

## 3.11 Hazardous Materials and Fire Hazards

This section provides a programmatic assessment of the impacts of the proposed Pacifica General Plan on hazardous materials exposure, vulnerability to wildfires, and access and effectiveness of evacuation routes. It includes a description of potential sources of hazardous materials and wastes and wildfire risk in Pacifica, as well as a summary of relevant regulations and a discussion of impacts and mitigation measures.

### Environmental Setting

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#### PHYSICAL SETTING

##### Overview of Contaminated Sites

Pacifica currently has 12 sites undergoing remediation for contamination with hazardous materials. Some contaminated sites are on vacant parcels or properties with the potential to redevelop. Contamination does not render these sites unusable, but may require time and funding for cleanup.

Releases, leaks, or disposal of chemical compounds, such as petroleum hydrocarbons, on or below the ground surface can lead to contamination of underlying soil and groundwater. Depending on the conditions and intensity of the release, groundwater contamination can migrate beyond the property boundary of the original release site. Disturbance of a previously contaminated area through grading or excavation operations could expose the public to health hazards from physical contact with contaminated materials or hazardous vapors. Improper handling or storage of contaminated soil and groundwater can further expose the public to these hazards, or potentially spread contamination through surface water runoff or air-borne dust. In addition, contaminated groundwater can spread downgradient, potentially contaminating subsurface areas of surrounding properties.

Areas where historic or ongoing activities have resulted in the known or suspected release of hazardous materials to soil and groundwater, and where current clean-up activities monitored by the State Water Quality Control Board or the California Department of Toxic Substances are ongoing, are listed in **Table 3.11-1** and shown in **Figure 3.11-1**.

**Table 3.11-I: Reported Hazardous Substance Sites By Cleanup Status**

Map ID	Site Name	Address	Site Type	Potential Contaminants	Cleanup Status
<b>Sites Identified by the California Department of Toxic Substances Control</b>					
1	Sharp Park Rifle Range	Rifle Range Rd.	Voluntary Cleanup	Lead	Active
<b>Sites Identified by the State Water Resources Board</b>					
1	Sharp Park Rifle Range	Rifle Range Rd.	Cleanup Program Site	Lead	Open – Site Assessment
2	One Hour Martinizing, Former	5556 Cabrillo Hwy.	Cleanup Program Site	Tetrachloroethylene (PCE)	Open – Site Assessment
3	BP #11203	700 Hickey Blvd.	LUST Cleanup Site	Waste Oil, Motor, Hydraulic, Lubricating	Open – Site Assessment
4	Lion Oil Station (Former)	500 Linda Mar Blvd.	LUST Cleanup Site	Gasoline	Open – Site Assessment
5	Sunset Garage	2251 Oceana Blvd.	LUST Cleanup Site	Gasoline	Open – Site Assessment
6	Tosco #5898 (Former Unocal)	765 Oddstad Blvd.	LUST Cleanup Site	Gasoline	Open – Site Assessment
7	Arco #0433 (Union 76 Station)	498 Palmetto Ave.	LUST Cleanup Site	Gasoline	Open – Remediation
8	Olympic Sharp Park	1518 Francisco Blvd.	LUST Cleanup Site	Gasoline	Open – Remediation
9	Pacifica Fire Station #2	1100 Linda Mar Blvd.	LUST Cleanup Site	Gasoline	Open – Verification Monitoring
10	Pacifica School District	375 Reina Del Mar Ave.	LUST Cleanup Site	Benzene, Diesel, Fuel oxygenates, Gasoline, Toluene, Xylene	Open – Verification Monitoring
11	Unocal #5529 (Former)	4460 Cabrillo Hwy.	LUST Cleanup Site	Gasoline	Open – Verification Monitoring
12	Vallemar Beacon	2095 Cabrillo Hwy.	LUST Cleanup Site	Gasoline	Open – Verification Monitoring

Sources: California Department of Toxic Substances Control; California Environmental Protection Agency; State Water Resources Control Board, 2012.

Figure 3.11-1:  
Hazardous Materials  
Sites: Cleaned Up or  
Under Remediation

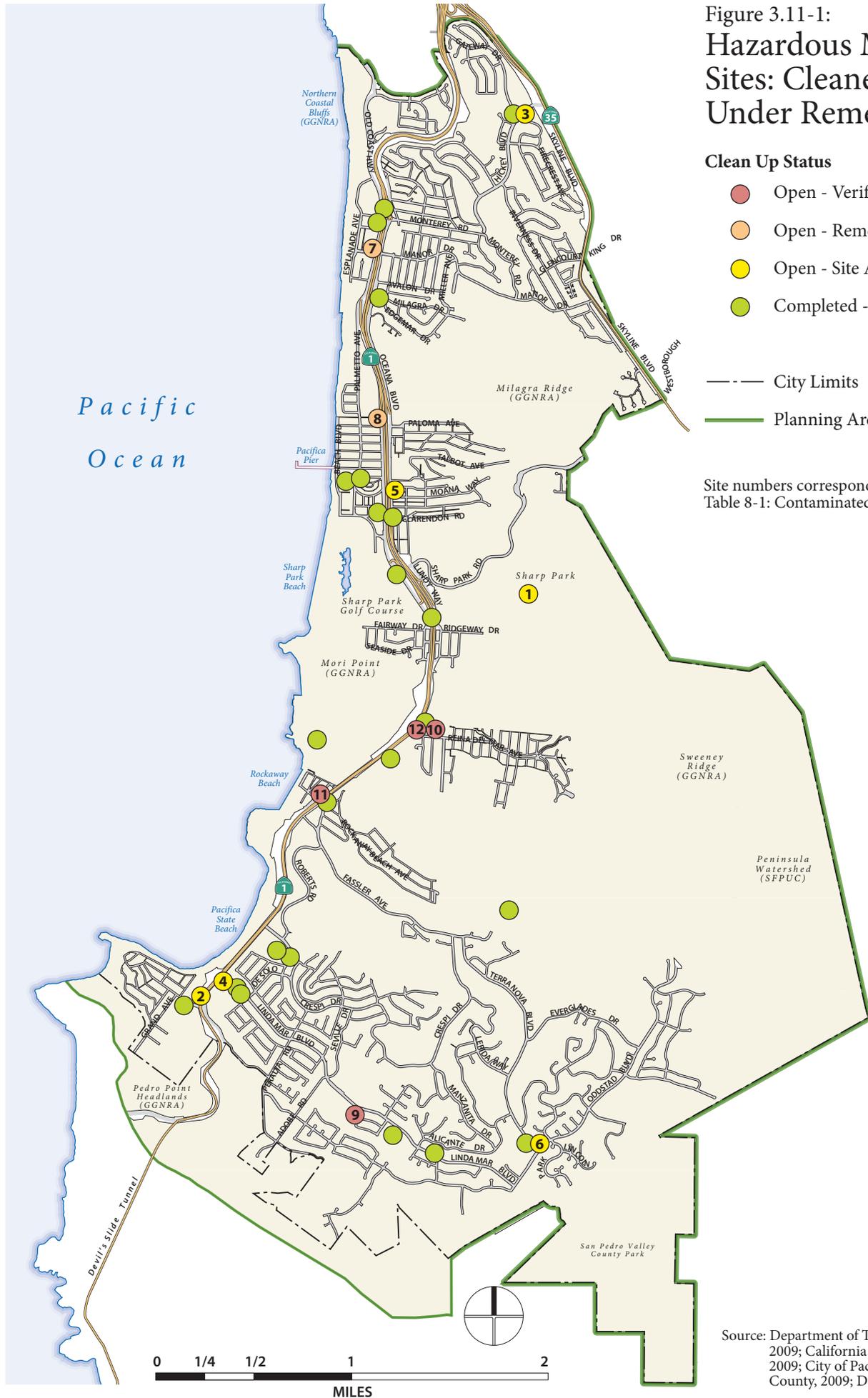
Clean Up Status

- Open - Verification Monitoring
- Open - Remediation
- Open - Site Assessment
- Completed - Case Closed

--- City Limits

— Planning Area

Site numbers correspond to  
Table 8-1: Contaminated Sites in Pacifica



Source: Department of Toxic Substances Control, 2009; California Water Resources Board, 2009; City of Pacifica, 2008; San Mateo County, 2009; Dyett & Bhatia, 2013.

Figure 3.11-2:  
**Fire Hazards and  
 Public Safety Services**

**Fire Threat Level**

- Little or No Threat
- Moderate Threat
- High Threat
- Very High Threat

**Responsibility Area**

- LRA Local (LRA)
- SRA State (SRA)
- FRA Federal (FRA)

**Very High Fire Hazard Severity Zone (VHFHSZ)**

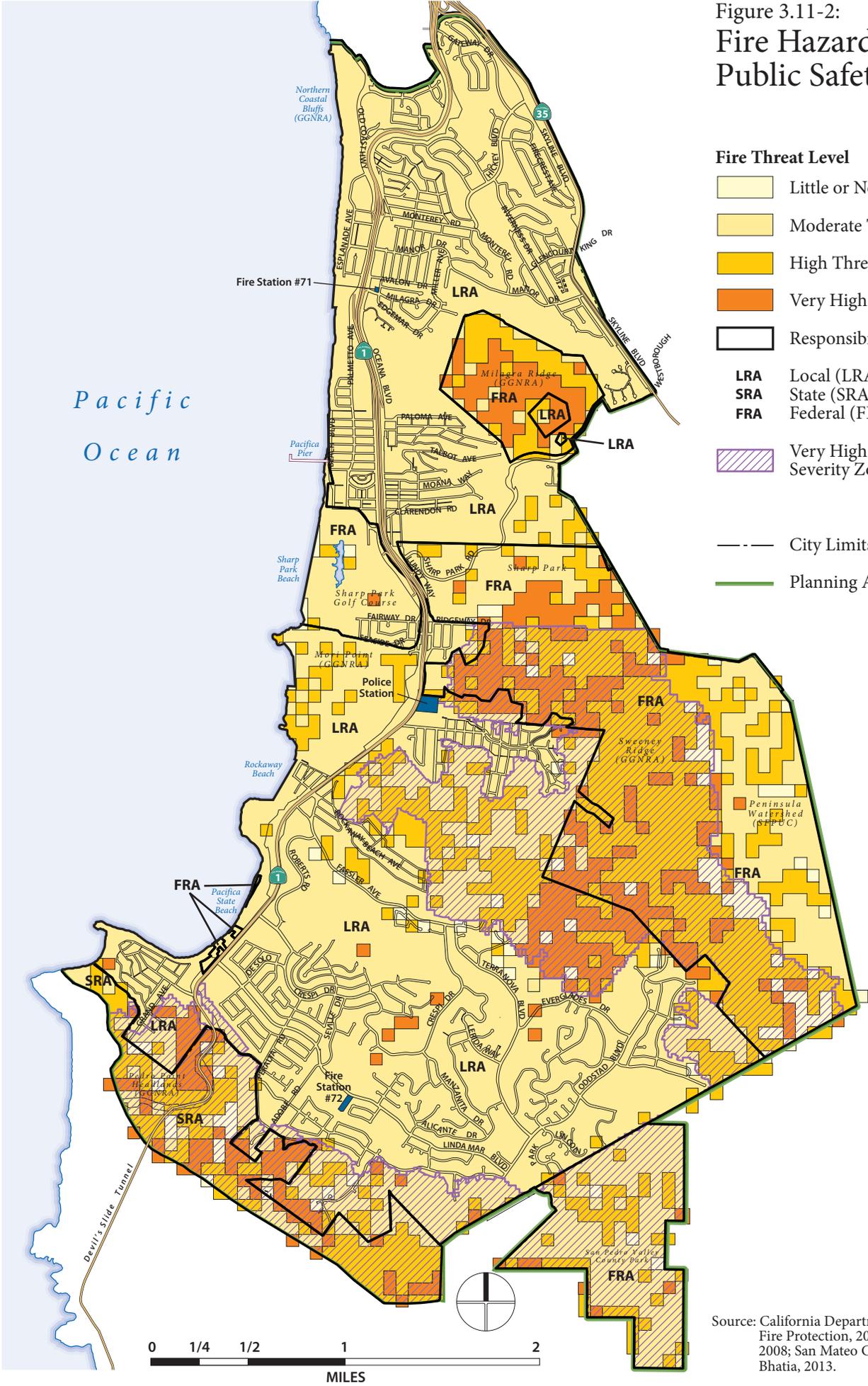
- Very High Fire Hazard Severity Zone (VHFHSZ)

**City Limits**

- City Limits

**Planning Area**

- Planning Area



Source: California Department of Forestry and Fire Protection, 2004; City of Pacifica, 2008; San Mateo County, 2009; Dyett & Bhatia, 2013.

Ten of the 12 active cleanup sites in Pacifica are classified as Leaking Underground Storage Tanks (LUSTs); most are associated with gasoline. Most of the identified sites are gas stations and auto body or repair shops. One former drycleaners is the site of a cleanup program targeting potential contamination with tetrachloroethylene (PCE). The former Sharp Park Rifle Range, identified by both the California Department of Toxic Substances Control and the State Water Resources Board, is undergoing a voluntary cleanup of residual lead from past activities. Cleanups at the Sharp Park Wastewater Plant and Golf Course were recently completed and are considered closed by the Water Resources Board.

## **FIRE HAZARDS**

Fire hazards in Pacifica include both urban and wildland fires. Urban fires involve the uncontrolled burning of built structures due to human-made causes; wildland fires affect grassland, forest, and brush (and the structures on them), and can result from either human or natural causes. Pacifica has a substantial risk of wildland fires, with many areas of high and very high threat within the Planning Area.

### **Urban Fires**

Urban fires are fires that begin in a building in urban centers. They are typically localized but have the potential to spread to an adjoining building. The risk of urban fires is highest where single-family homes, multifamily residences and business facilities are clustered close together, increasing the possibility of rapid spread to an adjoining building. The risk to life and property can be reduced by adopting and funding adequate levels of fire protection and ensuring new buildings are built to include fire resistive features which conform to modern fire and building codes.

### **Wildland Fires**

Wildland fires are fires that start in a wooded or undeveloped area. Their potential for damage is dependent on the extent and type of vegetation, known as surface fuels, as well as weather and wind conditions. Wildland fires occur infrequently but typically cause more damage than urban fires.

**Figure 3.11-2** shows the fire threat within Pacifica. About two thirds of Pacifica is undeveloped, and nearly half is protected open space. This undeveloped land is mainly on the rugged ridges that form the City's western edge and descend down to the ocean between Pacifica's valley communities. Coastal scrub is the predominant vegetation type, interspersed with annual grassland. Significant areas of eucalyptus forest and mixed woodland are present in eastern Sharp Park and on Cattle Hill and San Pedro Mountain.

The California Department of Forestry and Fire Protection (CDF) maps areas of significant fire hazards in the state. These areas are identified based on weather, terrain, fuels (e.g., type of ground vegetation), and other factors. According to the CDF:

- A Very High Fire Hazard Severity Zone is designated for much of Sweeney Ridge, Cattle Hill, Montara Mountain, and Pedro Point Headlands, directly adjacent to the

Pedro Point, Linda Mar, Park Pacifica, Vallemar, Rockaway, and East Fairway Park neighborhoods.

- Milagra Ridge, Mori Ridge, Sweeney Ridge, Montara Mountain and Pedro Point Headlands all have large areas considered to have “high” or “very high” threat of fire.
- Mori Ridge and Mori Point are classified by a mix of “high” and “moderate” risk areas.
- Nearly all of the urbanized parts of the Planning Area are classified as having a “moderate threat” level for fire.

The CDF also designates land as either a State or Local Responsibility Area (SRA and LRA), based on population density, land use, and land ownership. The City of Pacifica is an LRA while the small areas of the Planning Area outside City limits are in an SRA. Lands in Pacifica owned by the federal government and the County—GGNRA lands and San Pedro Valley County Park—are designated as a Federal Responsibility Area (FRA) within the Pacifica LRA.

## **Regulatory Setting**

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Hazardous materials and hazardous wastes are extensively regulated by federal, State, regional and local regulations, with the major objective of protecting public health and the environment. In general, these regulations provide definitions of hazardous substances; identify responsible parties; establish reporting requirements; set guidelines for handling, storage, transport, remediation, and disposal of hazardous materials and wastes; and require health and safety provisions for both workers and the public, such as emergency response and worker training programs. Sites which are subject to these regulations are identified on periodically-updated published lists at the federal, state, and local levels; the regulated sites include underground storage tank (UST) locations. The major regulations relevant to the proposed Plan are summarized in the following subsections.

### **Definitions**

#### ***Hazardous Materials***

Hazardous materials are substances with certain physical or chemical properties that could pose a substantial present or future hazard to human health or the environment when improperly handled, disposed, or otherwise managed. Title 22 of the California Code of Regulations, Division 4.5, Chapter 11, Article 3 groups hazardous materials into the following four categories based on their properties: toxic (causes human health effects), ignitable (has the ability to burn), corrosive (causes severe burns or damage to materials), and reactive (causes explosions or generates toxic gasses). Hazardous materials are commonly used in commercial, agricultural and industrial applications as well as in residential areas to a limited extent.

### **Hazardous Waste**

A hazardous waste is any waste that may (1) cause, or significantly contribute to an increase in mortality or an increase in serious irreversible, or incapacitating reversible, illness, or (2) pose a substantial present or potential hazard to human health or the environment, due to factors including, but not limited to, carcinogenicity, acute toxicity, chronic toxicity, bio-accumulative properties, or persistence in the environment, when improperly treated, stored, transported, or disposed of, or otherwise managed (California Health and Safety Code, Section 25141). Hazardous materials and wastes can result in public health hazards if improperly handled, released into the soil or groundwater, or released into the air through vapors, fumes, or dust.

### **Asbestos-Containing Materials**

Asbestos is a naturally occurring fibrous material once commonly used as a fireproofing and insulating agent in building construction before such uses were banned by the EPA in the 1970s. Asbestos can also be atmospherically deposited from vehicle brake shoes. Naturally occurring asbestos can be found in serpentinite or other metamorphosed ultramafic rocks such as dunite, peridotite, and pyroxenite.

### **Lead and Lead-Based Paint**

The presence of lead in soils above natural background levels can be a common occurrence in areas that were created by fill and in former industrial areas. Lead concentrations can also be elevated in fill materials because the fill can originate from building and industrial rubble containing or affected by sources of lead such as piping, coatings, and other construction materials. The California Code of Regulations, Title 22, considers waste soil to be hazardous if its total lead concentration exceeds 1,000 parts per million (ppm) and a soluble concentration exceeds 5 ppm. Tetraethyl lead (TEL) may be present from aerially deposited lead (ADL) from historic traffic. TEL was a gasoline additive, and although it is no longer used, it is persistent in surface and shallow soils.

### **Polychlorinated Biphenyls (PCBs)**

Polychlorinated Biphenyls (PCBs) are synthetic organic oils that were historically used in many types of electrical equipment, including transformers and capacitors, primarily as electrical insulators. Production and use of PCBs was discontinued in 1977 following the discovery that exposure to PCBs may cause various health effects including skin conditions and reduced immune system response.

### **Polycyclic Aromatic Hydrocarbons (PAHs)**

Polycyclic Aromatic Hydrocarbons (PAHs) are a group of organic chemicals found in a wide variety of materials, including crude oil, asphalt, and creosote. Most refined petroleum products also contain PAHs, either retained from the original crude or produced during the refining process. PAHs are also produced as combustion products and therefore occur in many burned or charred materials. Chemically, PAHs have high to very high molecular weights and low solubility in water, and tend to adhere to soil particles. These factors result in

generally high mobility of PAHs in the environment. Elevated concentrations of PAHs may occur in soils in Pacifica where there has been historic fill or a variety of previous uses. The U.S. EPA has classified seven PAH compounds as probable human carcinogens.<sup>1</sup>

## **Federal Regulations**

### ***Hazardous Materials***

The U.S. EPA is the lead agency responsible for enforcing federal regulations that affect public health or the environment. The primary federal laws and regulations include the Resource Conservation and Recovery Act of 1976 (RCRA) and the Hazardous and Solid Waste Amendments enacted in 1984; the Comprehensive Environmental Response, Compensation and Liability Act of 1980 (CERCLA); and the Superfund Act and Reauthorization Act of 1986 (SARA). Federal statutes pertaining to hazardous materials and wastes are contained in the Code of Federal Regulations (CFR), Title 40.

### ***Clean Water Act (CWA)***

The Clean Water Act (CWA) provides jurisdiction over waters of the United States and authorizes the Environmental Protection Agency (EPA) to implement water quality regulations. The intent of the CWA is to maintain and restore the chemical, physical, and biological integrity of the waters of the United States. The CWA includes regulatory and non-regulatory guidance to reduce direct and indirect pollution discharges into waterways.

### ***National Pollutant Discharge Elimination System (NPDES)***

Section 402(p) of the CWA establishes the National Pollutant Discharge Elimination System (NPDES) permit program. The NPDES program includes a permit that regulates discharges from municipal wastewater treatment plants, and a permit regulating municipal drainage systems that may carry stormwater, surface water and groundwater. The NPDES program also includes a construction general permit which applies to both municipal and private development projects which disturb an acre or more of soils, as well as smaller projects which have been determined to need coverage by the Regional Water Quality Control Board. This permit is discussed in more detail elsewhere in this chapter. The EPA has given authority for NPDES permitting to the California State Water Resources Control Board (SWRCB) and the nine regional water quality boards. The San Francisco Bay Regional Water Quality Control Board (RWQCB) regulates water quality for the City of Pacifica.

### ***Resource Conservation and Recovery Act (RCRA)***

The California Department of Toxic Substances Control (DTSC) is responsible for regulating the production and disposal of more than 800 hazardous substances. It enforces the federal Resource Conservation and Recovery Act in California, as well as provisions of the California Health and Safety Code that apply to toxic substances. DTSC is also responsible for

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<sup>1</sup> U.S. Environmental Protection Agency (EPA), 2010.

overseeing the cleanup of contaminated sites. As part of a nationwide policy to expedite site clean-ups, the agency created the Voluntary Cleanup Program and the Expedited Remedial Action Pilot Program, to encourage responsible parties to complete clean-ups, with incentives. The San Francisco Department of Recreation and Parks is currently undertaking a Voluntary Cleanup of the Rifle Range site in Sharp Park.<sup>2</sup>

### **State and Regional Regulations**

The U.S. EPA has delegated much of its regulatory authority to the individual states. The DTSC of the California EPA, formerly a division of the Department of Health Services, enforces hazardous materials and waste regulations in California, in conjunction with the U.S. EPA. The DTSC is responsible for regulating the management of hazardous substances including the remediation of sites contaminated by hazardous substances. California hazardous materials laws incorporate federal standards, but are often more strict than federal laws. The primary state laws include the California Hazardous Waste Control Law (HWCL; the state equivalent of RCRA); and the Carpenter-Presley-Tanner Hazardous Substance Account Act (HSAA; the state equivalent of CERCLA). State hazardous materials and waste laws are contained in the California Code of Regulations, Titles 22 and 26.

The RWQCB is authorized by the State Water Resources Control Board (SWRCB) to enforce provisions of the Porter-Cologne Water Quality Control Act of 1969. This act gives the RWQCB authority to require groundwater investigations when the quality of groundwater or surface waters of the state are threatened and to remediate the site, if necessary. The Bay Area Air Quality Management District (BAAQMD) may impose specific requirements on remediation activities to protect ambient air quality from dust or other airborne contaminants.

State laws also regulate USTs and Aboveground Storage Tanks (ASTs) containing hazardous substances. These laws are primarily found in the Health and Safety Code, and, combined with CCR Title 23, comprise the requirements of the State UST program. The laws contain requirements for UST permitting, construction, installation, leak detection monitoring, repairs and corrective actions and closures. In accordance with State laws, the San Mateo County Health System implements UST and AST regulations in San Mateo County. San Mateo County Health System also includes a number of other regulations and programs related to hazardous materials in its Toxic Program.

### **Hazardous Materials Transport**

The U.S. Department of Transportation regulates hazardous materials transportation. State agencies with primary responsibility for enforcing federal and state regulations and responding to hazardous materials transportation emergencies are the California Highway Patrol and the California Department of Transportation. Together, these agencies determine

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<sup>2</sup> California Department of Toxic Substances Control, 2009.

container types used and license hazardous waste haulers for hazardous waste transportation on public roads.

### **Hazardous Materials Worker Safety Requirements**

The Federal Occupational Safety and Health Administration (Fed/OSHA) and the California Occupational Safety and Health Administration (Cal/OSHA) are the agencies responsible for assuring worker safety in the handling and use of chemicals in the workplace. The federal regulations pertaining to worker safety are contained in the Code of Federal Regulations, Title 29 (29 CFR) as authorized in the Occupational Safety and Health Act of 1970. They provide standards for safe workplaces and work practices, including standards relating to hazardous materials handling. In California, Cal/OSHA assumes primary responsibility for developing and enforcing workplace safety regulations; Cal/OSHA standards are generally more stringent than federal regulations.

The State regulations concerning the use of hazardous materials in the workplace are included in Title 8 of the California Code of Regulations, which contain requirements for safety training, availability of safety equipment, accident and illness prevention programs, hazardous substance exposure warnings, and emergency action and fire prevention plan preparation. Cal/OSHA also enforces hazard communication program regulations, which contain worker safety training and hazard information requirements, such as procedures for identifying and labeling hazardous substances, communicating hazard information relating to hazardous substances and their handling, and preparation of health and safety plans to protect workers and employees at hazardous waste sites.

### **Waste Disposal Regulations**

The disposal of contaminated soil is regulated by the RWQCB and is regulated based on the concentrations of the chemical constituents that are present. Soils having concentrations of contaminants higher than certain acceptable levels must be handled and disposed as hazardous waste when excavated. The California Code of Regulations, Title 22, Section 66261.20-24 contains technical descriptions of characteristics that would cause a soil to be classified as a hazardous waste.

### **City of Pacifica Ordinances**

The following is a summary of relevant City of Pacifica ordinances that relate to hazardous materials found in Title 4 (Public Safety), Chapter 3, Fire Protection, Article 1: Fire Code.

Sec. 4-3.106 (Amendments: Section 2206.1) provides for the establishment of limits to districts in which storage of flammable or combustible liquids in outside aboveground tanks is prohibited.

Section 2206.1 of the California Fire Code is amended by adding the following paragraph at the end of the section:

The storage of flammable or combustible liquids in aboveground outside storage tanks is prohibited in all areas of the City except for those areas with the zoning designation of Public Facilities District. Notwithstanding the foregoing, the Fire Chief may grant a permit for such storage in other areas of the City if the Chief determines, in each case, that the storage is required for the conduct of a lawful use upon the property, will not constitute a safety hazard, and will otherwise comply with all applicable provisions of this Code and all other ordinances, rules and regulations of the City. The Chief may impose such conditions and requirements upon the issuance of the permit, as the Chief deems necessary or appropriate.

### **Fire Regulations**

The California Department of Forestry and Fire Protection (CDF) maps areas of significant fire hazards in the state. These areas are identified based on weather, terrain, fuels (e.g. type of ground vegetation), and other factors. The CDF designates land as State or Local Responsibility Areas (SRA and LRA), based on population density, land use, and land ownership. CDF is responsible for classifying fire hazards, and for designating Very High Fire Hazard Severity Zones (VHFHSZ) for SRA lands. CDF also identifies VHFHSZ for LRA lands, and periodically reviews local agency regulatory actions.

The City of Pacifica is a Local Responsibility Area (LRA), while the small areas of the Planning Area outside City limits are part of the SRA in San Mateo County. However, lands in Pacifica owned by the federal government and the County—GGNRA lands and San Pedro Valley County Park—are designated as a Federal Responsibility Area (FRA) within the Pacifica LRA. Within the Planning Area, VHFHSZ are designated on parts of Sweeney and Mori Ridges, within the FRA on GGNRA lands, and also to the land directly south of City limits on the slope of Montara Mountain.

### **California Wildland Hazard/Building Code**

On September 20, 2005, the California Building Standards Commission approved the Office of the State Fire Marshal's emergency regulations amending the California Code of Regulations (CCR), Title 24, Part 2, the 2013 California Building Code (CBC).

New buildings located in any Fire Hazard Severity Zone shall comply with one of the following:

1. State Responsibility Areas. New buildings located in any Fire Hazard Severity Zone within State Responsibility Areas, for which an application for a building permit is submitted on or after January 1, 2008, shall comply with all sections of this chapter.
2. Local Agency Very-High Fire Hazard Severity Zone. New buildings located in any Local Agency Very High Fire Hazard Severity Zone for which an application for a building permit is submitted on or after July 1, 2008, shall comply with all sections of this chapter.
3. Wildland-Urban Interface Fire Area designated by the enforcing agency. New buildings located in any Wildland-Urban Interface Fire Area designated by the

enforcing agency for which an application for a building permit is submitted on or after January 1, 2008, shall comply with all sections of this chapter.

**Public Resources Code**

Also in 2005, Public Resources Code (PRC) 4291 was amended to expand the defensible space clearance requirement around buildings from 30 feet to 100 feet, in any SRA. Building owners must minimize potential fuel around structures, to minimize the risk of loss, and to improve firefighter safety.<sup>3</sup>

**Local Hazard Mitigation Plan**

In 2005, a task force representing the City of Pacifica studied the City's exposure to natural hazards and identified mitigation strategies. The task force's work was incorporated into the regional Local Hazard Mitigation Plan directed by the Association of Bay Area Governments (ABAG).

The task force examined Pacifica's exposure to fire threats due to the interface between urbanized areas and wildland areas, and the steep terrain and occasionally narrow streets. The task force concluded in most cases, response time is within the acceptable range of six minutes, fifty-nine seconds, and that water supply and storage capacity are adequate for firefighting.

The Plan identifies two mitigation strategies concerning wildland fires. Of these, one is noted as an existing policy: to review development proposals to ensure that they incorporate appropriate fire-mitigation measures, including adequate provisions for evacuation and access by emergency responders. A second measure is identified as a moderate priority: to develop a clear legislative and regulatory framework at both the state and local levels to manage the wildland-urban interface consistent with best practices.<sup>4</sup>

**City of Pacifica General Plan**

The Seismic Safety and Safety Element of the General Plan details the known and potential hazards from wildland fires, as well as other issues dealt with elsewhere in this document. The Element identifies the hazards of wildland fires combined with steep terrain, narrow streets, and inadequate water supply in some areas. The Element identifies fire prevention, including public education and code enforcement, as the most effective means of suppressing fire.

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<sup>3</sup> California Department of Forestry and Fire Protection, 2009.

<sup>4</sup> Association of Bay Area Governments, 2005.

## Impact Analysis

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### SIGNIFICANCE CRITERIA

Implementation of the proposed General Plan would have a potentially significant adverse impact if it would:

- Criterion 1:** Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials.
- Criterion 2:** 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.
- Criterion 3:** Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school.
- Criterion 4:** Allow development on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, create a significant hazard to the public or the environment.
- Criterion 5:** Result in a safety hazard for people residing or working in the project area, where located within the Comprehensive Airport Land Use Compatibility Plan for San Francisco International Airport.
- Criterion 6:** Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan.
- Criterion 7:** Expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands.

### IMPACT SUMMARY

The Planning Area contains 13 hazardous substance sites as well as large amount of open space land prone to fire hazard. The potential impacts in relation to specific hazards in the Planning Area are evaluated within each of the impacts below. The proposed General Plan does not call for extensive movement or creation of hazardous materials that could harm the public or the environment. The proposed General Plan will not result in safety hazards in relation to the Comprehensive Airport Land Use Compatibility Plan. In addition, the exposure of people or structures to wildland fires as a result of the proposed General Plan is not expected to occur. The potential of the creation of hazards or exposure to hazardous materials under the proposed General Plan remains less than significant with adherence to existing regulations and implementation of the policies of the proposed General Plan.

## IMPACTS AND MITIGATION MEASURES

### Impact

#### **3.11-1 Implementation of the proposed Pacifica General Plan would not create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials. (*Less than Significant*)**

Hazardous materials are regularly used, transported, and disposed of in Pacifica. As reported above, these activities are subject to a variety of local, State and federal regulations. Hazardous materials would be required to be transported under DOT regulations. Future development under the proposed General Plan would be subject to regulatory programs such as those overseen by the Regional Water Quality Control Board and the Department of Toxic Substances Control. San Mateo County has substantial regulations concerning hazardous materials under its Toxic Programs; for example, all businesses in San Mateo County must submit a Business Plan for the safe storage and use of chemicals if the business handles and/or stores a hazardous material equal to or greater than the minimum reportable quantities. Nevertheless, despite these regulations, accidental release due to accidents, misuse or natural disasters could occur. Additional residential, commercial, and industrial development resulting from buildout of the proposed General Plan would likely increase the amount of hazardous materials transported, used or disposed of in the City.

Compliance with federal, State and local regulations, combined with proposed General Plan policies outlined below, will reduce the potential for a significant adverse effect on the environment, due to upset and accident involving the use, transport, and disposal of hazardous materials, to a less than significant level.

#### **Proposed General Plan Policies that Reduce the Impact**

##### *Safety Element*

- SA-G-4 **Contaminated Sites.** Facilitate clean-up programs at contaminated sites, particularly on properties with the potential to develop or be reused for public purposes.
- SA-G-5 **Safe Disposal.** Continue to promote the reduction, recycling, and safe disposal of household and business hazardous wastes through public education and awareness.
- SA-I-36 **Cleanup of Contamination.** Require applicants for development in a potentially contaminated location to perform inspection and cleanup if the site is found to be contaminated with hazardous substances.

*The City will require the project applicant to have the site inspected by a registered Environmental Assessor. Reports detailing the results must be submitted for City review, and level of remediation and cleanup must be in compliance with federal and State standards.*

SA-I-37 **Regional Support.** Continue to support the hazardous waste collection, management, and inspection efforts of San Mateo County, the State, and the Water Resources Control Board.

**Mitigation Measures**

None required.

**Impact**

**3.11-2 Implementation of the proposed Pacifica General Plan would not create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment. (*Less than Significant*)**

As noted above, hazardous materials are regularly used, transported, and disposed of in Pacifica. The City implements a variety of local, State and federal regulations designed to address the use, transportation, and disposal of these materials. Although such activities are relatively well regulated and monitored, accidental release due to accidents, misuse or natural disasters (e.g., earthquakes) could occur. Additional residential, commercial, and industrial development resulting from buildout of the proposed General Plan would likely increase the amount of hazardous materials transported, used or disposed of in the City. Although a number of businesses in the Study Area routinely store, handle, and transport hazardous substances, the use of these hazardous materials is controlled and permitted by San Mateo County's Toxic Programs and regulations, and otherwise ensures that risks associated with the use of hazardous materials in the community are minimized. Furthermore, the proposed General Plan includes several policies that have been developed to ensure a safe environment for its residents, visitors, and businesses.

**Proposed General Plan Policies that Reduce the Impact**

Policies mentioned under Impact 3.11-1 would also help reduce this impact to a less than significant level.

**Mitigation Measures**

None required.

**Impact**

**3.11-3 Implementation of the proposed Pacifica General Plan would not emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school. (*Less than Significant*)**

Schools are one of several sensitive receptors that must be taken into consideration when the City is reviewing new land uses or transportation routes that may accommodate the production, storage, use, or transportation of hazardous materials and/or wastes. Buildout under the proposed General Plan would result in increased population levels, however, based

on the impact analysis for schools in section 3.12 (Parks, Public Services and Facilities) there does not exist a need for additional school facilities. Therefore, no new schools would be constructed that would result in exposure to hazardous materials. In addition, exposure to hazardous materials within one-quarter mile of school facilities from new sources as a result of the proposed General Plan are not expected to occur, due to the minimal amount of growth expected under the proposed General Plan.

School acquisition/development projects to be funded under the State School Facilities Program must satisfy several specific requirements established under the California Education Code and California Code of Regulations, in addition to CEQA review. These regulations require that potential school hazards relating to soils, seismicity, hazards and hazardous materials, and flooding be addressed during the school site selection process. Compliance with these requirements will address hazardous conditions associated with the siting of new public schools within the Planning Area. Therefore, the impact is less than significant.

***Proposed General Plan Policies that Reduce the Impact***

Policies listed under Impact 3.11-1 would also help reduce this impact to a level that is less than significant.

***Mitigation Measures***

None required.

**Impact**

**3.11-4 Implementation of the proposed Pacifica General Plan could allow development on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 but would not, as a result, create a significant hazard to the public or the environment. (*Less than Significant*)**

Development as a result of buildout of the proposed General Plan could occur on a site contaminated with hazardous substance sites as determined by the California Department of Toxic Substances Control and the State Water Resources Board, as listed above.

Following proposed Policy SA-I-1, applicants interested in developing on hazardous substance sites must complete an inspection and clean the site if hazardous materials are found. In addition, compliance with all federal, State and local regulations would reduce the potential of creating a significant hazard to the public to a less than significant level.

***Proposed General Plan Policies that Reduce the Impact***

***Safety Element***

Policy SA-I-1, as listed above.

**Mitigation Measures**

None required.

**3.11-5 Implementation of the proposed Pacifica General Plan would not result in a safety hazard for people residing or working in the project area, where located within the Comprehensive Airport Land Use Compatibility Plan for San Francisco International Airport. (*Less than Significant*)**

San Francisco International Airport (SFO) is located approximately four miles east of the Planning Area. The entire city of Pacifica is located within the Airport Influence Area (AIA) A, which includes all of San Mateo County, as specified by the Comprehensive Airport Land Use Compatibility Plan. However, none of the Pacifica is contained within AIA B, which includes a combination of noise and safety zones for SFO. Development under the proposed General Plan does not include development that is incompatible with aviation activity (e.g., tall structures, development that produces glint/glare or attracts wildlife that can be hazardous to aircraft, noise sensitive development, etc.). Potential hazards to airport operations in San Mateo County are regulated by the City/County Association of Governments of San Mateo County (C/CAG) which has been designated as the Airport Land Use Commission for San Mateo County. The proposed General Plan would not interfere with any airport use plan or otherwise create an airport-related safety hazard.

**Proposed General Plan Policies that Reduce the Impact**

**Safety Element**

- SA-I-48 **Emergency Plan.** Update and maintain the City's Emergency Plan, which provides adequate response to disasters, including emergency ingress and egress, and defines the expected roles of City, County, and regional agencies.
- SA-I-49 **Emergency Response Coordination.** Develop effective mechanisms for a coordinated response to natural and man-made emergencies by:
- Conducting regular emergency planning meetings and disaster preparedness exercises with City departments, the Fire District, the County, medical centers, and other emergency service providers and relevant public agencies;
  - Holding emergency drills that require all City staff to be adequately trained to handle different kinds of emergency scenarios; and
  - Coordinating with the County on regional emergency communications.

**Mitigation Measures**

None required.

**3.11-6 Implementation of the proposed Pacifica General Plan would not impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan. (*Less than Significant*)**

As more fully described in section 3.2 (Transportation), implementation of the proposed Plan would result in an increased number of vehicle trips and miles of vehicular travel within the Planning Area. Roadway improvements under the proposed General Plan will reduce the effect of additional traffic on emergency response times. See Impact 3.3-2 for an expanded discussion of the effects of the proposed Plan on emergency access. The Safety Element of the General Plan provides policies that address conformance with local emergency response programs and continued cooperation with emergency response service providers. For example, policies have been developed to ensure that all applicable disaster plans are updated regularly and a coordinated emergency response system is maintained with other agencies. As such, implementation of the proposed Plan would not physically impede the response times of emergency response vehicles or delay implementation of an evacuation plan, resulting in a less than significant impact.

**Proposed General Plan Policies that Reduce the Impact**

*Circulation Element*

C-I-26     **Emergency Access.** Require all developers to incorporate emergency access needs consistent with Title 10 of the Municipal Code.

*See Chapter 8: Safety (of the proposed General Plan) for related policies.*

*Safety Element*

Policies SA-I-48, SA-I-39, as listed above.

SA-I-50     **Emergency Access on New Roadways.** Ensure that new roadways are developed in accordance with standards the Municipal Code. In all new development, require adequate access to be provided for emergency vehicles, including adequate widths, turning radii, hard standing areas, and vertical clearance.

SA-I-51     **Areas that Lack Emergency Access.** Develop a plan to widen critical rights-of-way that do not provide adequate clearance for emergency vehicles. For areas that are not feasibly accessible to emergency vehicles, develop a contingency plan for reaching and evacuating people in need of treatment.

*This initiative should include a plan to open access to or otherwise serve the Shelter Cove neighborhood.*

SA-I-52     **Regulatory Monitoring.** Continue to monitor changes in the Federal Disaster Act and applicable State laws, keep City officials and residents aware of the impacts of these changes, and update the City's Emergency Plan as necessary.

SA-I-53     **Public Preparedness.** Initiate periodic public information programs that explain the City's emergency preparedness programs, including the emergency communications system, evacuation routes, and shelter locations.

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*Each household should be self-sufficient for 72 hours after a disaster. The City will post information on the City's website and in other visible public locations, such as City Hall about emergency preparedness.*

- SA-I-54 **Local Hazard Mitigation Plan.** Continue to maintain and update a Local Hazard Mitigation Plan as an implementation action for the Safety Element.
- SA-I-55 **Emergency Water Capacity.** Work with the Water District to ensure that it has a plan and infrastructure for providing adequate water service and storage during and immediately after an emergency, including a major seismic event.
- SA-I-56 **Utilities.** Require companies providing public utilities in Pacifica to have plans for re-establishing service in the event of a major seismic event or other natural disaster.
- SA-I-57 **Police Response.** Continue to respond without delay to all calls for police assistance as soon as possible consistent with normal safety precautions and vehicle laws. Periodically review procedures and response times to ensure equitable service across the community.
- SA-I-58 **School Outreach.** Continue to partner with schools and youth organizations to conduct outreach and develop conflict resolution, and form pro-active and creative community partnerships to enhance public safety.
- SA-I-59 **Periodic Evaluation.** Periodically, evaluate police and fire services to ensure that the City is providing adequate protection in an efficient, cost-effective manner.
- SA-I-60 **Critical Facilities Location.** Do not locate structures necessary for protection of the public's health and safety, public assembly, or emergency services in hazardous areas unless no reasonable alternative exists.
- SA-I-61 **Critical Facilities Operability.** Take steps to ensure critical use facilities that are important to protecting health and safety in the community remain operational during an emergency.
- SA-I-62 **Code Updates.** Update City codes and ordinances dealing with public safety to comply with State law and reflect the latest information on hazards and mitigation strategies.

**Mitigation Measures**

None required.

**3.11-7 Implementation of the proposed Pacifica General Plan would not expose people or structures to a significant risk of loss, injury or death involving wildland fires, including where wildlands are adjacent to urbanized areas or where residences are intermixed with wildlands. (*Less than Significant*)**

Wildland fires pose a threat to Pacifica due to the large amount of open space that exists within the City. About two-thirds of Pacifica is undeveloped, and nearly half is protected open space. This undeveloped land is mainly on the rugged ridges that form the City's western edge and descend down to the ocean between Pacifica's valley communities. Coastal scrub is the predominant vegetation type, interspersed with annual grassland. Significant areas of eucalyptus forest and mixed woodland are present in eastern Sharp Park and on Cattle Hill and San Pedro Mountain. As described above, the California Department of Forestry and Fire Protection (CDF) has identified significant fire hazard areas within the City. The CDF identified areas with "very high," "high," and "moderate" fire threat levels within the City.

The Urban-Wildland Interface of Pacifica allows residents to enjoy close contact with open ridges and woodlands, and in addition brings residents in close proximity to the risk of Wildland fires. While the great majority of areas considered to have high or very high fire threat are located in preserved open space areas, some potentially developable land on the slopes above the Rockaway and Vallemar neighborhoods, on Fassler Ridge, and on the slopes of San Pedro Mountain also present fire hazards.

The North County Fire Authority practices fire prevention activities, including its Vegetation Management Program. State and federal regulations, and City of Pacifica development standards play an important role in limiting potential fire hazards. The Safety Element of the proposed Plan provides policies that provide a basis for planning for future fire threats as well as guidelines to ensure the City is prepared for potential wildland fires. Continued compliance with existing programs and standards as well as General Plan policies would reduce potential fire hazards to a less than significant level.

### **Proposed General Plan Policies that Reduce the Impact**

#### *Safety Element*

SA-G-6 **Fire Prevention.** Protect Pacifica residents and businesses from potential wildland fire hazards.

SA-I-38 **Response Time.** Support efforts by North County Fire Authority to meet its response time standards throughout the City.

*This effort may include construction of a third fire station in the central part of Pacifica, near the police station or the Quarry site. The City could provide land or shared facilities.*

SA-I-39 **Adequate Peakload Water Supply.** Work with the Water District to maintain adequate water supply for firefighting, including capacity for peakload under a reasonable worst case wildland fire scenario, to be determined by the North County Fire Authority.

SA-I-40 **Water Storage Locations.** In evaluating sites for new water storage facilities, place a priority on locations least subject to impacts from seismic activity and landsliding.

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- SA-I-41    **Development Review.** Continue to review development proposals to ensure that they incorporate appropriate fire-mitigation measures, including adequate provisions for evacuation and access by emergency responders.
  
- SA-I-42    **Plan Review in Fire-Prone Areas.** Continue to request the North County Fire Authority participation in plan review of new buildings in potentially fire-prone areas.
  
- SA-I-43    **Fire Prevention Inspections.** Continue to require a fire prevention inspection of every permitted business and multi-family development covered by the North County Fire Authority.
  
- SA-I-44    **Fire Prevention Education.** Continue educating the public about local fire hazard prevention programs. Work cooperatively with the North County Fire Authority to promote public awareness of fire safety and emergency life support.
  
- SA-I-45    **Vegetation Management.** Promote and support the North County Fire Authority's Vegetation Management Program to reduce urban/wildland interface fire hazards.
  
- SA-I-46    **Multi-jurisdictional approach.** Participate in State or regional efforts to develop a clear legislative and regulatory framework to manage the wildland-urban interface.
  
- SA-I-47    **Rockaway Quarry service.** Ensure that any new development at the Rockaway Quarry site is adequately served by public infrastructure, including fire and police services.

***Mitigation Measures***

None required.

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