filtration systems. The PCE gets stuck on the carbon filter and clean air is discharged.

- **Benzene.** Benzene was detected in two of the 30 samples, in excess of the RWQCB Environmental Screening Levels (August 2019) residential screening levels, at a depth of up to 15 feet. Because these detections were taken from samples in the north-central portion of the Project site, the Shell gas station located at the adjoining property to the northwest does not appear to be the source. Leaks from vehicles in the surface parking lots on the existing BCHD campus are a potential source of benzene (Converse Consultants 2020).
- **Chloroform.** Chloroform was detected in four of the 30 samples, one of which exceeded the RWQCB Environmental Screening Levels (August 2019) residential screening levels and three of which exceeded the less conservative commercial screening levels. These four samples were taken in the southern portion of the Project site. Sources of the detected chloroform are unknown but potentially include leaky water pipes, because chloroform is a byproduct of the chlorination process used in most municipally supplied drinking water.

Methane was not detected in any of the probes at concentrations greater than the background concentration of 0.1 parts per million by volume (ppmv); therefore, neither the existing BCHD

[1] As described in Section 3.8.2, *Regulatory Setting* SB 1082 created the Unified Hazardous Waste and Hazardous Materials Management Regulatory Program (Unified Program), which requires the administrative consolidation of six hazardous waste and hazardous materials programs under the California Unified Program Administrator (CUPA). These programs include: Hazardous Materials Disclosure Program (Article 1 Chapter 6.95 Health & Safety Code [H&SC]); California Accidental Release Program (Article 2 Chapter 6.95 H&SC); Underground Storage Tank Program, (Chapter 6.7 H&SC); California Fire Code dealing with Hazardous Materials Management Plans; Hazardous Waste (Chapter 6.5 H&SC); and Tiered Permitting (Chapter 6.5 H&SC).

campus, nor the vacant Flagler Lot appear to be impacted as a result of being located in the Torrance Oil Field or adjacent to the former landfill at Dominguez Park (Converse Consultants 2020). Additionally, the Phase II ESA soil and soil vapor sampling found no evidence of impacts from the 10,000-gallon diesel fuel UST currently operating on-site or from the Shell gas station (Converse Consultants 2020).

Indoor Air Quality Samples

Based on the VOC concentrations in the soil vapor samples – particularly the PCE concentrations, which exceeded the RWQCB Environmental Screening Levels (August 2019) residential screening levels – five ambient air quality samples were collected to evaluate the potential vapor intrusion. Indoor air quality samples were collected at Beach Cities Health Center (514 North Prospect Avenue) and the attached Maintenance Building as well as Beach Cities Advanced Imagine Building (510 North Prospect Avenue) and Providence Little Company of Mary Medical Institute Building (520 North Prospect Avenue). Additionally, an outdoor ambient air quality sample was collected in close proximity to the Maintenance Building (Converse Consultants 2020).

- **PCE** was reported at a maximum concentration less than the residential screening level for indoor air. All reported concentrations of PCE in indoor air quality samples were generally consistent with the concentration reported in the outdoor ambient air quality sample. Therefore, the concentration of PCE detected in indoor air quality samples were determined to be related to background levels present in the ambient air rather than from concentrations in the subsurface that may have intruded through the building foundation (Converses Consultants 2020).
- **Benzene and Chloroform** were detected in excess of their residential screening levels for indoor air in all samples. However, all but one sample in the parking garage storage room were generally similar to the background concentrations reported in the outdoor air quality sample. The elevated concentrations of benzene and chloroform in the sample from the parking garage storage room are likely related to exhaust from vehicles or disinfection/cleaning products. The concentrations detected in all other indoor air quality samples are likely to be related to background levels present in the ambient air rather than from concentrations in the subsurface that may have intruded through the building foundation.

Excavation of Former Oil and Gas Well

This historic aerial image taken in 1960 depicts the hospital building (lower right corner) as well as the oil and gas well located on the vacant Flagler Lot.

In August 2020,ollowing the completion of the Phase II ESA soil and soil vapor sampling, Converse Consultants attempted to identify the location of the abandoned oil and gas well. Converse Consultants used aerial photographs to determine the approximate location of the well, but were unable to confirm the precise location in the field with an excavator. Terra-Petra Environmental Engineering (Terra-Petra) conducted a geophysical survey of the Project site in September 2020 using a magnotemeter for the purpose of locating the former oil and gas well on the property. A significant magnetic anomaly suspected to be the oil and gas well was identified approximately 30-feet east of the western fence boundary and approximately 30 feet north of the toe of the slope at the vacant Flagler Lot. Terra-Petra excavaed the well to physically locate it and completed a leak test, which was negative (i.e., no leaks were detected). Terra-Petra is preparing a summary report to be shared with CalGEM, the responsible oversight agency. The report shall summarize all of the activities completed to date including a copy of the geophysical survey, results of the leak test, and a map illustrating the location of the well based on the survey.

Terra-Petra will also initiate the Construction Site Plan Review process to be completed with CalGEM, which will conclude with the issuance of a Well Review letter describing CalGEM's recommendations. The Construction Site Plan Review shall include the following:

- A completed and signed Construction Site Plan Review application form;
- A completed supplemental real property form;
- An Assessors/Tract Map showing street names, lot dimensions and lot numbers for the property;
- Geophysical Survey Site plan showing well names and well locations with distance from proposed property structures and property lines. The plan will overlay any known oil well locations and/or metallic anomalies with oil well signatures as well as the proposed development;
- Table with basic well information: well name, lease, operator, etc.

Terra-Petra will also initiate permitting process with CalGEM to procure procuring all necessary permit forms and applications to successfully survey and decommission the former oil and gas well.

3.8.2 Regulatory Setting

Several Federal, State, and local regulations limit the risk of upset during the use, transport, handling, storage, and disposal of hazardous materials. The agencies responsible for enforcing these regulations have developed standards for the handling and cleanup of specific materials, which are determined to pose a risk to human health or the environment. The Federal enforcement agency is the USEPA. Enforcement agencies at the State level include two branches of the California Environmental Protection Agency (CalEPA): DTSC and SWRCB. In addition, CalEPA administers the "Unified Program," which helps businesses comply with administrative requirements, permits, inspections and enforcement activities required by environmental and emergency management programs. The Unified Program is enforced, at the local level, by the CUPA. The CUPA is responsible for protecting the public and environment by overseeing uniform fire code plans, hazardous waste, underground storage tanks, above-ground tanks, hazardous materials, community right-to-know, and accidental release prevention programs. The CUPA for the Redondo Beach and Torrance is the LACoFD Health Hazardous Materials Division with the RBFD authorized as a participating agency for Redondo Beach.

Federal Regulations

Federal agencies that regulate hazardous materials include the USEPA, U.S. Department of Labor Occupational Safety and Health Administration (OSHA), and the U.S. Department of Transportation (DOT). Applicable Federal regulations are contained primarily in Titles 10, 29, 40, and 49 of the Code of Federal Regulations (CFR). In particular, Title 49 of the CFR governs the transport of hazardous materials, and Title 42 of the CFR, Chapter 82 governs solid waste disposal and resource recovery. Some of the major Federal laws include the following:

- Resource Conservation and Recovery Act of 1976 (RCRA);
- Emergency Prevention and Community Right to Know Act of 1986 (EPCRA);
- Toxic Substances Control Act of 1976 (TSCA);
- Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (CERCLA);
- Clean Water Act of 1977 (CWA);

- Clean Air Act of 1963 (CAA);
- Asbestos Hazard Emergency Response Act of 1986 (AHERA);
- Hazardous Materials Transportation Action of 1975;
- Federal Insecticide, Fungicide, and Rodenticide Act of 1947;
- National Emission Standard for Hazardous Air Pollutants (NESHAP) - 40 CFR 61 Subpart M;
- Process Safety Management of Highly Hazardous Chemicals (29 CFR §1910.119) and Hazardous Waste Operations and Emergency Response (29 CFR §1910.120); and
- Residential Lead-Based Paint Hazard Reduction Act (1992), also known as Title X.

State Regulations

Primary State agencies with jurisdiction over hazardous materials management – including spill responses and remediation – include DTSC and the SWRCB. Other State agencies involved in hazardous materials management are the California Department of Industrial Relations Occupational Health and Safety Administration (CalOSHA), California Office of Emergency Services (CalOES) – California Accidental Release Prevention implementation, California Department of Fish and Wildlife (CDFW), California Air Resources Board (CARB), California Department of Transportation (Caltrans), California Office of Environmental Health Hazard Assessment (OEHHA) – Proposition 65 Implementation, the California Department of Health Services (DHS), and the California Integrated Waste Management Board (CIWMB). The enforcement agencies for hazardous materials transportation regulations are the California Highway Patrol (CHP) and Caltrans. Hazardous materials waste transporters are responsible for complying with all applicable packaging, labeling, and shipping regulations.

Hazardous chemical and biohazardous materials management laws in California include the following statutes:

- Hazardous Waste Control Act;
- Medical Waste Management Act;
- Hazardous Materials Release Response Plans and Inventory Act;
- Safe Drinking Water and Toxic Enforcement Act of 1986 (Proposition 65);
- Hazardous Substances Act;
- Hazardous Waste Management Planning and Facility Siting (Tanner Act);
- Porter Cologne Water Quality Control Act;

- Title 23 of the California Code of Regulations (CCR) Division 6, Chapter 16: Underground Storage Tank Regulations;
- Title 22 of the CCR: Hazardous Waste;
- Title 8 of the CCR, Section 1529: Asbestos;
- California Public Resources Code (PRC) – Article 4.2 Hazardous Wells Section 3255; and
- SCAQMD Rule 1403 – Asbestos Emissions from Demolition/Renovation Activities.

Government Code Section 65962.5 – DTSC EnviroStor Database (Cortese List)

The DTSC maintains a database that contains information on properties in California where hazardous substances have been released, or where the potential for a release exists. This database is known as EnviroStor (formerly CalSites) and is one of a number of databases that comprise the Cortese List and Spills, Leaks, Investigations, and Cleanups (SLIC) List. The EnviroStor Database provides a brief history of cleanup activities, contaminants of concern, and scheduled future cleanup activities. The EnviroStor Database also includes properties that have been remediated and certified by DTSC.

California Public Resource Code Section 3255

PRC Section 3255 designates authority to CalGEM (formerly DOGGR) to require the inspection, abandonment, re-abandonment, drilling, re-drilling, and production for the purpose of remedying, mitigating, minimizing, or eliminating danger to life, health, and natural resources, the decommissioning of hazardous or deserted facilities, or any other remedy or oilfield operation of on any property in the vicinity of which, or on which, is located any well or facility that the supervisor determines to be a hazardous well, an idle-deserted well, a hazardous facility, or a deserted facility.

California Code of Regulations– Asbestos and Lead

The CCR regulate potential asbestos exposure in construction when construction, alteration, repair, maintenance, renovation or demolition of structures, substrates, or portions thereof contain asbestos (8 CCR Section 1529 [a][1][C]). Additionally, in California, materials containing greater than 0.1 percent asbestos by weight are regulated as ACM.

The Title 17 of the CCR, Division 1, and Chapter 8 pertains to all public and residential buildings in California. Pursuant to Title 17 and USEPA regulations, LBP is defined as paint or other surface

coatings containing an amount of lead equal to or greater than 1 milligram per square centimeter (mg/cm^2) or more than 0.5 percent (5,000 parts per million [ppm]) by weight. Title 17 also defines a lead hazard as deteriorated LBP, disturbance of LBP or presumed LBP without containment, or any other nuisances which may result in persistent or quantifiable lead exposure. Additionally, worker exposure to materials containing lead during construction work is regulated by 8 CCR Section 1532.1(a). These regulations require worker protection during construction *"where lead or materials containing lead are present."*

Regional Policies and Regulations

South Coast Air Quality Management District (SCAQMD)

The SCAQMD regulates asbestos through Rule 1403, Asbestos Emissions from Renovation/Demolition Activities. Rule 1403 defines asbestos as a toxic material and controls the emissions of asbestos from demolition and renovation activities by specifying agency notifications, appropriate removal procedures, and handling/cleanup procedures. Rule 1403 applies to owners and operators involved in the demolition or renovation of asbestos-containing structures, asbestos storage facilities, and waste disposal sites.

The SCAQMD also regulates VOC emissions from contaminated soil through Rule 1166, Volatile Organic Compound Emissions from Decontamination of Soil. Rule 1166 sets requirements to control the emission of VOCs from excavating, grading, handling, and treating soil contaminated with volatile organic compounds as a result of leakage from storage or transfer operations, accidental spillage, or other deposition, including hydrocarbons.

Los Angeles County Integrated Waste Management Plan and Hazardous Waste Management Plan

The Los Angeles County Department of Public Works (DPW), Environmental Programs Division (EPD), prepares and administers the Los Angeles County Integrated Waste Management Plan and Hazardous Waste Management Plan, which provide direction for proper management of all waste generated within the County. As the County's Lead Agency, it advises the Los Angeles County Board of Supervisors regarding all waste management issues. EPD implements numerous programs to meet State-mandated solid waste reduction goals, including recycling, composting, source-reduction, household hazardous waste management, and public education programs. These programs regulate USTs in the County's unincorporated areas and 77 cities, including Redondo Beach, to protect groundwater resources.

City of Redondo Beach Local Policies and Regulations

The primary local agency, known as the CUPA, with responsibility for implementing Federal and State laws and regulations pertaining to hazardous materials management is LACoFD Health Hazardous Materials Division with RBFD authorized as a participating agency. LACoFD Health Hazardous Materials Division and RBFD work together to implement the Redondo Beach Local Hazard Mitigation Plan that addresses the City's planned response to emergencies. The CUPA is certified by CalEPA to implement the six State environmental programs within the local agency's jurisdiction. This program was established under the amendments to the California Health and Safety Code made by Senate Bill (SB) 1082 in 1994. The six consolidated programs are as follows:

- Hazardous Materials Reporting and Response Planning;
- Uniform Fire Code Business Plan;
- Hazardous Waste Generation and On-site Treatment;
- Accidental Release Prevention;
- Aboveground Storage Tank; and
- Underground Storage Tank.

As the designated CUPA for the City, LACoFD Health Hazardous Materials Division maintains the records regarding location and status of hazardous materials sites in the City and administers programs that regulate and enforce the transport, use, storage, manufacturing, and remediation of hazardous materials.

Redondo Beach General Plan Environmental Hazards/Natural Hazards Element

The Redondo Beach Environmental Hazards/Natural Hazards Element of the General Plan (1993) contains several policies regarding fire hazards and emergency management. Specifically, it contains safety goals and objectives that create a framework for implementation policies, which relate to the Redondo Beach Local Hazard Mitigation Plan. The objectives that are applicable to the proposed Project and hazardous materials are listed below:

> Objective 11.1: Promote and assist in the oversight of the proper operation and upkeep of local hazardous waste facilities, as well as the safe management, handling, and transportation of toxic and hazardous materials through the enforcement of applicable state and local regulations.

City of Torrance Beach Local Policies and Regulations

Torrance General Plan Safety Element

The Torrance General Plan Safety Element (2010) sets forth policies designed to minimize threats from natural and human-caused hazards. By implementing the Safety Element, the City of Torrance can deliver timely emergency service delivery and focus on the expansion of such services throughout the City. The objectives that are applicable to the proposed Project and hazardous materials are listed below:

Objective S.3: To protect the community from hazards associated with the production, transmission, and processing of petroleum products.

Policy S.3.1 Take appropriate measures to protect citizens from the hazards of oil and gas recovery, production, and transmission.

Policy S.3.2 Require that oil well abandonment and construction near abandoned oil wells comply with the most current local, State, and Federal abandonment standards.

Policy S.3.3 Require all secondary recovery projects to comply with all applicable regulations regarding health, safety, and aesthetics as a condition of approval.

Policy S.3.4 Maintain comprehensive regulations in the Municipal Code that address all aspects of oil and gas recovery, production, and transmission activities.

Policy S.3.5 Ensure the compatibility of land uses near new and future oil recovery activities.

Objective S.4: To reduce the risk associated with the use, storage, transport, or disposal of hazardous waste.

Policy S.4.1 Adopt and strictly enforce the most current regulations governing hazardous waste management.

Policy S.4.2 Minimize exposure of critical facilities and residences to hazardous materials.

Policy S.4.3 Avoid locating new residential development adjacent to or near potentially hazardous industrial activities.

City of Torrance 2017-2022 Local Hazard Mitigation Plan (2017)

The City developed the 2017-2022 Local Hazard Mitigation Plan to Potential to prevent against, prepare for, respond to and recover from both natural and man-made emergencies and disasters. The Hazard Mitigation Plan was designed be consistent with Federal Emergency Management Agency (FEMA) requirements.

Following approval of the plan by FEMA, the City of Torrance adopted the Local Hazard Mitigation Plan in October 2017, by resolution of the City Council. The plan identifies and describes the hazards that threaten Torrance, and how these hazards were selected and prioritized. For each hazard, the plan discusses hazard history, the risk of future hazards, potential impacts of climate change on the hazard, and the vulnerability of the community to the hazard. The Local Hazard Mitigation Plan also provides the mitigation measures to reduce potential risks from hazards, identifies evacuation routes, and provides an overview of the City's existing capabilities to improve resiliency to hazard events.

3.8.3 Impact Assessment and Methodology

Thresholds for Determining Significance

The following thresholds of significance are based on Appendix G of the 2020 California Environmental Quality Act (CEQA) Guidelines. For purposes of this EIR, implementation of the proposed Project may have a significant adverse impact from hazards or hazardous materials if it would do any of the following:

a) The project would create a significant hazard to the public or the environment through the temporary or routine transport, use, or disposal of hazardous materials.

b) The project would 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) The project would emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within a 0.25-mile radius of an existing or proposed school.

d) The project would be located on a site which is included on a list of hazardous materials sites compiled pursuant of Government Code Section 65962.5 and, as a result, would 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, the project would result in a safety hazard or excessive noise for people residing or working in the project area.

f) The project would impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan.

g) The project would expose people or structures, either directly or indirectly to a significant risk of loss, injury or death involving wildland fires.

Screened-Out Threshold(s):

Threshold (e) (*Public Airport*): The Project site is located approximately 5.75 miles to the south of Los Angeles International Airport (LAX) and is not located within an Airport Land Use Plan. Accordingly, the proposed Project would not result in a safety hazard for people residing in, working in, or visiting the BCHD campus. Therefore, for the reasons stated above and as discussed in Section IX, *Hazards and Hazardous Materials* of the Initial Study (IS), this issue will not be analyzed further in this EIR.

Threshold (g) (*Wildfire*): The Project site is located in a highly urbanized area, surrounded by residential and commercial development. The Project site is located approximately 3.3 miles north of the nearest designated Very High Fire Hazard Severity Zone. As described further in Section 4.0, *Other CEQA* within the *Wildfire* discussion, redevelopment of the existing BCHD campus would not exacerbate wildfire risks or otherwise increase public exposure to wildfires. Therefore, for the reasons stated above and as discussed in Section IX, *Hazards and Hazardous Materials* of the IS, this issue will not be analyzed further in this EIR.

Methodology

As previously described, this analysis is based on a Phase I ESA (2019) and a Phase II ESA (2020) prepared by Converse Consultants (see Appendix G). The Phase I ESA included an environmental

regulatory database search as well as visual inspection of the Project site and the surrounding vicinity. The Phase II ESA included the collection of soil borings to test for soil and soil vapor on the Project site. Based on the results of the soil testing, ambient air samples were also collected during the Phase II ESA.

3.8.4 Project Impacts and Mitigation Measures

Impact Description (HAZ-1)

a) The project would create a significant hazard to the public or the environment through the temporary or routine transport, use, or disposal of hazardous materials.

HAZ-1 The proposed Project – including the Phase 1 preliminary site development plan and the more general Phase 2 development program – would not create a hazard to the environment or public health through the temporary or routine transport, use, or disposal of hazardous materials. Compliance with Federal, State, and local regulations would ensure that any such impact would be *less than significant*.

Construction

As described in Section 2.0, *Project Description*, the proposed Project involves two phases of development that would demolish and replace the Beach Cities Health Center with new, purpose-built facilities on the existing BCHD campus and the vacant Flagler Lot. Construction activities during each phase of development would require transportation, use, storage, and disposal of small quantities of commercially available hazardous materials, including vehicle fuels, oils, transmission fluids, and hydraulic fuels. However, the use of such materials would be in limited quantities (i.e., not commercially reportable) and would be handled in compliance with Federal, State, and local regulations pertaining to their transport, use, or disposal (e.g., Los Angeles County Integrated Waste Management Plan and Hazardous Waste Management Plan as well as the applicable hazardous materials programs administered by LACoFD; refer to Section 3.8.2, *Regulatory Setting*). As such, the potential for hazardous materials release associated with the transport, use, or disposal would be limited to the accidental spill of chemicals, petroleum, oils, and lubricants within the on-site construction staging areas or along the proposed haul routes. (Potential hazards associated with the disturbance of contaminated soils at the Project site are discussed in Impact HAZ-2.)

The primary construction staging areas for equipment and materials would be the vacant Flagler Lot and the existing north surface parking lot, and a temporary unpaved road may be constructed between the two staging areas. However, the staging areas would likely move between construction phases depending on the available area. As described in Section 2.5.1.6, *Construction Activities* the development application(s) for the proposed Project would include a comprehensive Construction Management Plan, to be submitted for review and approval by the Redondo Beach and Torrance Building & Safety Divisions prior to the issuance of demolition, grading, or building permits. In addition to further defining the construction staging agencies the Construction Management Plan would also provide a detailed description of requirements for storage of hazardous materials, construction fueling areas, and spill kits and secondary containment consistent with all applicable Federal, State, and local regulations.

The transport of large quantities of hazardous materials to the Project site, if any, would be subject to applicable Federal, State, and local regulations intended reduce the risk of accidental spills, leaks, fire, or other hazardous conditions. The DOT, Office of Hazardous Materials Safety prescribes strict regulations for the safe transportation of hazardous materials, as enforced by the CHP and Caltrans (refer to Section 3.8.2, *Regulatory Setting*). Compliance with applicable regulations as well as oversight by the appropriate Federal, State, and local agencies would minimize the risk of hazardous materials exposure during transport. Therefore, the proposed Project would result in a *less than significant* impact with regard to the transport of hazardous materials.

Operation

Operation of the proposed Project would include limited use and storage of hazardous materials including chemicals such as cleaners, paints, solvents, chlorinated products, vehicle fuels, etc. However, similar to existing conditions, the use of these chemicals of the Project site would be in limited quantities (i.e., not commercially reportable quantities).

The proposed Residential Care for the Elderly (RCFE) Building constructed during Phase 1 would also be a small quantity generator of medical waste (e.g., used syringes, biohazards, etc.), similar to the existing memory care and outpatient medical uses on the BCHD campus. Medical wastes generated on-site would continue to be disposed of in special containers located in a secure area of the facility and would be collected regularly. All hazardous materials used on-site would be subject to all appropriate regulation and documentation for the handling, use, and disposal of such materials consistent with all appropriate Federal, State, and local regulations. The proposed Project

would be subject to all of the requirements set forth in Chapter 4 (Small Quantity Generator Requirements) of the H&SC Medical Waste Management Act. Adherence to medical waste regulations for small quantity generators would ensure that impacts related to the storage, transport, and disposal of medical waste would be *less than significant*.

Impact Description (HAZ-2)

b) The project would 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.

HAZ-2 The proposed Project – including the Phase 1 preliminary site development plan as well as the more general Phase 2 development program – could create a hazard to the environment or public health through reasonably foreseeable upset and accident conditions involving the disturbance of hazardous materials during demolition as well as excavation, trenching, and grading. Impacts would be *less than significant with mitigation.*

Hazardous Building Materials

As previously described, the Beach Cities Health Center was originally developed as the South Bay Hospital in 1958. Additionally, the Beach Cities Advanced Imaging Building and the existing parking structure located at 512 North Prospect Avenue were constructed in 1989. Physical sampling of ACM and LBP at these buildings was not included in the scope of the Phase I or Phase II ESA. However, due to the age of the existing buildings on-site it is assumed that ACM and LBP are present in the Beach Cities Health Center and the associated Maintenance Building (Converse Consultants 2019, 2020). Similarly, ACM and LBP may be present within the Beach Cities Advanced Imaging Building and the existing parking structure. During the visual site inspection associated with the Phase I ESA, one transformer was observed in the Maintenance Building and three pad-mounted transformers were observed outdoors adjacent to the building. As such, construction workers, campus residents (e.g., Memory Care and Assisted Living residents), employees, and visitors, and other members of the public could be exposed to these hazardous materials during demolition of the existing buildings and hauling of demolition debris from Project site.

A comprehensive survey of ACM, LBP, and PCBs would be conducted by a licensed California Asbestos Consultant prior to and during the demolition activities as required by MM HAZ-1. If

ACM is detected during the survey, mandatory compliance with SCAQMD Rule 1403 would require abatement by a licensed California Asbestos Consultant prior to demolition. Asbestos abatement generally includes sealing off an area with plastic and filtering the affected air to ensure that no asbestos fibers are let out into the surrounding environment. Similarly, Title 8 of the CCR, Industrial Relations, would require the abatement of LBP prior to demolition. (LBP abatement procedures are similar to those described for asbestos abatement.) PCBs located in the transformers at the Project site would be disposed of in accordance with USEPA Region 9's PCB Program. These transformers would be replaced with PCB-free equipment in the Southern California Edison (SCE) Substation Yard and generator yard, which would be located along the eastern perimeter of the Project site, immediately east of the pedestrian promenade (refer to Figure 2-5 and Figure 2-7).

Mold could also potentially occur within the Beach Cities Health Center and the attached Maintenance Building as well as the Beach Cities Advanced Imaging Building and the parking structure located at 512 North Prospect Avenue. Mold growth within the interior or other inaccessible areas of buildings may be released during demolition activities and result in exposure of construction workers, campus residents, employees, and visitors as well as other members of the public. As with ACM and LBP, the Phase I and Phase II ESAs did not conduct physical sampling of mold, so it cannot be conclusively determined whether active mold growth is present within the existing structures at the BCHD campus (Converse Consultants 2019, 2020). In addition to testing for ACM and LBP, MM HAZ-1 would require also physical sampling for mold prior to and during demolition activities. If mold is encountered, the construction contractor would follow standard best management practices (BMPs) to remove the affected building using safe and appropriate methods to minimize potential exposure to high concentrations of spores. Some situations would require extra precautions – similar to those used for handling ACM or LBP (i.e., temporary plastic enclosures and air filtering) – to limit the distribution of airborne mold spores.

If not properly abated, the accidental release of ACM, LBP, PCBs, and/or mold could pose a hazard to the environment and public health. However, implementation of MM HAZ-1 and compliance with existing mandatory regulations and abatement procedures for the treatment, handling, and disposal of ACM, LBP, PCBs and mold, would ensure that impacts associated with the proposed Project would be *less than significant with mitigation*.

Soil Contamination

Construction of the proposed Project would involve the excavation of substantial amounts of soil and additional earthwork associated with trenching and grading. As described in Section 2.5.1.6, *Construction Activities*, Phase 1 would involve the excavation of approximately 20,000 cubic yards (cy) of soil, necessary to facilitate construction of the proposed subterranean service area and loading dock. Trenching would be required for utilities work, providing connections between the SCE Substation Yard and generator yard. Additional grading would be required to backfill the basement associated with the Beach Cities Health Center and to level the other areas of the Project site. Phase 2 would include the excavation of approximately 11,000 cy of soil, necessary to facilitate the construction of the basement levels of the proposed parking structure and other service areas. Additional trenching would be required for utility work and grading would be required for site preparation for the proposed building footprints and open space areas. Soil disturbance during excavation, trenching, and grading at the Project site would result in the disturbance of potentially contaminated soil.

Ground disturbing activities (e.g., excavation, trenching, and grading) during Phase 1 and Phase 2 would disturb PCE-contaminated soils, beginning with the excavation of the subterranean levels of the RCFE Building to a depth of 26 feet during Phase 1. Similarly, grading within the vacant Flagler Lot would also encounter PCE-contaminated soils. The soil samples on the vacant Flagler Lot (i.e., BC-14 and BC-15; refer to Figure 3.8-1) had the great concentrations of PCE on the Project site (Converse Consultants 2020; see Appendix G). During Phase 2 excavation for the subterranean levels of the proposed parking structure, service areas, and other trenching and grading activities during Phase 2 would encounter PCE-contaminated soils. Disturbance of benzene-contaminated soil could occur during Phase 1 with the removal of the existing northern surface parking lot and subsequent excavation and construction activities associated with the proposed RCFE Building. Disturbance of chloroform concentrations could occur during Phase 2 when demolition of the existing parking structure and potentially the Beach Cities Advanced Imaging Building as well as subsequent excavations, grading, and construction activities.

The implementation of MM HAZ-2a through -2d would ensure VOC compounds and contaminated soils are properly detected, removed, and handled during ground disturbing activities. Therefore, the risk of an accidental release of hazardous materials into the environment during construction of the proposed Project would be *less than significant with mitigation*.

Abandoned Oil and Gas Well

As previously described, the Phase I ESA identified a previously abandoned and plugged oil and gas well located on the vacant Flagler Lot. The well was drilled in the 1930s and, according to production data, was in operation by Decalta International Corporation from July 1977 to October 1989. The well was no longer in production in November 1989 and is listed by CalGEM as *"abandoned and plugged"* (Converse Consultants 2019). TPH in the heavy oil range was detected in two samples at boring locations within the vacant Flagler Lot. These concentrations are most likely related to the abandoned oil and gas well located at this site (Converse Consultants 2020). (i.e., B-14 and B-15); however, they were well below the DTSC and USEPA residential screening level and do not represent a potential hazard to the environment or public health. Terra-Petra excavaed the well to physically locate it and completed a leak test, which was negative (i.e., no leaks were detected). Terra-Petra is preparing a summary report to be shared with CalGEM, the responsible oversight agency. Following testing of the well, BCHD would enroll into the CalGEM Well Review Program, which provides guidance, assistance, and recommendations for projects in the vicinity of oil and gas wells to avoid future liabilities.

The proposed Project has been designed to comply with all applicable CalGEM recommendations including avoiding construction of permanent structures in close proximity to a well. CalGEM defines *"close proximity"* as being within 10 feet from a well. To be considered outside of close proximity, two adjacent sides of a development (e.g., a building) should be no less than 10 feet from the well, with the third side the development no less than 50 feet from the well. The third side should be no less than 50 feet from the well to allow room for the 30 to 40 feet lengths of tubing required for re-abandonment operations. The fourth side shall remain open to the well to allow for rig access in the event that the well requires maintenance or potential re-abandonment. The proposed Project has been designed to meet these criteria by restricting development in this area on the vacant Flagler Lot to the one-way driveway and pick-up/drop-off zone rather than a habitable structure. Through enrollment in CalGEM's Well Review Program and compliance with CalGEM's advisory information to address significant and potentially dangerous issues associated with development near oil or gas wells, impacts to *less than significant with mitigation*.

Operation

As previously described in Section 3.8.1, *Environmental Setting,* BCHD has previously notified the LACoFD Health Hazardous Materials Division and the Los Angeles RWQCB of the recently

The vacant Flagler Lot, which includes a previously abandoned and plugged oil and gas well would be redeveloped as a one-way driveway and pick-up/drop-off zone during Phase 1 of the proposed Project.

discovered PCE contamination and is working with these the agencies and other public entities (i.e., City of Redondo Beach and City of Torrance) to address the sampling results and identify the responsible party. The indoor air quality sampling conducted during the Phase II ESA determined that the existing buildings on the BCHD campus have not experienced vapor intrusion. The foundations of all newly proposed structures – including the RCFE Building as well as the buildings constructed as a part of the Phase 2 development program – would be constructed over a gravel layer which would be topped by a thick (40 to 100 millimeter) vapor-intrusion barrier system to prevent subsurface contaminated vapors from entering an overlying structure. Additionally, the foundations would be designed with subgrade piping to convey volatized PCE through carbon filters before outgassing the vapor at a controlled rate. Because PCE is generally only hazardous when encountered in a confined space where it can exceed the CAA limits and OSHA exposure limits (Centers for Disease Control and Prevention [CDC] 2020; Agency for Toxic Substances and Disease Registry [ATSDR] 2019), outgassing vapor to the ambient air would not create a hazardous impact to the surrounding environment. Therefore, with the implementation of this standard construction technique for addressing vapor intrusion, operational impacts associated with PCE and would be *less than significant*.

Mitigation Measures (MMs)

MM HAZ-1 ***Asbestos-Containing Material (ACM), Lead-Based Paint (LBP), polychlorinated biphenyls (PCBs), and Mold Surveys.*** *Prior to the issuance of a demolition permit by the Redondo Beach Building & Safety Division, Beach Cities Health District (BCHD) shall retain a licensed contractor to conduct a comprehensive survey of ACM, LBP, PCBs, and mold, including invasive physical testing within the buildings proposed for demolition including the Beach Cities Health Center during Phase 1 as well as the existing parking structure and potentially the Beach Cities Advanced Imaging Building during Phase 2. If such hazardous materials are found to be present, BCHD the licensed contractor shall follow all applicable Federal,*

State, and local codes and regulations (e.g., Rule 1403, Asbestos Emissions from Renovation/Demolition Activities), as well as applicable best management practices (BMPs), related to the treatment, handling, and disposal of ACM, LBP, PCBs, and molds to ensure public safety. This generally includes sealing off an area with plastic and filtering air to ensure that hazardous building materials are let out into the surrounding environment. During construction the licensed contractor shall conduct additional surveys as new areas (e.g., interior portions) of the buildings become exposed.

MM HAZ-2a ***Soils Management Plan:*** *Prior to approval of issuance of demolition, grading, or building permit by the Redondo Beach Building & Safety Division and/or approval of a grading plan by the City of Redondo Beach Building & Safety Division and the City of Torrance Building & Safety Division, Beach Cities Health District (BCHD) shall prepare and submit a Soils Management Plan and a Transportation Plan to the Los Angeles County Fire Department (LACoFD) Health Hazardous Materials Division and Los Angeles Regional Water Quality Control Board (RWQCB) as well as the City of Redondo Beach and City of Torrance, for review. The Soils Management Plan and Transportation Plan shall include, but shall not be limited to the following:*

<u>Soils Management Plan</u>

Affected soils shall be either directly loaded into awaiting trucks for immediate off-site disposal or temporarily stockpiled on plastic sheeting prior to load-out and off-site disposal. If temporarily stockpiled, soil removed from the excavations shall be placed next to or as close as possible to the excavation from which it came.

Prior to load-out, the construction contractor shall prepare waste profiles and example waste manifests for approval by the receiving facilities. Soil and material segregation, stockpile handling, truck loading, and storm water management practices shall be followed during the remedial action according to the following:

<u>Soil and Material Segregation</u>

Overburden soils shall be screened with an Organic Vapor Analyzer (OVA) in accordance with South Coast Air Quality Management District (SCAQMD) Rule

1166. Any significant quantities of construction debris encountered during excavation shall be segregated and disposed of in accordance with Federal, State, and local regulations. Soil cuttings during the excavation and installation of soldier piles shall be disposed of off-site with any affected soils from the deep excavation.

Stockpile Management

The stockpiled soils for load-out shall be segregated by waste classification:

- *Non-hazardous waste.*
- *Volatile organic compound (VOC)-contaminated non-hazardous waste with OVA readings greater than 50 parts per million (ppm) but less than 1,000 ppm.*
- *VOC-contaminated non-hazardous waste with OVA readings of 1,000 ppm or greater. These soils shall be immediately sprayed with water or suppressant and placed in a sealed container (roll-off bin) or directly loaded into a suitable transport truck, moistened with water, and covered with a tarp for off-site transportation to the appropriate disposal facility, as specified in the SCAQMD Rule 1166 Mitigation Plan.*

The temporary stockpiles containing affected soils shall be managed as follows:

- *The temporary stockpiles for non-VOC contaminants shall be placed on plastic sheeting and kept moist during working hours and covered with plastic sheeting at the end of the day to control dust.*
- *The VOC-contaminated stockpiles shall be placed on plastic sheeting and immediately covered with plastic sheeting. The edges of the plastic shall have an overlap of at least 24 inches. The plastic shall be secured at the base of the stockpile and along the seams of overlapping plastic sheeting with sandbags or equivalent means. The stockpiles shall remain covered until load-out.*
- *Daily inspections of the stockpiles shall be conducted to verify the integrity of the stockpile covers. Any gaps, tears, or other deficiencies shall be corrected immediately. Daily records shall be kept of stockpile inspections and any repairs made.*
- *If necessary, commercial vapor suppressants and sealants shall be prepared and applied to VOC-contaminated soil in accordance with the manufacturer's recommendations.*

- *During stockpile generation and removal, only the working face of the stockpile shall be uncovered.*

Decontamination Methods and Procedures

Each piece of equipment used for the excavation of affected soils shall have a clean-out bucket or continuous edge across the cutting face of its bucket. No excavation of affected soil shall be permitted with equipment utilizing teeth across the cutting edge of its bucket.

Entry to the contaminated areas (i.e., work exclusion zones) shall be limited to avoid unnecessary exposure and related transfer of contaminants. In unavoidable circumstances, any equipment or truck(s) that come into direct contact with affected soil shall be decontaminated to prevent the on- and off-site distribution of contaminated soil. The decontamination shall be conducted within a designated area by brushing off equipment surfaces onto plastic sheeting. Trucks shall be visually inspected before leaving the site, and any dirt adhering to the exterior surfaces shall be brushed off and collected on plastic sheeting. The storage bins or beds of the trucks shall be inspected to ensure the loads are properly covered and secured. Excavation equipment surfaces shall also be brushed off prior to removing the equipment from contaminated areas.

Movement of affected soils from the excavation area to temporary stockpiles shall be conducted using enclosed transfer trucks, if possible. If affected soils must be moved within an open receptacle (e.g., loader bucket), the travel path for the loader shall be scraped following this activity, with scraped soils placed in the temporary stockpile for load-out.

Sampling equipment that comes into direct contact with potentially contaminated soil or water shall be decontaminated to assure the quality of samples collected and/or to avoid cross-contamination. Disposable sampling equipment intended for one-time use shall not be decontaminated, but shall be packaged for appropriate off-site disposal. Decontamination shall occur prior to and after each designated use of a piece of sampling equipment, using the following procedures:

- *Non-phosphate detergent and tap-water wash, using a brush if necessary.*

- *Tap-water rinse.*
- *Initial deionized/distilled water rinse.*
- *Final deionized/distilled water rinse.*

Truck Loading

Trucks may be loaded directly from the excavation or temporary stockpile based on truck availability and excavation logistics. Trucks shall be routed, and stockpile areas shall be located so as to avoid having trucks pass through impacted areas. The truckloads shall be wetted and tarped prior to exiting the site. All soil hauled from the site shall comply with the following:

- *Materials shall be transported to an approved treatment/disposal facility.*
- *No excavated material shall extend above the sides or rear of the truck/trailer.*
- *Trucks/trailers carrying affected soils shall be completely tarped/covered to prevent particulate emissions to the atmosphere. Prior to covering/tarping, the surface of the loaded soil shall be moistened.*
- *The exterior of the trucks/trailers shall be cleaned off prior to leaving the site to eliminate tracking of material off-site.*

Storm Water Management

General construction best management practices (BMPs) identified by the Los Angeles RWQCB shall be implemented during soil excavation activities to contain and control storm water runoff that might convey contaminated or excessive sediments. If rainfall is expected, the areas around open excavations shall be graded and bermed to prevent storm water from flowing into the excavation. Any standing water that collects in the bottom of the excavations shall be removed and handled in accordance with Federal, State, and local regulations. The water shall be sampled and analyzed either as standing water in the excavation or following containment in a temporary above-ground storage tank. Depending on the volume of water and the sampling results, options for handling the standing water could include:

- *Pumping the standing water into temporary aboveground storage tanks for reuse on-site for dust suppression.*
- *Pumping the standing water through filters and a carbon adsorption filter (if required based on analytical results) prior to discharge to a storm drain.*
- *Pumping the standing water into vacuum trucks for transport and disposal at a recycling facility.*

Transportation Plan

All affected soils shall be transported off-site for lawful management and disposal. Prior to load-out, the construction contractor shall prepare waste profiles for the receiving facility using analytical data from the previous environmental site assessment.

MM HAZ-2b ***Soil Vapor Monitoring.*** *During soil disturbance activities with the potential to disturb tetrachloroethylene (PCE)-contaminated soil, soil vapor monitoring shall be conducted by the construction contractor using a photoionization detector (PID) 10.6 or 11.7 eV lamp. Use of the PID shall ensure that the Occupational Safety and Health Administration (OSHA) exposure limits for PCE and other volatile organic compounds (VOCs) are maintained. In the event that the OSHA exposure limits are exceeded, work within the confined space would be temporarily stopped until the use of a Soil Vapor Extraction (SVE) vacuum blower reduces it to below this limit (see MM HAZ-2c)*

MM HAZ-2c ***Soil Vapor Extraction (SVE) Equipment.*** *Use of an SVE vacuum blower (e.g., regenerative blowers, rotary lobe blowers, rotary claw blowers, centrifugal fan blowers, etc.) shall be implemented during construction within confined spaces, as necessary, to maintain Occupational Safety and Health Administration (OSHA) exposure limits or trichloroethylene (PCE) and other volatile organic compounds (VOCs).*

MM HAZ-2d ***Discovery of Contamination.*** *In the event that previously unknown or unidentified soil and/or groundwater contamination that could present a threat to human health or the environment is encountered during construction at a development site, construction activities in the immediate vicinity of the contamination shall cease immediately. A qualified environmental specialist (e.g., a licensed Professional*

Geologist, a licensed Professional Engineer, or similarly qualified individual) shall conduct an investigation to identify and determine the level of soil and/or groundwater contamination. If contamination is encountered, a Human Health Risk Management Plan shall be prepared and implemented that: 1) identifies the contaminants of concern and the potential risk each contaminant would pose to human health and the environment during construction and post-development; and 2) describes measures to be taken to protect workers, and the public from exposure to potential site hazards. Such measures could include a range of options, including, but not limited to, physical site controls during construction, remediation, long-term monitoring, post-development maintenance or access limitations, or some combination thereof. Depending on the nature of contamination, if any, appropriate agencies shall be notified (e.g., Los Angeles County Fire Department [LACoFD] and Los Angeles Regional Water Quality Control Board [RWQCB]). If needed, a Site Health and Safety Plan that meets Occupational Safety and Health Administration (OSHA) requirements shall be prepared and in place prior to commencement of work in any contaminated area.

MM HAZ-3 **Well Review Program**. *Prior to demolition or ground-disturbing activities on the vacant Flagler Lot, Beach Cities Health District (BCHD) shall enroll in the California Geologic Energy Management Division's (CalGEM's) Well Review Program. Following enrollment in the Well Review Program CalGEM would:*

- *Identify/confirm the location of the previously abandoned and plugged oil and gas well on the property.*
- *Provide a review of the previously abandoned and plugged oil and gas well located on the Project site. The review process shall consist of determining the abandonment status of the well by examining past plugging operations, and then comparing the abandonment status with current abandonment standards.*
- *Provide an evaluation of all known wells located on the development site property. The evaluation process will consist of: 1) verifying that the previously abandoned and plugged oil and gas well has a competent surface plug; and 2) verifying the wells are not leaking any fluids or gas. BCHD shall be responsible for the removal of all metal plates attached to the top of casings of the well prior to the evaluation to prevent the buildup of methane gas underneath metal plates. Following evaluation, a metal identification plate shall be welded (without full bead) to the top of the well casing to allow any potential gas leakage to vent out of the casing and prevent pressure from*

building up in the wellhead. For identification purposes, the metal identification plate shall show the well's name and Assessor Parcel Identification number.

- *Ensure proper well restoration following evaluation. Proper well site restoration shall include the removal of all associated well equipment, junk, and debris and any well excavation needs to be filled with earth, compacted properly to prevent settling, and graded over. Pursuant to CCR Section 1776, well site restoration must be completed within 60 days following the evaluation of a well.*

- *Issue a Well Review Letter to BCHD and local permitting agencies (i.e., the City of Redondo Beach and the City of Torrance. The Well Review Letter will list the current status of all known wells located on the development site property, and it will provide other important information associated with development near oil or gas wells.*

BCHD shall adhere to all recommendations provided by CalGEM, which may include maintaining rig access to the well, avoiding building over or in close proximity to the well, and implementing surface mitigation measures are determined necessary by CalGEM. Surface mitigation measures may include installation of venting systems for wells, venting systems for parking lots, patios, and other hardscape, methane barriers for building foundations, methane detection systems, and collection cellars for well fluids by a licensed Professional Engineer. The permitting of surface mitigation measures shall fall under the authority of the City of Redondo Beach and the City of Torrance.

Residual Impacts

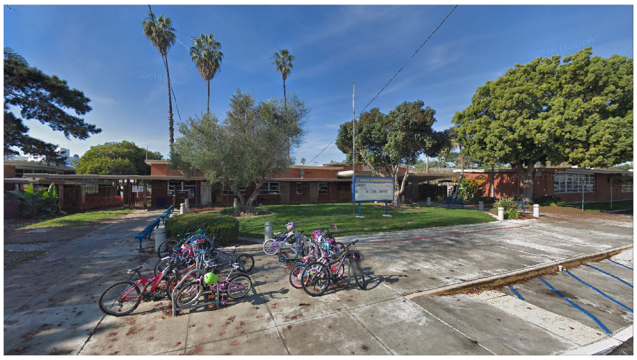
With implementation of standard regulatory measures, standard BMPs, MM HAZ-1, MM HAZ-2a through -2d, and MM HAZ-3, potential impacts related to reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment would be *less than significant*.

Impact Description (HAZ-3)

c) The project would emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within a 0.25-mile radius of an existing or proposed school.

HAZ-3 The proposed Project could emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within a 0.25-mile radius of an existing or proposed school. Compliance with Federal, State, and local regulations would ensure that any such impact would be *less than significant*.

As described in Section 2.2.1, *Project Location*, Towers Elementary School and Beryl Heights Elementary School are located within a 0.25-mile radius of the Project site. In particular, Towers Elementary School is located approximately 300 feet to the east of the existing BCHD campus. Based on a review of the Los Angeles Unified School District (LAUSD) website, no new schools are proposed within the vicinity of the BCHD campus.



Multiple schools are located in the vicinity of the Project site, the nearest of which is Towers Elementary School (pictured above), located approximately 300 feet east of the BCHD campus.

Construction

As described in Impact HAZ-1, each phase of construction would require transportation, use, storage, and disposal of small quantities of commercially available hazardous materials, including vehicle fuels, oils, transmission fluids, and hydraulic fuels. However, the use of such materials would likely be in limited quantities (i.e., not commercially reportable) and would be handled in compliance with Federal, State, and local regulations pertaining to their transport, use, or disposal (e.g., Los Angeles County Integrated Waste Management Plan and Hazardous Waste Management Plan as well as the hazardous materials programs administered by LACoFD; refer to Section 3.8.2, *Regulatory Setting*). As such, the potential for hazardous materials release associated with the transport, use, or disposal would be limited to the accidental spill of chemicals, petroleum, oils, and lubricants within the construction staging areas on the Project site or along the proposed haul routes (refer to Section 2.5.1.6, *Construction Activities*). As described in Section 2.5.1.6, *Construction Activities* the development application(s) for the proposed Project would include a comprehensive Construction Management Plan, to be submitted for review and approval by the Redondo Beach and Torrance Building & Safety Divisions prior to the issuance of demolition, grading, or building permits. In addition to further defining the construction staging agencies the Construction Management Plan would also provide a detailed description of requirements for

storage of hazardous materials, construction fueling as well as spill kits and secondary containment.

Compliance with applicable regulations as well as oversight by the appropriate Federal, State, and local agencies would minimize the risk of hazardous materials exposure during transport. Therefore, the proposed Project would result in a *less than significant* impact.

Operation

After construction is complete and the heavy equipment is removed from the Project site, the potential for hazardous spills would be similar to existing conditions at the Project site. As described in Impact HAZ-1, BCHD would continue to use, store, and dispose of hazardous materials, substances, and waste in accordance with applicable Federal, State, regional, and local policies and regulations. Therefore, operational impacts related to hazardous emissions and hazardous materials, substances, and waste within a 0.25-mile radius of a school would be *less than significant*.

Impact Description (HAZ-4)

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

HAZ-4 The proposed Project would not be located on a site which is included on a list of hazardous materials sites compiled pursuant of Government Code Section 65962.5, which could create a significant hazard to the public or the environment. Compliance with all applicable regulations and mitigation measures would reduce this impact to *less than significant with mitigation*.

The Project site is located in proximity to one hazardous waste site listed in the DTSC EnviroStor Database (i.e., Edison Pipeline and Terminal Company Redondo) located approximately 1 mile west of the Project site at 1100A Harbor Drive (Converse Consultants 2019, 2020; DTSC 2020; see Appendix G). However, this site is currently undergoing closure and, given the distance as well as the existing development separating the hazardous waste site from the Project site, implementation of the proposed Project would not upset the hazardous waste site or create a significant hazard to the public or environment (Converse Consultants 2020). The only DTSC-

listed cleanup site requiring further action and located within 1 mile of the Project site is the former Redondo Beach Police Department shooting range off-site property. However, given the distance hydraulic gradient in relation to the Project site, potentially occurring contaminants at this site are unlikely to affect the Project site (Converse Consultants 2020). The Shell gas station located at 1200 Beryl Street is listed as a LUST cleanup site due to gasoline contamination. However, the site has been designated as "completed-case closed."

Additionally, the former dry cleaner site located at 1232 Beryl Street is listed in the GeoTracker database as "open-inactive," which means no regulatory oversight activities are being conducted by the Lead Agency (SWRCB 2020b). However, as described in Impact HAZ-2, the Phase II ESA, which involved soil sampling and indoor air quality sampling, determined that the former dry cleaner is suspected to be the source of the detected PCE, as concentrations of PCE generally decrease to the south with distance from the cleaners' location (Converse Consultants 2020). BCHD notified the LACoFD Health Hazardous Materials Division and the Los Angeles RWQCB and will work with the agencies and other public entities to address these sampling results and identify the responsible party. Long-term clean-up of PCE by the responsible party will occur as a separate remediation project. Nevertheless, the implementation of MM HAZ-2a through -2d would ensure VOC compounds and contaminated soils are properly detected, removed, and handled during ground disturbing activities associated with the proposed Project.

While the Project site is included on several databases for its operation as a small quantity generator of hazardous waste, the BCHD campus is not included in the DTSC EnviroStor Database or on the SWRCB GeoTracker databases compiled pursuant to Government Code Section 65962.5. The vacant Flagler Lot is listed on the California Water Board's GeoTracker database due to a LUST cleanup site, with diesel being the contaminant of concern. However, the site is designated as "completed-case closed," which means a closure letter or other formal closure decision document has been issued for the site (SWRCB 2020a).

Residual Impacts

With implementation of MM-HAZ-2a through -2d, impacts to sites listed of hazardous materials sites complied pursuant to Government Code Section 65962.5, and as such, would not create a significant hazard to the public or the environment.

Impact Description (HAZ-5)

f) The project would impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan.

HAZ-5 The proposed Project would not physically interfere with an adopted emergency response plan or emergency evacuation plan. Therefore, impacts would be *less than significant.*

The Project site is located within the service area of the RBFD and Redondo Beach Police Department (RBPD) (see Section 3.13, *Public Services*). The proposed Project would be built in accordance with the applicable State and local building codes (refer to Section 3.6, *Geology and Soils*) as well as all appropriate fire codes. For example, RBFD would review the proposed Project using the Building Plan Fire Code Checklist.

State Route (SR-) 1 and SR-107, located approximately 0.5 miles west and 1.5 miles east of the Project site, respectively, are designated Primary Disaster Routes by the County of Los Angeles (County of Los Angeles Department of Public Works 2013). The proposed Project does not propose changes in, obstructions to, or reconfigurations of public evacuation routes. Therefore, the proposed Project would not result in physical interference or impairment to implementation of this existing emergency and evacuation plan.

Construction activities associated development during Phase 1 and Phase 2 of the proposed Project would add vehicles (e.g., construction deliveries, construction worker vehicles, etc.) to regional and local roads that could increase congestion. Construction trucks would access the site from one of the existing driveways along North Prospect Avenue. Haul trucks would exit the Interstate (I-) 405 freeway on 190th Street or Hawthorne Avenue to 190th Street and reach the site using Del Amo Street to North Prospect Avenue. Construction entry to the Project site would be provided along North Prospect Avenue where construction flaggers would be stationed to direct construction traffic and maintain public safety. Additionally, emergency services vehicle access points would be maintained at North Prospect Avenue and Beryl Street. Fire lanes would be maintained at all times during construction work. The RBFD and RBPD would also have access to the Project site 24 hours per day via fence-mounted lockboxes to open gates securing the Project site. As described further in Section 2.5.1.6, *Construction Activities*, all work would be subject to a Construction Traffic Control Plan to be approved by the Redondo Beach and Torrance Building & Safety Divisions (see MM T-1 in Section 3.14, *Transportation*). The Construction Traffic Control Plan

would identify designated haul routes and construction staging areas, traffic control procedures, emergency access provisions, construction crew parking, and avoidance of traffic impacts during construction. Therefore, impacts related to emergency access would be *less than significant* (see Section 3.14, *Transportation*).

Operation

As described in Section 2.5.1.3, *Proposed Access, Circulation, and Parking*, in the event of an emergency on the campus, the Project site could be accessed from the existing driveways along North Prospect Avenue, the proposed one-way driveway off of Beryl Street, and the proposed service vehicle entrance off of Flagler Lane. Similar to the existing perimeter road that borders the BCHD campus, the proposed pedestrian promenade would wrap around the campus and would provide emergency vehicle access. The pedestrian promenade would connect the existing southern and northern driveways and would provide direct access to the southern side of the RCFE Building. Secondary emergency access would be provided to the north of the RCFE Building using "grass-crete" (i.e., permeable pavers with space for grass to grow).

Prior to operation, BCHD would coordinate with the RBFD and RBPD to prepare an Emergency Plan for the campus. Additionally, BCHD would utilize training procedures and an operational handbook that provides processes and procedures for BCHD staff to provide the first responder services.

Therefore, implementation of the proposed Project would not impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan, and impacts would be *less than significant*. See also Section 3.13, *Public Services* for analysis of increased demand on emergency response services (e.g., fire and police protection).

Cumulative Impacts

Cumulative development within the Redondo Beach, Torrance, Hermosa Beach, and Manhattan Beach would have the potential to expose the surrounding public to hazards and hazardous materials through development or redevelopment of properties that may be contaminated from either historical or ongoing uses. Approved and pending projects in the vicinity (refer to Figure 3.0-1) are expected to transport, use, and store hazardous materials. However, the severity of potential hazards for individual projects would depend upon the location, type, and size of development and the specific hazards associated with individual sites. The majority of projects

located in close proximity to the Project site are small scale redevelopments (e.g., 1- to 2-unit additions to existing residential uses). Therefore, the potential for exposure to hazards and hazardous materials would be minimal. Additionally, large-scale cumulative projects, or cumulative projects that could affect a site listed in the DTSC EnviroStor Database (Cortese List) would be required to undergo individual environmental review, including review of potential impacts related to hazards and hazardous materials that are applicable to that particular development site and proposed use.

If ACM, LBP, PCBs, or mold are found to be present in buildings planned for demolition or renovation, or if soil and groundwater contamination are found to be present on sites of planned and future development, these conditions would require appropriate abatement and/or remediation consistent with all applicable Federal, State, and local regulations. Similarly, the transport of hazardous materials would be subject to applicable Federal, State, and local regulations intended reduce the risk of accidental spills, leaks, fire, or other hazardous conditions. With implementation of MM HAZ-1, HAZ-2a through -2d, and HAZ-3, potential impacts associated with hazards and hazardous materials would be reduced to less than significant. Therefore, the proposed Project *would not substantially contribute to cumulatively considerable impacts*.