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# MOSS LANDING



# COMMUNITY PLAN

*Revised Working Draft*

Moss Landing Community Plan  
(Chapter 5 of the *North County Land Use Plan*)

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DRAFT



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## 1.0 INTRODUCTION

### 1.1 Purpose

The Moss Landing Community Plan has been prepared to provide a comprehensive planning framework to improve and enhance the community. The findings, policies and recommendations contained in this chapter of the *North County Land Use Plan* are the result of a cooperative land use planning effort between the Monterey County Resource Management Agency, various public agencies, and members of the community. The contents of this plan used the Moss Landing Community Plan adopted in 1982 as the baseline and addressed the current circumstances of the community and environment.

In a periodic review of the Monterey County Local Coastal Program conducted in 2003, the California Coastal Commission (CCC) identified numerous areas in which the Moss Landing Community Plan could be improved. They noted that since certification of the North County Land Use Plan in 1982 (containing the Moss Landing Community Plan) there had been substantial changes in Moss Landing, including the expansion of coastal-dependent marine research facilities in the community (e.g., MBARI and Moss Landing Marine Laboratory). They also noted that during the same period the County of Monterey had approved other developments, including a convenience market, four retail shops, a bed and breakfast, fish processing, bait and tackle, a restroom at the harbor, and power plant improvements. Finally, they noted that more recent proposals and planning exercises had revealed the need to address erosion in the harbor, provide drainage and other infrastructure improvements, and improve harbor facilities.

The CCC concluded that there was a need to revise and update the Moss Landing Community Plan to protect community character and prevent resource damage. They further concluded that updated land use designations were needed to better describe existing uses and that appropriate locations and densities for proposed priority uses were also

needed. Finally, the CCC noted that the County of Monterey's land use authority was limited in this area and other agencies had significant roles to play, creating a need for coordinated planning and regulation by all the relevant agencies.

## 1.2 Planning Area and Neighborhoods

Moss Landing is located on California's Central Coast in the Monterey Bay Region. Figure ML-1 shows the regional location of the Moss Landing Community Plan area. For the purpose of easy reference, the Planning Area has been divided into seven neighborhoods—North Harbor, Elkhorn, Island, Dolan, Village, South Harbor, and Heights. Figure ML-2 shows the location of the Moss Landing neighborhoods.

## 1.3 Intended Effect of Plan

There are two components of the *Moss Landing Community Plan* (Plan) that are intended to have force and effect. First, the Plan contains figures labeled as "diagrams" and textual descriptors—in the form of land use designations, transportation classifications, and other descriptors—that are provided to interpret the diagrams. Second, the Plan contains goals and policies that supplement the *North County Land Use Plan*, of which it remains a part. Together, these two components are a part of the constitution for development in Moss Landing and comprise the local expression of development policy set forth in the California Coastal Act.

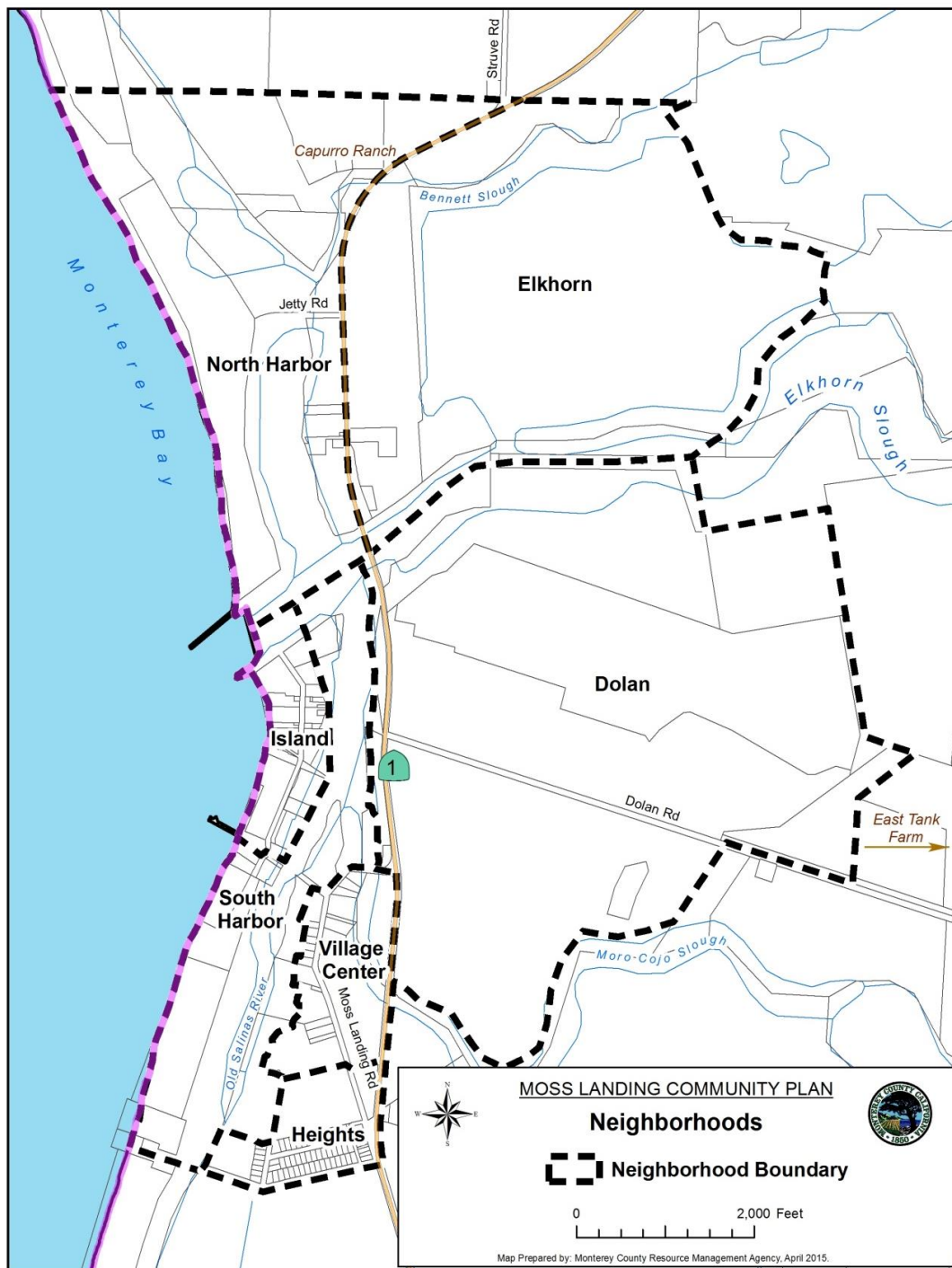
The *Moss Landing Community Plan* also contains text, tables, and figures that are not intended to have force or effect. Such materials describe existing conditions, estimate future conditions, summarize the planning update process, and otherwise provide context and background intended only to guide the reader through the document and provide the rationale for this local exercise of police power to protect and promote the public health, safety, and welfare in Moss Landing. Appendix A contains a glossary of terms used in the plan.

**Figure ML-1: Regional Location**



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Figure ML-2: Moss Landing Neighborhoods



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## 1.4 Monterey County Economic Development Initiative

The Moss Landing Community Plan is one aspect of Monterey County's economic development efforts, which gained renewed focus in 2011 with the engagement of SRI International to conduct an economic strategic planning process. As a result of this work, the Monterey County Board of Supervisors reaffirmed its commitment to provide the foundation for economic growth in the region.

In its report, SRI International identified a series of strategic initiatives to expand and enhance core components of the Monterey County economy—tourism, education/research, agriculture, and small business. Moss Landing plays a key role in many of these initiatives.

- **Eco-Recreation.** Moss Landing is located adjacent to Elkhorn Slough, which has been designated as a State Scenic Waterway and hosts eco-tourists year-round who come for kayaking, bird watching, and environmental education. In addition, the Monterey Bay Marine Sanctuary Scenic Trail runs through Moss Landing, and is slated for major improvements including a bike and pedestrian bridge over Elkhorn Slough next to State Route 1. This improved scenic trail has the potential to bring additional bicyclists and hikers into Moss Landing, in support of small business and the eco-recreation industry. Finally, there is opportunity in Moss Landing for new visitor accommodations in support of eco-recreation and coastal access.
- **Marine Research and Education.** Moss Landing is host to the Monterey Bay Aquarium Research Institute (MBARI) and Moss Landing Marine Laboratories (MLML), both of which are world-class marine science and educational facilities with plans for expansion.
- **Aquaculture.** Moss Landing has a significant aquaculture industry that produces food and other ocean products for

the region and nation, and there are opportunities to expand this industry.

- **Green Industry.** Moss Landing has a large business park site that is well suited to host industrial and public service uses that could take advantage of waste heat, water, exhaust gas, or other by-products from the Moss Landing Power Plant located next door.
- **Small Business/Mixed Use.** Moss Landing has a small village center with the potential to become a vibrant main street commercial district that draws tourists and locals in for dining, shopping, and entertainment. The district has room for upper story apartments and live/work spaces that would provide ready customers for business expansion.

## 1.5 Relationship to Other Plans and Designations

The *Moss Landing Community Plan* is a part of the *North County Land Use Plan*, which was adopted in June 1982 and last amended in December 1996. The *North County Land Use Plan* is one of four land use plans that constitute the Local Coastal Program (LCP) of Monterey County. The other three land use plans include the *Big Sur Coast Land Use Plan*, the *Carmel Land Use Plan*, and the *Del Monte Forest Land Use Plan*.

The Local Coastal Program of Monterey County—comprised of the four documents cited above—is itself a part of the 1982 *Monterey County General Plan*. The County of Monterey adopted an updated General Plan in 2010, and this document was crafted so as to not supersede the authority of the 1982 Monterey County General Plan vis-à-vis the Local Coastal Program of Monterey County. The intent here is to update the LCP in a process separate from, and subsequent to, the preparation of the 2010 *Monterey County General Plan*.



As a result, the policies contained in the *1982 Monterey County General Plan* still have force and effect in the *North County Land Use Plan* and the *Moss Landing Community Plan*. To the degree that policies in any one of the documents—the *Moss Landing Community Plan*, the *North County Land Use Plan*, and the *1982 Monterey County General Plan*—conflict, the more restrictive policy applies. The one exception to this rule is the *Moss Landing Community Plan* Land Use Diagram, which supersedes any other land use diagram contained in any of the other cited documents. The Local Coastal Program of Monterey County also includes the Coastal Implementation Plan (CIP) consisting of implementing ordinances contained in Title 20 of the Monterey County Code. Figure ML-3 depicts the relationship between the *Moss Landing Community Plan* and other Monterey County planning documents.

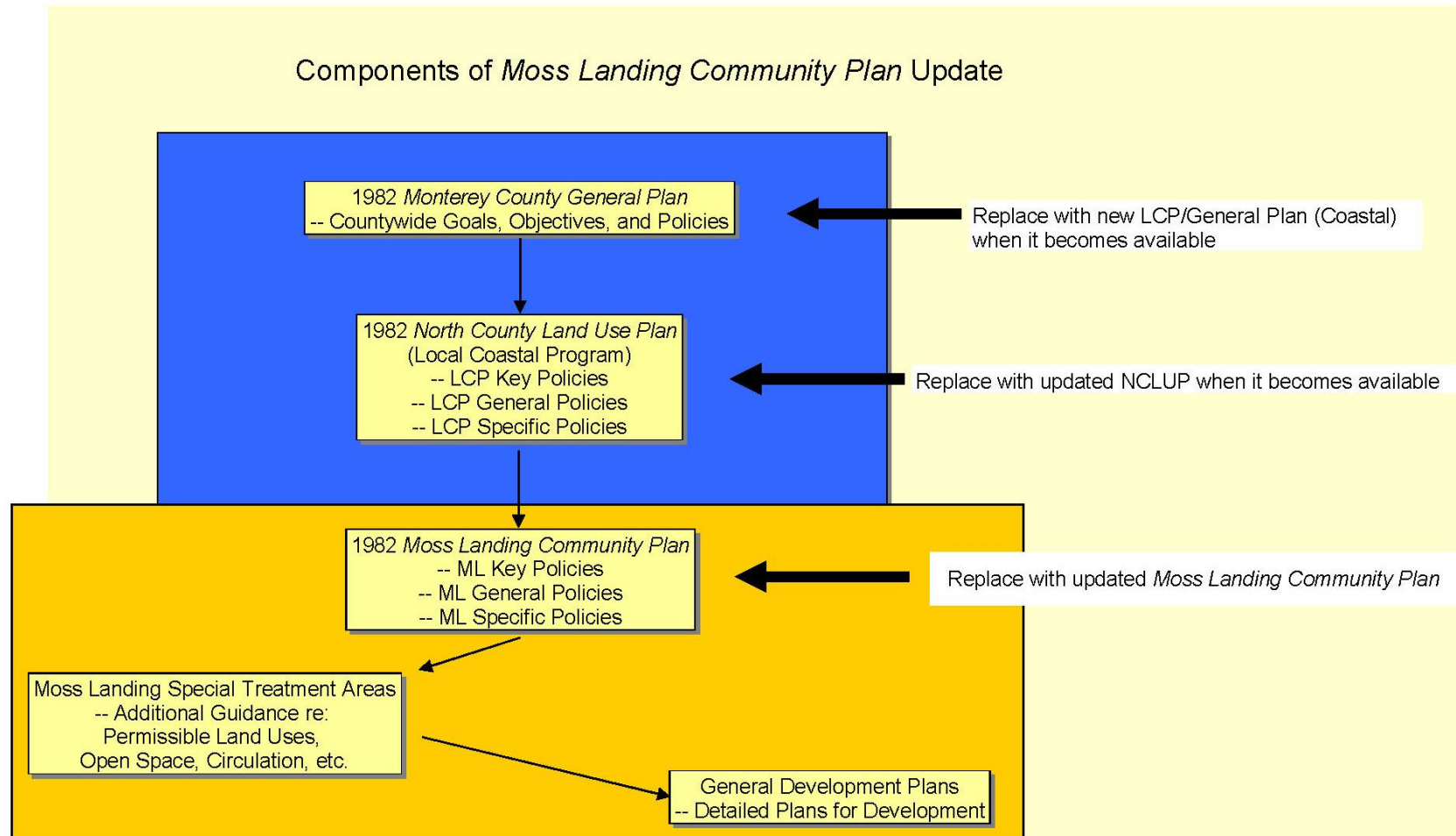
In addition to the Monterey County plans discussed above, significant areas in and around Moss Landing are subject to state and/or federal designations in recognition of the significant natural resources that exist there. These areas include:

- Monterey Bay National Marine Sanctuary,
- Elkhorn Slough State Marine Conservation Area,
- Elkhorn Slough State Marine Reserve,
- Elkhorn Slough Ecological Reserve,
- Moss Landing State Wildlife Area,
- Moro Cojo Slough State Marine Reserve, and
- California State beaches.

These designations offer multiple layers of protection beyond those provided by Monterey County for Elkhorn Slough and other important natural resources in the planning area. Figure ML-4 shows affected state and federal resources.

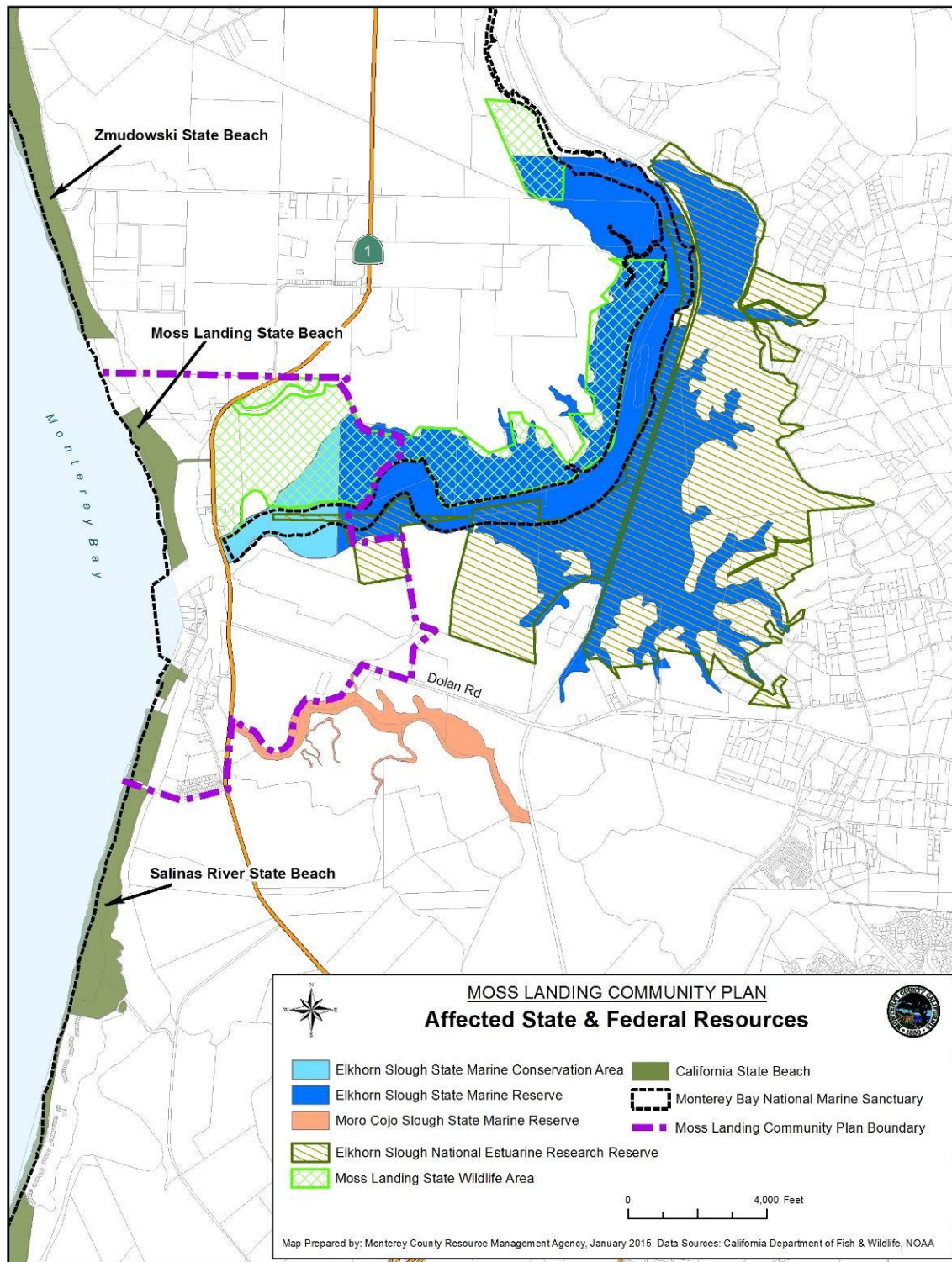
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**Figure ML-3: Relationship to Other Plans**



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**Figure ML-4: Affected State and Federal Resources**



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## 1.6 Public Participation

### 1.6.1. 1982 PLAN DEVELOPMENT

An integral part of the community planning process was a program of public participation. This included general public workshops and meetings, North County Citizens Advisory Committee (CAC) meetings, CAC Harbor and Industry Development Sub-Committee meetings, and Technical Advisory Committee meetings on specialized topics. A particularly high degree of public involvement was achieved at several major public meetings held during the planning period. One of these meetings was devoted primarily to a mapping workshop in which attendants were asked to draw their own plans for the community. A total of 10 plans were mapped and no fewer than 275 comments were tabulated. A great number of the ideas and comments articulated at this workshop were used in developing the original Community Plan for Moss Landing.

### 1.6.2. 2017 PLAN DEVELOPMENT

This update process began with a series of Citizens Advisory Committee meetings through a nine-month period, which culminated in a set of recommendations presented to the Board of Supervisors on January 15, 2009. Most of these recommendations have been incorporated into this update.

After a period of inactivity, the update project continued with a series of meetings in May, August, and October 2012 to discuss the Moss Landing Community Plan. These meeting culminated in a draft plan being published in October 2012, and the preparation of an environmental impact report was then initiated. Revised draft plans were published in July 2014 and August 2017, and additional meetings were held to discuss the new draft plan. Throughout the multi-year process, hundreds of public comments were received. These comments led to improvements in the Plan document.

## 1.7 Supplemental General Policies

The following policy supplements the more general coastal policies contained in the *North County Land Use Plan*, and for a

complete understanding of the policies that govern development in the Moss Landing Community Area, one must refer also to that document.

- NCLUP-ML-1.1.     The County of Monterey shall support comprehensive planning in Moss Landing and support and participate in, to the extent that resources allow, initiatives to pursue multi-agency planning and regulatory streamlining for Moss Landing, evaluate responses to erosion, and manage land-based disposal of dredge materials.





## 2.0 LAND USE

### 2.1 Introduction

This section sets forth a land use plan and land use policies for Moss Landing.

### 2.2 Existing land Use

Moss Landing is a relatively stable community (Figure 2.2.1) with a diverse array of existing land uses, including heavy industrial uses, marine research, a small-craft harbor, commercial uses, and a small residential community. Moss Landing Power Plant is the largest industrial use in Moss Landing and supplies electrical power to the entire Central Coast Region. The Monterey Bay Aquarium Research Institute (MBARI) and the Moss Landing Marine Laboratory (MLML) form the anchor of marine research activities in Moss Landing and together with facilities at the University of California Santa Cruz and on the Monterey Peninsula make the Monterey Bay Area a world leader in marine research and education. Moss Landing Harbor provides berths for research vessels, fishing boats, and a variety of smaller yachts and boats. Moss Landing also has an historic village center that is host to a variety of small-scale commercial uses, and along its southern edge, Moss Landing has a small, stable residential community.

Moss Landing is home to important natural and agricultural resources. The Old Salinas River, Elkhorn Slough, Moro Cojo Slough, and Bennett Slough host a rich variety of plant and animal species and are subject to state and/or federal protection. Moss Landing is also home to two state beaches—Salinas River State Beach Park and Moss Landing State Beach—which provide recreational opportunities to visitors from near and far. Moss Landing also hosts an aquaculture industry that produces high-quality seafood for the region, and surrounding agricultural lands produce a variety of row crops, including lettuce and strawberries.

Table ML-1 summarizes existing land uses in Moss Landing.

**Table ML-1: Existing Land Uses**

<b>Land Use Type</b>	<b>Area (Acres)</b>	<b>Percent of Total</b>	<b>Comm/ Ind Bldgs (Sq Ft)</b>	<b>Units</b>
<b>Urban Uses</b>				
Single Family Dwelling	10.67	1.6%	--	53
Multi-Family Dwelling	0.40	0.1%	--	4
Commercial	19.64	3.0%	103,200	--
Light Industrial	5.99	0.9%	36,950	--
Power Plant	263.43	40.7%	--	--
Heavy Industrial	182.68	28.2%	165,000	--
Public/Quasi Public	61.95	9.6%	224,600	--
Vacant	102.18	15.8%	--	--
<b>Total</b>	<b>646.94</b>	<b>100.0%</b>	<b>529,750</b>	<b>57</b>
<b>Non-Urban Uses</b>				
Open Space	738.88	69.6%	--	--
Agriculture	322.51	30.4%	--	7
<b>Total</b>	<b>1,061.39</b>	<b>100.0%</b>	<b>0</b>	<b>7</b>
<b>Visitor Accommodations</b>				
Captain's Inn	--	--	10 rooms	--
History and Heritage Center*	--	--	30 rooms	--
<b>Total</b>	--	--	<b>40 rooms</b>	--

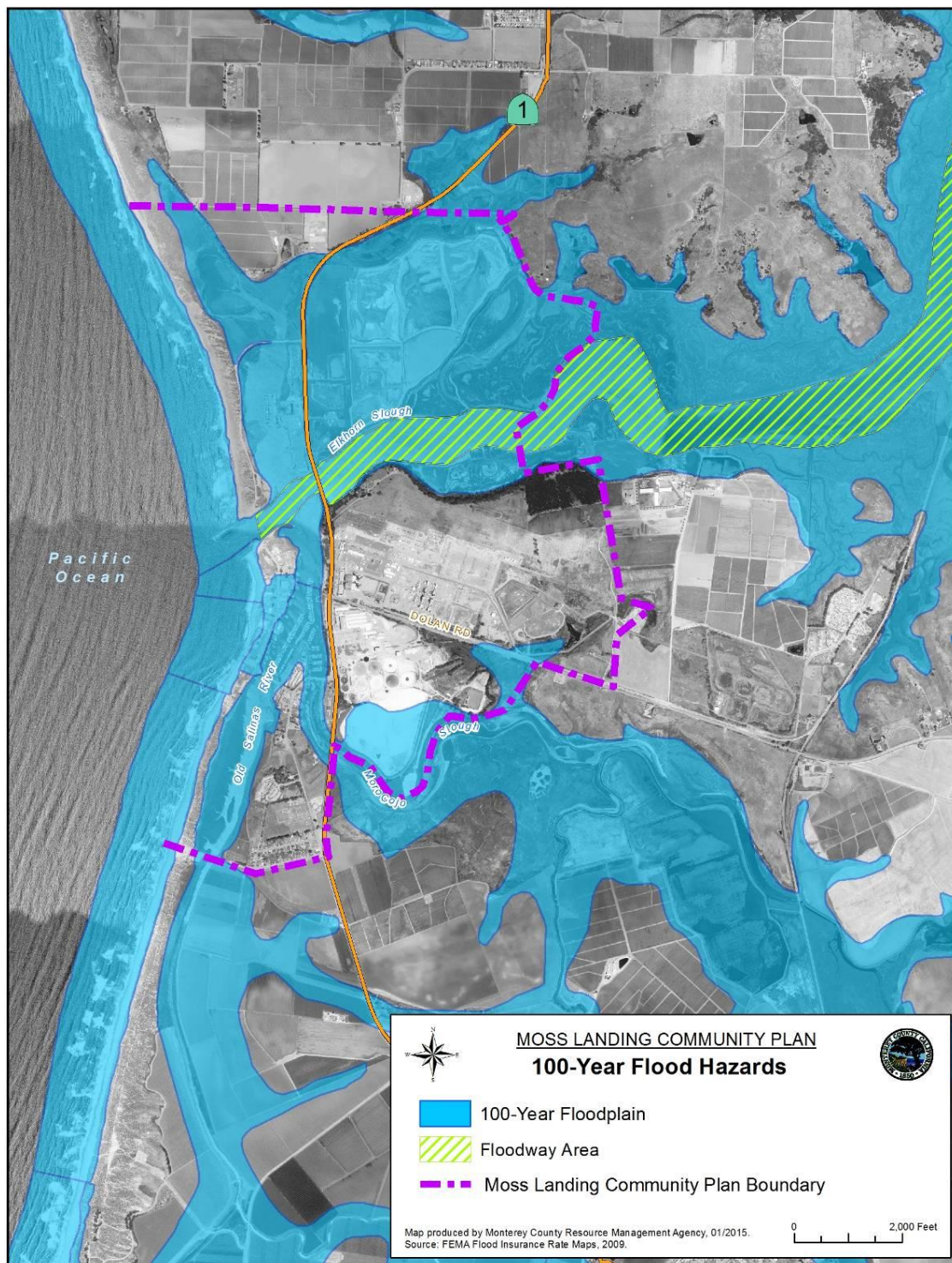
Source: Monterey County RMA – Planning

Note: \*Approved but not yet constructed

## 2.3 Areas Subject to Flooding

According to Government Code 65302 (a), the Land Use Element shall “identify areas covered by the Plan which are subject to flooding and shall be reviewed annually with respect to those areas.” The areas within Moss Landing that are subject to flooding are shown in Figure ML-5. According to the Federal Emergency Management Agency (FEMA), almost all of Moss Landing lies in the 100-year flood hazard zone. The exceptions include the Moss Landing Power Plant, much of the Moss Landing Business Park, and an area north of Potrero Road that includes some residential property and Moss Landing Marine Laboratories.

Figure ML-5: 100-Year Flood Hazards



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## 2.4 Land Use Designations and Diagram

Thirteen land use designations, one overlay designation, and three Special Treatment Areas have been created for the Moss Landing Community Plan Area. The intended effect of the designations, the location of these designations, and the uses allowed within each, are set forth below. Figure ML-6, Moss Landing Community Plan Land Use Diagram, shows the geographic location of these designations in the community plan area. The boundaries between land uses shown on the Land Use Diagram are intended to be exact in most locations, particularly where land is developed now. In undeveloped or un-subdivided areas, boundaries are approximate.

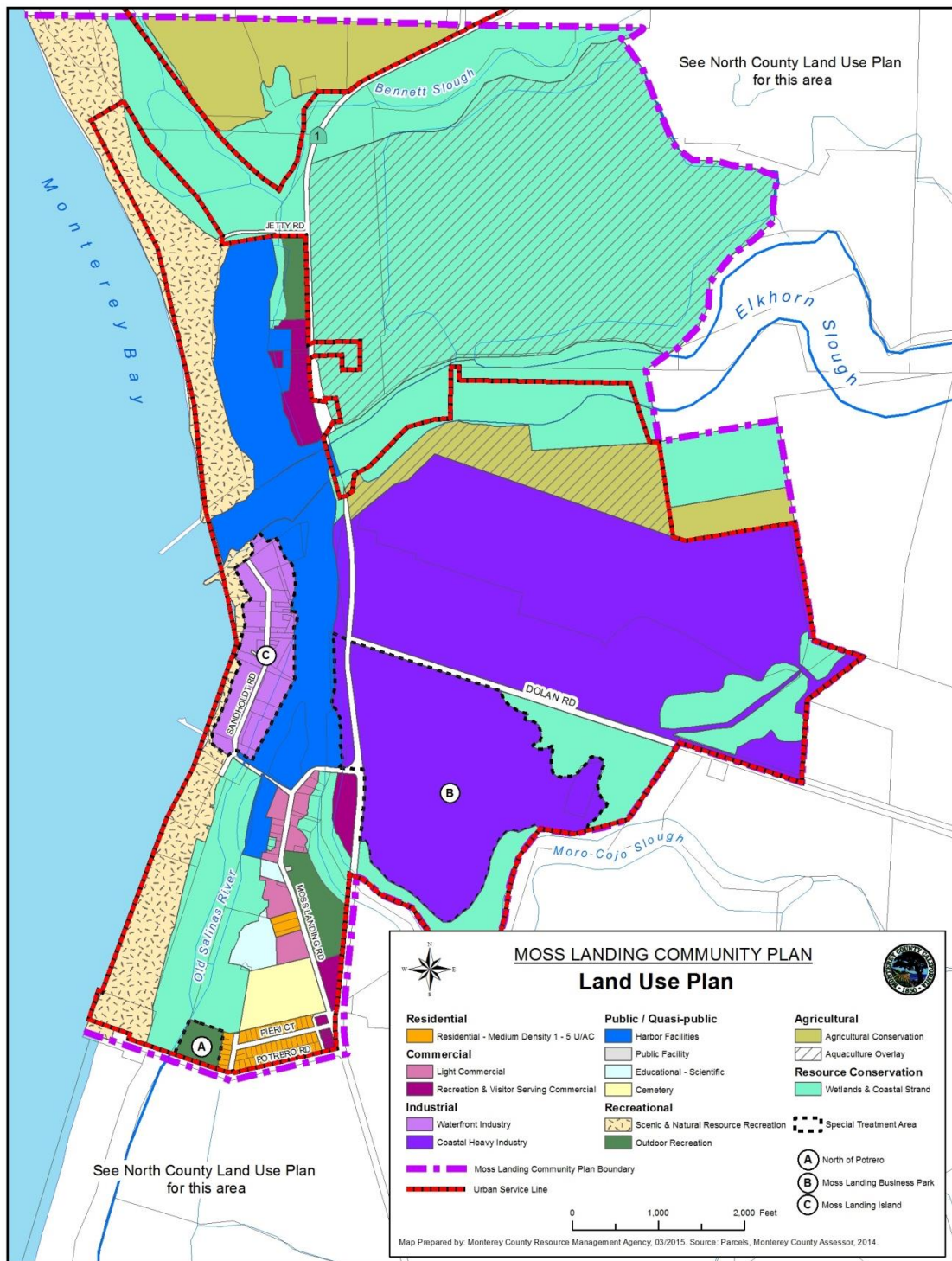
### 2.4.1. RESIDENTIAL

A small residential community exists in Moss Landing. Although a significant market exists for lower-priced rental units, available locations without environmental or topographical constraints are limited. This plan establishes one district for residential development—Medium-Density Residential, which is described below. Residential uses are also allowed in the Light Commercial District, which is described in the next section.

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Figure ML-6: Land Use Diagram



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#### *2.4.1.1. Medium-Density Residential*

The primary purpose of this designation is to accommodate and allow residential use within the Moss Landing Community Plan area. Appropriate uses include: a range of residential uses and housing types, recreational uses, and public and quasi-public uses that are incidental and subordinate to the residential use and character of the area. The extent of use of land for this designation shall be limited to building coverage of 35 percent of the subject property.

The maximum density allowed in the Medium-Density Residential designation is five (5) units per gross acre; the minimum density is one (1) unit per gross acre. Medium-density residential use is shown for the developed residential area on Potrero Road and for an area on Moss Landing Road north of the cemetery.

#### **2.4.2. COMMERCIAL**

##### *2.4.2.1. Background*

This plan establishes two districts for commercial use—Light Commercial and Recreation and Visitor Serving Commercial, both of which are described below.

##### *2.4.2.2. Light Commercial*

The primary purpose of this designation is to accommodate and allow a broad range of light commercial uses within the Moss Landing Community Plan area. Appropriate uses include: stores, shops, restaurants, theatres, service stations, and general office uses suitable for the convenience of the community and its visitors. This designation also allows visitor accommodations, such as hotels and motels. This designation also accommodates new residential uses located above the ground floor, as well as existing residential uses on any level. Finally, small-scale desalination facilities that produce water for on-site use only are allowed.

The extent of use of land for this designation shall be limited to building coverage of 50 percent of the subject property. The maximum use intensity allowed in the Light Commercial designation is a floor area ratio of 1.0. Existing residential uses in

this district are allowed at any density; new second-story residential units shall be allowed at a density of up to four (4) dwelling units per gross acre.

Light Commercial uses are shown on the Plan map on both sides of Moss Landing Road. This designation provides the opportunity to combine commercial and residential uses. Antique shops and historical buildings such as the Moss Landing Post Office and the Pacific Coast Steamship Company (now the Captain's Inn), lend a special character to this area and should be preserved and upgraded. Opportunities for providing a motel, a small neighborhood grocery store and low-cost rental housing units exist on undeveloped or underdeveloped parcels in this area. Appropriate design are important as a means of providing relief from "strip" development that can be an aesthetic nuisance to the community.

#### *2.4.2.3. Recreation and Visitor-Serving Commercial*

The primary purpose of this designation is to accommodate and allow a broad range of recreation and visitor serving uses within the Moss Landing Community Plan area. Allowed uses include: restaurants, hotels, motels, youth hostels, service stations and antique shops. In addition, small-scale desalination facilities that produce water for on-site use only are allowed.

The Plan designates four areas for visitor-serving commercial uses—one in the North Harbor area, one in the South Harbor Area, one in the Village Center, and one in the Heights (see the “North Potrero Special Treatment Area”—Section 2.4.8.2 below—for an expanded description of allowed uses and development considerations for this area).

- In the North Harbor, visitor-serving commercial uses are shown west of State Route 1 and south of Jetty Road. This area contains existing commercial and harbor uses and could include additional commercial uses such as a restaurant and/or visitor accommodations.

- In the South Harbor area, one undeveloped visitor-serving commercial area is shown immediately west of State Route 1. This area has limited road access but nonetheless could serve bicycle and pedestrian traffic using the Monterey Bay Marine Sanctuary Scenic Trail.
- In the Village Center, one visitor-serving commercial area is shown immediately west of State Route 1, which is the current location of two restaurants and a produce stand.
- In the Heights, the area at end of Moss Landing Road includes a variety of existing shops and restaurants west of Moss Landing Road. Across the street, in the wedge of land formed between State Route 1 and Moss Landing Road, the Moss Landing History and Heritage Center is under development. When completed, this facility will contain a 30-room hotel, commercial retail space, and an 80-seat restaurant.

The extent of use of land for this designation shall be limited to building coverage of 50 percent of the subject property. The maximum use intensity allowed in the Recreation and Visitor-Serving Commercial designation is a floor area ratio of 1.0.

### 2.4.3. INDUSTRY

#### 2.4.3.1. *Background*

This plan establishes two districts for industrial uses—Waterfront Industry and Coastal Heavy Industry. Coastal dependent development is given priority by the Coastal Act over other land uses on or near the shoreline (CA §30255). In addition, the Coastal Act encourages local jurisdictions to locate or expand coastal-dependent industrial facilities within existing sites and to permit reasonable long-term growth where consistent with the Coastal Act (CA §30260).

There are two energy-related facilities within the Moss Landing Land Use Plan boundary designated as heavy industry—the Moss Landing Power Plant and Moss Landing Switch Yard. These two facilities were formerly one facility owned and operated by Pacific

Gas and Electric Company (PG&E). The former facility was divided to facilitate the California state-mandated deregulation of the energy industry, which required the divestiture of a percentage of the utility owned power generation.

Moss Landing Power Plant is an energy generation facility that is bounded by Moss Landing Harbor to the west, Moss Landing Switch Yard to the north, agricultural land to the east and Dolan Road to the south. The facility consists of four energy generation units with a total capacity of 2,529 net megawatts. The facility burns natural gas, which is delivered by PG&E via underground pipelines. Moss Landing Power Plant requires sea water, drawn from two intake areas in Moss Landing Harbor, for cooling. The cooling water is returned to the ocean via a single discharge system that runs under the harbor and "Island" out into Monterey Bay. The facility no longer uses a cooling water discharge system that extended north into Elkhorn Slough. The marine terminal and fuel oil pipeline have been in disuse since the power plant was converted from fuel oil to natural gas in the 1990s. The primary access for the Moss Landing Power Plant is located on Dolan Road. Currently, limited access is allowed onto State Route 1 for north bound only traffic. Emergency services access is allowed for all driveways.

Moss Landing Switch Yard is the facility that connects the power plant with the regional and interstate power distribution system. Moss Landing Switch Yard is bounded on the south by Moss Landing Power Plant and on all other sides by agriculturally zoned land. Entry to and exit from the facility is located on Dolan Road.

#### 2.4.3.2. *Waterfront Industry*

The primary purpose of this designation is to maintain a strong commercial fishing base and other maritime activities in the Moss Landing neighborhood called: "The Island." (see "*The Island Special Treatment Area*"—Section 2.4.8.1 below—for an expanded description of allowed uses and development considerations for the Island). Allowed uses include:

- Commercial fishing industries including, but not limited to, canneries and fish processing companies, boat storage and repair facilities, marine supply stores, and other related facilities (i.e., fueling stations, private launching ramps, boat sales businesses). Maritime activities include, but are not limited to, commercial and recreational boating uses such as fishing, marine fabrication, repair, engineering, and processing.
- Marine research, engineering, and education include, but are not limited to, facilities that supply laboratory space, warehouse, offices, shops, and offloading facilities.
- Aquaculture, includes, but is not limited to, offices, laboratories, growing tanks and processing equipment.
- Small-scale desalination facilities that produce water for onsite use only.
- Restaurant and small-scale eating establishments.
- Existing residential uses.
- Commercial support facilities.

The extent of use of land for this designation shall be limited to building coverage of 50 percent of the subject property. The maximum use intensity allowed in the Waterfront Industry designation is a floor area ratio of 1.0.

#### 2.4.3.3. *Coastal Heavy Industry*

The primary purpose of this designation is to accommodate and allow heavy industrial uses within the Moss Landing Community Plan area that are coastal dependent and/or coastal related. Appropriate uses include but are not limited to: regional power generation, heavy industrial uses, commercial fishing, aquaculture, small- and large-scale desalination, activities that use seawater in their production process, and activities that are otherwise dependent on or related to the coast. Other non-coastal-dependent or non-coastal-related uses may be allowed as part of a special treatment area (see the “Moss Landing Business Park

*Special Treatment Area"—Section 2.4.8.3 below—for an expanded description of allowed uses and development considerations for the Moss Landing Business Park).*

Consistent with Coastal Act §30260, which encourages local jurisdictions to locate or expand coastal-dependent industrial facilities within existing sites, the expansion and redevelopment of uses at the Moss Landing Power Plant, Moss Landing Switch Yard and/or Moss Landing Business Park is expected.

The extent of use of land for this designation shall be limited to building coverage of 50 percent of the subject property. The maximum use intensity allowed in the Coastal Heavy Industry designation is a floor area ratio of 1.0.

#### 2.4.4. PUBLIC/QUASI-PUBLIC

There are four public/quasi public uses anticipated by this plan: Harbor Facilities, Public Facility, Education/Scientific, and Cemetery. Each of these designations is described below.

##### 2.4.4.1. Harbor Facilities

The primary purpose of this designation is to accommodate and allow harbor uses within the Moss Landing Community Plan area. In addition to harbor property owned by the District, the District leases the Moro Cojo Slough portion of the harbor for boat berths. Appropriate harbor uses include: docks, fueling facilities, offices, yacht clubs, picnic areas, recreational vehicle parks, dredge re-handling areas, potable water systems to supply docked boats, residential use of docked boats, water systems, marine research, education, maritime activities, harbor related commercial activities, and ancillary uses. This designation applies to the harbor area, the Moss Landing Harbor District office area, land south of the Sandholdt Bridge, and land in the North Harbor. Facilities in the Moss Landing Harbor District office area include the harbor office, a parking lot, restrooms, storage, showers, laundry facilities, recreational vehicle park, dock space, staging areas, a harbor maintenance facility, charter service providers, and eating facilities. Public facilities in the North Harbor include a boat

launching ramp, additional dry storage areas, and restroom facilities for non-yacht club members. Public facilities south of Sandholdt Bridge currently include dry storage, but this area could include future launching of small non-motorized craft and other harbor uses.

#### *2.4.4.2. Public Facility*

The primary purpose of this designation is to accommodate a range of public uses including: sewer and water pump stations and administrative, management, and maintenance facilities. One small parcel located on Moss Landing Road has been given this designation.

#### *2.4.4.3. Education/Scientific*

The primary purpose of this designation is to accommodate and allow education and scientific uses within the Moss Landing Community Plan area. Appropriate uses include: educational facilities, marine laboratories, small-scale desalination facilities for on-site use only, and ancillary uses. Two facilities given this designation are the Moss Landing Marine Lab campus and the school district office building on Moss Landing Road.

#### *2.4.4.4. Cemetery*

The primary purpose of this designation is to accommodate and allow cemetery uses within the Moss Landing Community Plan area. Appropriate uses include: cemeteries and ancillary uses. The Moss Landing Cemetery is shown on the Plan map on Moss Landing Road.

### **2.4.5. RECREATION**

#### *2.4.5.1. Scenic and Natural Resource Recreation*

The primary purpose of this designation is to accommodate and allow scenic and natural resource recreation uses within the Moss Landing Community Plan area. Such uses must be low-intensity recreational and educational uses that are compatible with the natural resources of the area and require a minimum level of development, accommodate basic user needs, and necessitate

minimal alteration of the natural environment. Appropriate uses include: general beach use, surfing, pedestrian trails, hiking, fishing, picnicking, nature studies, horseback riding, and ancillary facilities. The only ancillary facilities contemplated are improved parking and restrooms at Moss Landing and Salinas River State Beach and at fish cleaning facilities at Moss Landing State Beach.

#### *2.4.5.2. Outdoor Recreation*

The primary purpose of this designation is to accommodate and allow outdoor recreation uses within the Moss Landing Community Plan area. Appropriate uses include: moderate-intensity recreational use with accompanying facilities compatible with the recreational and natural resources of the site. These include tent and recreation vehicle campgrounds, interpretive/visitor centers, viewing platforms, improved restrooms, non-motorized boat access, fish cleaning facilities, and other low-intensity uses. In addition, all uses permitted in the Scenic and Natural Resource Recreation category are also allowed here.

### **2.4.6. AGRICULTURE**

#### *2.4.6.1. Agricultural Conservation*

The primary purpose of this designation is to accommodate and allow agricultural uses within the Moss Landing Community Plan area. Allowed uses include: agriculture, agriculture-related uses, and housing at two units per parcel that is ancillary to the agricultural use on the less agriculturally viable areas of the parcel. A minimum parcel size of 40 acres is required for subdivision.

Agricultural Conservation areas designated on the map are lands north of Bennett Slough and areas between Elkhorn Slough and the Moss Landing Power Plant property. These areas should be protected against development to maintain consistency with the agricultural policies of the North County Land Use Plan, Section 2.6.

#### *2.4.6.2. Aquaculture Overlay*

The primary purpose of this designation is to accommodate and allow aquaculture uses within the Moss Landing Community Plan



area. This overlay designation is used in combination with the Wetland and Coastal Strand and Agricultural Conservation designations. Additionally allowed uses for this overlay include: the culture and husbandry of aquatic organisms, including but not limited to, fish, shellfish, mollusks, crustaceans, kelp, and algae. Allowed aquaculture facilities include low-intensity uses such as ponds or basins, piers, walkways, or minor storage facilities for tools. Aquaculture processing buildings are not allowed in this overlay area, but instead are to be located in industrial areas. Reasonable growth of aquaculture operations, with appropriate mitigation to prevent disturbance of marsh and Clapper Rail habitat, is compatible with the underlying designations of this area. Aquaculture is an allowed use in areas adjacent to Elkhorn Slough and Bennett Slough (see Figure ML-6, Land Use Diagram, for specific locations).

#### 2.4.7. RESOURCE CONSERVATION

##### 2.4.7.1. *Wetland and Coastal Strand*

The primary purpose of this designation is to protect and conserve wetland and coastal strand resources within the Moss Landing Community Plan area. Allowed uses include very low intensity uses and supporting facilities compatible with protection of the resource, including low-intensity recreation, education and research. In specially designated areas, aquaculture is also allowed (see Section 2.4.6.2, Aquaculture Overlay, above). This designation is used in various parts of the planning area, including Bennett Slough, Elkhorn Slough, Moro Cojo Slough, and the Old Salinas River, and in wetland areas immediately east of the heavy industrial uses along Dolan Road.

#### 2.4.8. SPECIAL TREATMENT AREA OVERLAY

The "Special Treatment Area" overlay designation is intended to facilitate a comprehensive planned approach towards developing areas that are intended for intense levels of development or that require special consideration due to their proximity to unique or valuable natural resources.

#### 2.4.8.1. *The Island Special Treatment Area*

The Island Special Treatment Area is located on the westernmost spit of land that extends south from the mouth of Moss Landing Harbor to approximately the Sandholdt Bridge. The intent of this Special Treatment Area is to accommodate growth in marine research, engineering, and education, in a manner that compliments, maintains, and strengthens Moss Landing's traditional harbor activities, commercial fishing base, and maritime industries.

This overlay designation is used in combination with the "Waterfront Industry" designation, and for a full description of allowed uses one should refer to Section 2.4.3.2 above. Uses allowed in the "Waterfront Industry" designation are subject to the following caveats:

- Aquaculture-related uses are encouraged that emphasize the development of aquaculture concepts that can be exported to less physically constrained locations.
- A full-service restaurant is allowed on the Island, but this use is limited to one establishment to ensure that such uses do not compete with harbor support services. Other small-scale commercial establishments (e.g. fishing and boating supplies and coffee huts) that support the commercial fishing industry are also allowed.
- New residential uses will not be allowed. Existing residential uses are allowed to continue.
- Shared parking arrangements and parking reductions may be allowed to provide site design flexibility, provided the feasibility of, and justification for, such arrangements are demonstrated in a technical report prepared by a qualified transportation planner or engineer, and provided such arrangements do not negatively affect public access.

#### *2.4.8.2. North Potrero Special Treatment Area*

The North Potrero Special Treatment Area is located on the north side of Potrero Road bordering the east bank of the Old Salinas River. This overlay designation is used in combination with the Outdoor Recreation designation. Special consideration is appropriate in this location to facilitate the development of a habitat mitigation site that may be used by the Moss Landing Harbor District (the owner of the site) to mitigate for the possible loss of habitat that may accompany new development in the North Harbor Neighborhood.

#### *2.4.8.3. Moss Landing Business Park Special Treatment Area*

The Moss Landing Business Park Special Treatment Area is located east of State Route 1 and south of Dolan Road. This Special Treatment Area designation is intended to provide a comprehensive approach to redeveloping this old industrial site with a mix of new coastal-dependent and coastal-related industrial and commercial uses, including commercial uses. Development of the site requires the approval of a comprehensive General Development Plan that describes proposed circulation improvements and their location, categories of proposed land uses and their location, and an estimate of potential development intensity for each proposed use. The General Development Plan should also address the coastal dependent/related nature of proposed uses (including the use of seawater in industrial operations), potential land use conflicts between different categories of use, and the protection of unique natural resources on and around the site. Development of industrial operations that can reuse waste heat or other effluent streams from the Moss Landing Power Plant, or that utilize coastal resources, as part of their processes is encouraged; however, the County recognizes that such a large site needs more flexibility to be economically viable through changing economic cycles. Policies that address the Moss Landing Business Park are included below.

The Moss Landing Business Park has existing infrastructure including a sea water intake facility, located on the Harbor District property, and a sea water return via a single discharge system that runs under the harbor, with an easement from the Harbor District, and

through the “Island” out into Monterey Bay. Vehicular entry to and exit from the facility is currently located on Dolan Road. Policy that addresses the sea water intake facility at the Moss Landing Business Park is included in Chapter 4.

#### 2.4.9. URBAN SERVICE LINE

Figure ML-6, Land Use Diagram, includes an urban service line that demarks the area within which new public sewer services may be provided, consistent with the *North County Land Use Plan*, Policy 3.2.1.2.

## 2.5 Commercial Fishing and Recreational Boating Facilities

#### 2.5.1. BACKGROUND

Moss Landing is perhaps best known as a commercial fishing port and home port for research vessels operated by the Monterey Bay Aquarium Research Institute and Moss Landing Marine Laboratories. Moss Landing is also a popular tourist destination, where people come for nature and whale-watching tours, sport fishing charters, and kayaking access into the Elkhorn Slough. Moss Landing Harbor began operations in 1947 and is operated by the Moss Landing Harbor District, which was formed pursuant to the Federal Harbors and Navigation Code and deeded its lands by the State Lands Commission.

In accordance with California Coastal Act § 30519, the authority to issue coastal development permits for Moss Landing Harbor is divided between two jurisdictions: the California Coastal Commission, which retains “original jurisdiction” to issue permits for development proposed or undertaken on any tidelands, submerged lands, or public trust lands, and the County of Monterey, which issues permits for development on all other lands that are not retained by the California Coastal Commission under its original jurisdiction.

California Coastal Act § 30519 would allow Monterey County to obtain the jurisdiction to issue permits for the submerged lands and water of the Moss Landing Harbor District by including in its certified local coastal program (of which this Moss Landing Community Plan is a part) specific development plans for the Moss Landing Harbor District. In consultation with the Moss Landing Harbor District, however, Monterey County has opted not to obtain this jurisdiction.

Accordingly, the only plans and policies that are included in this Moss Landing Community Plan are ones that have a bearing on development that is proposed or undertaken on lands within Monterey County's jurisdiction and not on lands under the California Coastal Commission's original jurisdiction. Nothing in this plan should be construed as having force or effect on lands that remain within the California Coastal Commission's original jurisdiction.

While the development and use of harbor waters or submerged lands remain within the purview of the California Coastal Commission, they nonetheless remain an important consideration for the Moss Landing Community. The California Coastal Act contains provisions designed to protect California's harbors and fishing industry. According to Coastal Act §30234, "facilities serving the commercial fishing and recreational boating industries shall be protected and, where feasible, upgraded." However, Coastal Act §30233 is specific concerning conditions under which the development or expansion of harbors can occur when it states:

*"(a) The diking, filling, or dredging of open coastal waters, wetlands, estuaries, and lakes shall be permitted in accordance with other applicable provisions of this division, where there is no feasible less environmentally damaging alternative, and where feasible mitigation measures have been provided to minimize adverse environmental effects, and shall be limited to the following: (1) New or expanded port, energy, and coastal-dependent industrial facilities, including commercial fishing facilities. (2) Maintaining existing, or restoring previously dredged, depths in existing navigational*

*channels, turning basins, vessel berthing and mooring areas, and boat launching ramps. (3) In open coastal waters, other than wetlands, including streams, estuaries, and lakes, new or expanded boating facilities and the placement of structural pilings for public recreational piers that provide public access and recreational opportunities." (CA §30233 a1 through a3)*

Thus, according to Coastal Act §30233 and §30234, the legislative intent is to allow reasonable expansion of commercial fishing and recreational boating facilities consistent with maximum preservation of sensitive natural resource areas and wetland habitats.

#### 2.5.2. MOSS LANDING HARBOR DISTRICT MASTER PLAN

The Moss Landing Harbor encompasses approximately 85 acres, not including the submerged lands of the harbor itself, and maintains 610 boat slips. The Moss Landing Harbor District is the largest special district in Monterey County and is governed by a five-member board. Designated as a year-round port of safe refuge, Moss Landing Harbor provides safe, reliable refuge and marine services to seafarers from around the world.

For the entire Moss Landing Harbor, demand for commercial and recreational boat berths and related facilities far exceeds the available supply in the existing harbor area. Efforts to make optimal year-round use of available berthing and support facilities particularly in the South Harbor are constrained by peaks created by the cyclical nature of the fishing industry upon which the planning process can have little effect.

Nonetheless, some of the physical constraints on maximizing the use of existing facilities can be addressed by land use planning and harbor management measures. In the South Harbor for example, the ability to intensify maritime activities will be considerably improved when bulkheading work along the western shoreline of the south harbor is completed. Similarly, optimal processing of fish catches is limited by the lack of adequate unloading and work docks and the capacity of some fish handling

facilities. When dredging work is completed, fish processing capabilities of certain docks will increase. The limited supply of dry storage areas and underutilization of other areas that could be used for dry storage is a further constraint on efficient use of existing facilities.

Another problem constraining efficient use of available resources involves utilization of boat berthing space and slips by inactive or unseaworthy vessels. This limits potential for future use of space by vessels on the waiting list for berths in the South Harbor.

Other constraints in the South Harbor include:

- Lack of currently available boat launching ramps or hoists for sport fishing and recreational boats.
- Lack of currently available boat fueling facilities.
- Competition between commercial fishing industry and sport fishing/recreational boating for harbor berths and facilities.
- Lack of currently available parking facilities, traffic conflicts and congestion on "the Island".

The Harbor District parcel south of Sandholdt Road has opportunities to provide public access in small un-motorized craft to the river channel and sloughs. Future improvements could include: docks for small vessels and facilities to launch small boats. In addition, other improvements could include picnic facilities, pedestrian connections, and other improvements to tie this location into the downtown, integrating the waterfront into the Moss Landing Community.

**Constraints in the North Harbor include bank erosion, which has prevented maximum utilization of this area for harbor-related purposes. Expansion is limited ultimately by basin dimensions. However, when retaining walls are developed and dredging is completed along the shoreline, additional slips or other harbor support uses may be possible.**

### 2.5.3. HARBOR DREDGING

The Moss Landing Harbor District conducts periodic dredging within the harbor under a permit issued by the Army Corps of Engineers and consistent with the Memorandum of Agreement between the Monterey Bay National Marine Sanctuary and various federal, state, regional, and local agencies governing water quality management in the Monterey Bay (NOS Agreement Code: MOA-2006-075/7271). In addition, the *Monterey Bay National Marine Sanctuary Final Management Plan* sets forth the "Harbors and Dredge Disposal Action Plan," which identifies four authorized disposal sites for dredging deposits from Moss Landing Harbor. The County of Monterey is not a party to the Monterey Bay National Marine Sanctuary's Memorandum of Agreement and plays no regulatory role with regard to dredging in Moss Landing Harbor.

The Moss Landing Harbor District is in the final stages of a process to secure a permit for the 20-year Dredged Material Management Plan.

## 2.6 Supplemental Land Use Policies

The following policies supplement the more general coastal land use policies contained in the *North County Land Use Plan*, and for a complete understanding of the policies that govern development in the Moss Landing Community Area, one must refer also to that document.

### 2.6.1. GENERAL POLICIES

- NCLUP-ML-2.1     Infrastructure improvements necessary to accommodate new development shall not burden the exiting community and shall be funded by those development(s) at the time of construction.



## 2.6.2. COMMERCIAL USES

NCLUP-ML-2.2 Light Commercial and Recreation and Visitor-Serving Commercial uses shall be developed in the Moss Landing Community Plan area in accordance with the following provisions.

- a. Permit a total of up to 150 hotel/motel units counting from the date of certification of the original 1982 Land Use Plan based on available land and wastewater collection system capacity. These shall generally be provided by several smaller establishments not exceeding 30 units each.
- b. Encourage the expansion and improvement of existing recreation and visitor-serving facilities.
- c. Design and locate new commercial visitor-serving facilities to minimize traffic and natural resource impacts.
- d. Encourage the development of low and moderate-cost commercial recreation and visitor-serving facilities in preference to high cost facilities.
- e. Encourage mixed use commercial development that includes housing units.
- f. Encourage development of commercial uses providing necessary service to coastal dependent industries such as commercial fishing, aquaculture, and energy production, and commercial facilities providing goods and services related to the use of local recreational opportunities.

### 2.6.3. INDUSTRIAL USES

- NCLUP-ML-2.3. The County of Monterey may provide economic development incentives when available to coastal-dependent and related industrial uses that expand within existing industrial sites and/or that reuse by-products such as waste heat, water, exhaust gas, or other resources from adjacent industrial processes.
- NCLUP-ML-2.4. The County of Monterey shall encourage the efficient use of existing industrial areas by permitting new or expanded coastal-dependent industrial facilities, consistent with Coastal Act §30260 and provided:
- a. Alternative locations are infeasible or more environmentally damaging;
  - b. To do otherwise would adversely affect the public welfare; and
  - c. Adverse environmental effects are mitigated to the maximum extent feasible.
- NCLUP-ML-2.5. The County of Monterey shall require the submittal and approval of a General Development Plan prior to considering future expansion, improvement, or other development of heavy industrial facilities within the Moss Landing Community Plan. This policy shall not be construed to require disclosure in the General Development Plans of trade secrets, proprietary or confidential information, but only location of buildings and other land use matters necessary for planning purposes.
- NCLUP-ML-2.6. The County of Monterey shall limit development west of State Route 1 and east of the Moss Landing Harbor to improvements or

modifications that are compatible with the road right-of-way and visual character of the community.

#### 2.6.4. MOSS LANDING POWER PLANT

NCLUP-ML-2.7. The County of Monterey shall work with the California Public Utilities Commission to ensure that any future development of an electrical transmission line from the Moss Landing Power Plant across Elkhorn Slough is compatible with the research and educational use of the Elkhorn Slough National Estuarine Research Reserve and permitted only if:

- a. Alternative locations are infeasible or more environmentally damaging;
- b. To do otherwise would adversely affect the public welfare; and
- c. Adverse environmental effects are mitigated to the maximum extent feasible.

NCLUP-ML-2.8. The County of Monterey shall not permit construction of new cooling water discharge outfalls in Elkhorn Slough. If the existing discharge rate is to be increased, environmental studies should be undertaken to determine the effect.

#### 2.6.5. MOSS LANDING BUSINESS PARK SPECIAL TREATMENT AREA

NCLUP-ML-2.9. Development in the Moss Landing Business Park shall include a pedestrian connection between Moss Landing Business Park and the west side of State Route 1. The pedestrian connection shall be designed to be consistent with adopted design guidelines and to otherwise maintain the visual quality of the community to the extent feasible.

- NCLUP-ML-2.10. Development in the Moss Landing Business Park shall be limited to 190,000 square feet of structure(s) and 25,000 gpd wastewater generation.

#### 2.6.6. MOSS LANDING HARBOR

- NCLUP-ML-2.11. The County of Monterey shall, in consultation with the Moss Landing Harbor District, promote the development of recreation and visitor-serving commercial uses in the North Harbor area and the improvement of public recreational boating facilities.
- NCLUP-ML-2.12. The County of Monterey shall, in consultation with the Moss Landing Harbor District, encourage the use of existing piers for access and recreational purposes when compatible with commercial fishing uses.
- NCLUP-ML-2.13. The County of Monterey shall, in consultation with the Moss Landing Harbor District, encourage the full use of harbor facilities to accommodate maritime activities, commercial fishing, recreational boating, and visitor-serving accommodations—all while protecting environmentally sensitive habitat areas.
- NCLUP-ML-2.14. The County of Monterey shall, in consultation with the Moss Landing Harbor District, promote structural bulkheading, not including rip rap, where necessary to prevent erosion and to maximize use of available shoreline in the Harbor.
- NCLUP-ML-2.15. The County of Monterey, in consultation with the Moss Landing Harbor District and private property owners, shall promote the development of a public parking facility at a location near the northwest end of the Island.

- NCLUP-ML-2.16. Due to the limited capacity of State Route 1, the County of Monterey, in coordination with the Moss Landing Harbor District, shall curtail expansion of Moss Landing Harbor south of Sandholdt Bridge.
- NCLUP-ML-2.17. The County of Monterey, in coordination with the Moss Landing Harbor District, shall ensure that the use of existing land-based facilities that support commercial boating do not jeopardize the protection of public access to the shoreline.
- NCLUP-ML-2.18. New development shall avoid environmental damage to the extent feasible that would otherwise result from construction and deconstruction activities on lands adjacent to Moss Landing Harbor, including pile driving, sheet pile installation, and the physical disturbance of potentially contaminated marine sediments. Where avoidance is not feasible, developments shall implement measures to reduce environmental damage.
- NCLUP-ML-2.19.
- NCLUP-ML-2.20. Optimum use of the existing harbor area should be compatible with conservation of the most sensitive and viable wetlands.
- NCLUP-ML-2.21. If the Moss Landing Harbor District proposes additional berthing facilities, the County of Monterey will participate in evaluating methods to improve tidal flow and sediment transport from the North Harbor as a means of improving capacity of the North Harbor to minimize the need for dredging. One possible method would be expansion of the existing culvert under Jetty Road.
- NCLUP-ML-2.22. When the County of Monterey reviews applications or environmental documents from

the Moss Landing Harbor District to upgrade or develop recreational boating support facilities, the County shall consider methods to conserve sensitive mudflat habitats.

#### 2.6.6 - MOSS LANDING ISLAND SPECIAL TREATMENT AREA

NCLUP-ML-2.23. The County of Monterey shall work with property owners to preserve and maintain all fish handling and processing facilities on the Island.

NCLUP-ML-2.24. Monterey County shall require new development on the Island to provide either on-site parking or a dedicated off-site parking facility. Shared parking may be considered where it can be reserved for the use.

NCLUP-ML-2.25. For any new development project where exterior lights are proposed to be installed along wharfs, piers, docks, approach trestles, or buildings adjacent to or located on wharfs or piers, exterior lighting shall be limited to fully shielded, low voltage, narrow-wavelength band lights that protect marine life, and direct light away from aquatic habitat and the sky.



## 3.0 TRANSPORTATION

### 3.1 Introduction

This section sets forth a circulation diagram and transportation policies for Moss Landing. The discussion includes an analysis of parking, bicycle and pedestrian, public transit, and rail facilities. According to Coastal Act §30254, in situations where transportation facilities are constrained, as they are in Moss Landing, “services to coastal-dependent land use, essential public services and basic industries vital to the economic health of the region, state, or nation, public recreation, commercial recreation, and visitor-serving land uses shall not be precluded by other development.” Additional information related to public access and parking is shown in Figure ML-15 in Chapter 6.0.

### 3.2 Street and Highway Classifications

This section sets forth street and highway classifications for the Moss Landing Community Plan area. Where applicable to a classification, this section provides an overview of issues and constraints and proposed improvements.

#### 3.2.1. STATE HIGHWAY

State Highways are arterial transportation routes belonging to California's highway system that are owned and operated by Caltrans. The primary purpose of the State Highway is to facilitate primarily regional travel between counties and regions of the state. State Highways may vary in size (from rural, two-lane facilities to urban, multi-lane facilities), and access to, and parking along, these facilities is limited where practicable to ensure safe travel at highway speeds.

In Moss Landing, the State Highway classification is assigned to State Route 1, which traverses the planning area in a generally north/south trajectory. State Route 1 runs almost the entire length of coastal California from Mendocino County to Mexico and connects Monterey County to Santa Cruz and San Luis Obispo Counties. As a regional facility, the size and configuration of State Route 1 as it traverses Northern Monterey County and Moss Landing is governed by the policies of the *North County Land Use Plan*, of which the *Moss Landing Community Plan* is a part.

### 3.2.1.1. *Issues and Constraints*

Heavy traffic on State Route 1 makes movement difficult between the industrial areas east of State Route 1 and the village center and waterfront areas west of State Route 1. State Route 1 is the primary access route for Moss Landing and as such is critical for the economic viability for this community.

State Route 1 is part of a Corridor System Management Plan developed by Caltrans that generally extends from Salinas Road to Castroville. The purpose of corridor management is to identify and evaluate intersections or segments of all roadways (including County Roads) that impact the surrounding area to maximize benefits with minimal infrastructure projects.

### 3.2.1.2. *Improvements being Studied*

In response to concerns expressed by community leaders, the County of Monterey is working to develop a corridor-wide improvement plan that addresses problems at three major intersections along State Route 1—at Dolan Road, at Moss Landing Road (north end), and at Moss Landing Road (south end). The County of Monterey is working closely with Caltrans and The Transportation Agency for Monterey County (TAMC) to weigh the costs and benefits of a variety of short- and long-term improvements, including:

- *Grade-Separated Overcrossing.* One idea is to install one or more overcrossings at State Route 1 so that local traffic is not required to enter the highway to cross from the east side to the west side of State Route 1. The most feasible location for such an improvement is at the northern intersection of State Route 1 and Moss Landing Road, and such an improvement could be designed to provide a connection to Dolan Road.
- *Traffic Circles.* Initial work on the installation of one or more traffic circles/roundabouts indicates that there may be insufficient right-of-way to implement this solution at Dolan Road, but this idea may be viable at Moss Landing Road (south end).
- *Consolidation of intersections at Moss Landing Road (south end).* Engineers are studying ways to consolidate traffic at



the southern end of Moss Landing where three local streets intersect with State Route 1. The three streets include: Moss Landing Road, Pieri Court, and Potrero Road.

- *Half Traffic Signal.* Engineers have been investigating the development of a “half signal” at Dolan Road to control northbound traffic so as to allow vehicles waiting to turn left onto State Route 1 an opportunity to enter State Route 1 safely.
- *Right-in, right-out only at Moss Landing Road (north end).* Engineers will also be investigating the idea of limiting traffic movements at this intersection to allow only right turns, either in or out, at Moss Landing Road. This improvement would eliminate conflicting turning movements and traffic delay but would have to be coupled with improvements at Moss Landing Road (south end) and improved signage along State Route 1 to ensure that businesses along Moss Landing Road were not impacted.

At this time, Monterey County has not identified, or expressed preference for, an improvement project that would address the issues addressed above. These and other solutions are being explored as the County of Monterey considers improvements to the State Route 1 corridor that traverses the planning area.

### 3.2.2. COUNTY ROAD

County Roads are minor arterial transportation routes belonging to Monterey County. The primary purpose of the County Road is to facilitate primarily local travel between different parts of the county and provide access to state beaches and inland rural areas from State Route 1. County Roads in this area are two-lane facilities that may include bicycle lanes. On-street parking is allowed in residential areas and in designated pull-out areas along routes providing coastal access. On-street, overnight parking for persons sleeping in their vehicles is prohibited.

In Moss Landing, the County Road classification is assigned to Jetty Road, Dolan Road, and Potrero Road.

#### 3.2.2.1. *Issues and Constraints*

Access to State Route 1 from Dolan Road is constrained by heavy traffic on State Route 1. Motorists making left-hand turning movements—to and from Highway 1—experience extended delays and potential hazards from oncoming State Route 1 traffic. The movement of heavy trucks is especially problematic, as these slower moving vehicles merge with the higher speed traffic of State Route 1. In addition to operational problems, the current intersection design limits access to Moss Landing Business Park. This issue is also discussed above in the section on State Route 1.

#### 3.2.2.2. *Planned Improvements*

The County of Monterey is currently studying improvements at State Route 1 and Dolan Road and at State Route 1 and Moss Landing Road (both north and south ends). One possible long-term improvement that may be explored is the realignment of Dolan Road to connect directly with the north end of Moss Landing Road at State Route 1. Such an improvement would reduce points of conflict on State Route 1 and provide improved access to the Moss Landing Business Park.

#### 3.2.3. MAIN STREET

Main Streets are minor arterial and local transportation routes belonging to Monterey County. The primary purpose of the Main Street is to facilitate multi-modal access to business districts and adjacent State Highways. The Main Street is a two-lane facility that allows on-street parking, bicycle and pedestrian facilities, and bus transit service.

In Moss Landing, this classification is assigned to Moss Landing Road, which provides neighborhood access to Moss Landing's village center and State Route 1. As this facility is improved over time attention should be given to features that support retail activity and community life. Such features should include low speeds, easy parking, and wide sidewalks that encourage pedestrian activity. In Moss Landing, the Main Street classification may also accommodate a section of the Monterey Bay Sanctuary Scenic Trail.

#### 3.2.3.1. *Issues and Constraints*

Moss Landing Road currently consists of a two-lane street with open drainage swales, informal on-street (i.e., parallel) parking, and unrestricted ingress/egress to off-street parking areas. Moss Landing Road may host a segment of the Monterey Bay National Marine Sanctuary Scenic Trail—a regional bicycle and pedestrian facility that traverses the coast from Santa Cruz to Monterey. Currently, the trail has no formal demarcation along Moss Landing Road.

#### 3.2.3.2. *Proposed Improvements*

The County of Monterey proposes to install drainage improvements along Moss Landing Road. The project, which is referred to as the “Moss Landing Road Storm Drain Project,” would install sidewalks, curbs, and gutters along Moss Landing Road from State Route 1 (at the north end of Moss Landing) to approximately the entrance of Moss Landing Marine Laboratories. The improved street would also include two travel lanes and curbside parking. Bike lanes are also an option for Moss Landing Road.

#### 3.2.4. LOCAL STREET

Local Streets are local transportation routes belonging to Monterey County. The primary purpose of the Local Street is to facilitate multi-modal access to individual properties and neighborhoods. The Local Street is a two-lane facility that allows on-street parking and bicycle and pedestrian facilities.

In Moss Landing, the Local Street classification is assigned to Allen Street, Pieri Court, and Laguna Place. As these facilities are improved over time attention should be given to features that support residential life. Such features should include landscaping, narrow travel lanes, low speeds, easy driveway access, and sidewalks that promote pedestrian activity.

#### 3.2.5. LOCAL INDUSTRIAL STREET

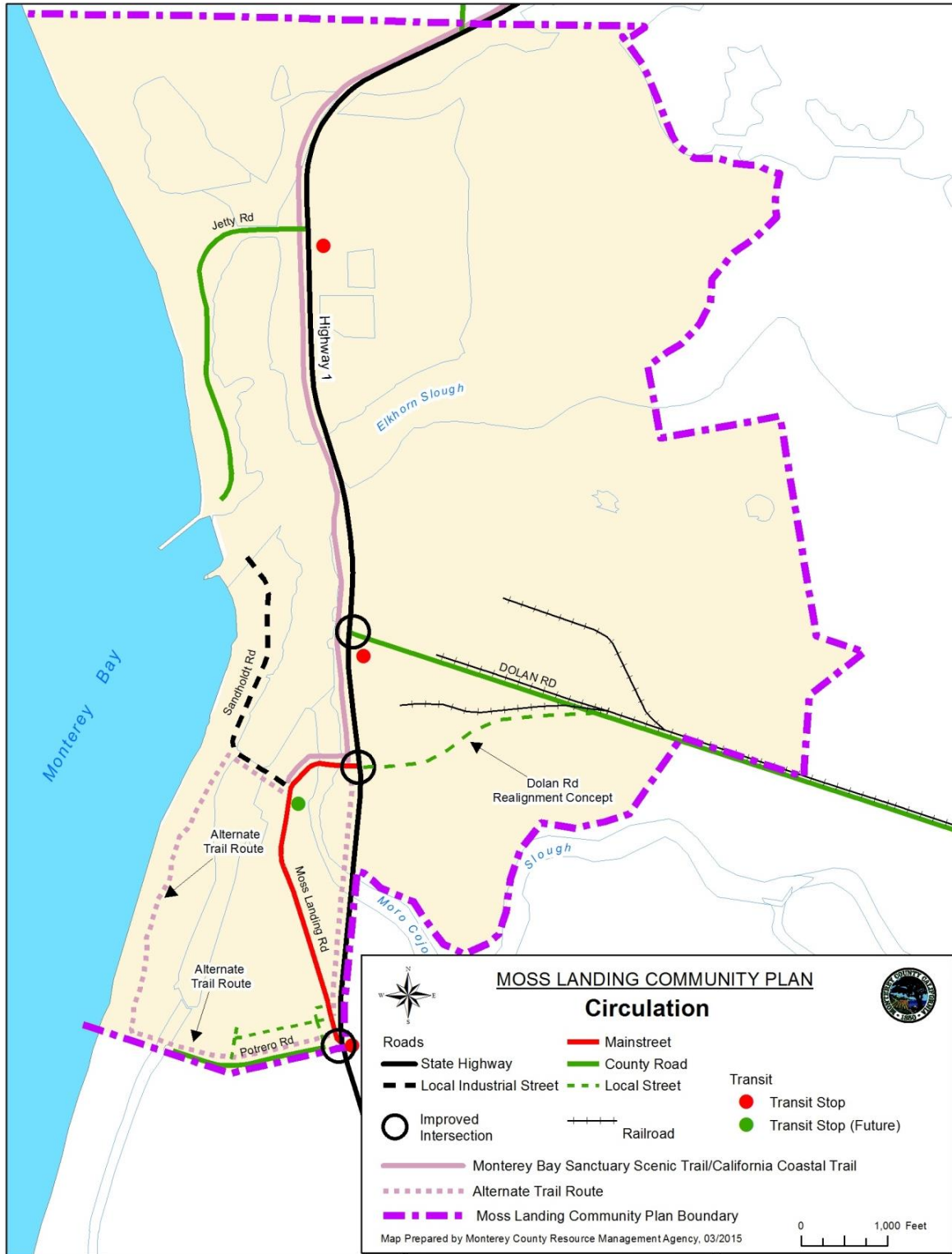
Local Industrial Streets are local transportation routes belonging to Monterey County. The primary purpose of the Local Industrial Street is to facilitate multi-modal access to commercial properties and establishments. The Local Street is a wide two-lane facility designed to handle heavy trucks and trailers that allows on-street parking and bicycle and pedestrian facilities.

In Moss Landing, the Local Industrial Street classification is assigned to Sandholdt Road. As this facility is improved over time attention should be given to features that support access to Moss Landing's marine research facilities and other Island uses by a variety of vehicles, including heavy trucks and trailers. Such features should include wide streets, large turning radii, and easy parking, that support the research, education, and industry located in the area. In Moss Landing, the Local Industrial Street classification may also accommodate a section of the Monterey Bay Sanctuary Scenic Trail (from Moss Landing Road across the Sandholdt Road Bridge to connect with an existing trail along the sand dunes to Potrero Road).

### 3.3 Circulation Diagram

This section sets forth the Circulation Diagram for the *Moss Landing Community Plan* (see Figure ML-9, below).

Figure ML-7: Circulation Diagram



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## 3.4 Pedestrian and Bicycle Facilities

The developed part of Moss Landing is approximately 1.75 square miles in size, and the distance between the Village Center located along Moss Landing Road and the outer limits of development is approximately 0.75 miles. This relatively small size makes walking and biking between neighborhoods a viable transportation option for many. The Moss Landing Community Plan recognizes these opportunities and promotes walking and biking with several new and improved facilities.

### 3.4.1. PLANNED IMPROVEMENTS

The County of Monterey plans the following bike and pedestrian improvements in Moss Landing. Public access improvements to and along the shoreline within the Moss Landing Community Plan area are discussed in Chapter 6.0 below.

#### 3.4.1.1. *Monterey Bay Marine Sanctuary Scenic Trail and California Coastal Trail*

The Transportation Agency for Monterey County (TAMC) is planning improvements to extend the Monterey Bay National Marine Sanctuary Scenic Trail and the California Coastal Trail through Moss Landing. The trail parallels State Route 1 north of Moss Landing Road and follows Moss Landing Road through Moss Landing to Potrero Road, which allows bicycle and pedestrian access between the North Harbor Area and the remainder of Moss Landing without accessing State Route 1. The project includes a dedicated bridge structure across Elkhorn Slough, a separate trail along State Route 1 to Moss Landing Road, and a bikeway and sidewalk along some or all of Moss Landing Road to accommodate the facility.

TAMC is also exploring alternative routes for the trail. One alternative would bypass much of Moss Landing Road and route the trail instead over Sandholdt Road Bridge to connect with an existing trail along the sand dunes to Potrero Road. A second alternative would route the trail along State Route 1 and bypass Moss Landing Road (and/or Sandholdt Road) altogether.

The alignment of the entire route can be seen above in Figure ML-9, Circulation Diagram. Figure ML-10 shows the alignment of a segment of the Monterey Bay Marine Sanctuary Scenic Trail from the State Route 1 Bridge to Moss Landing Road (north end).

#### 3.4.1.2. *Moss Landing Road Improvements*

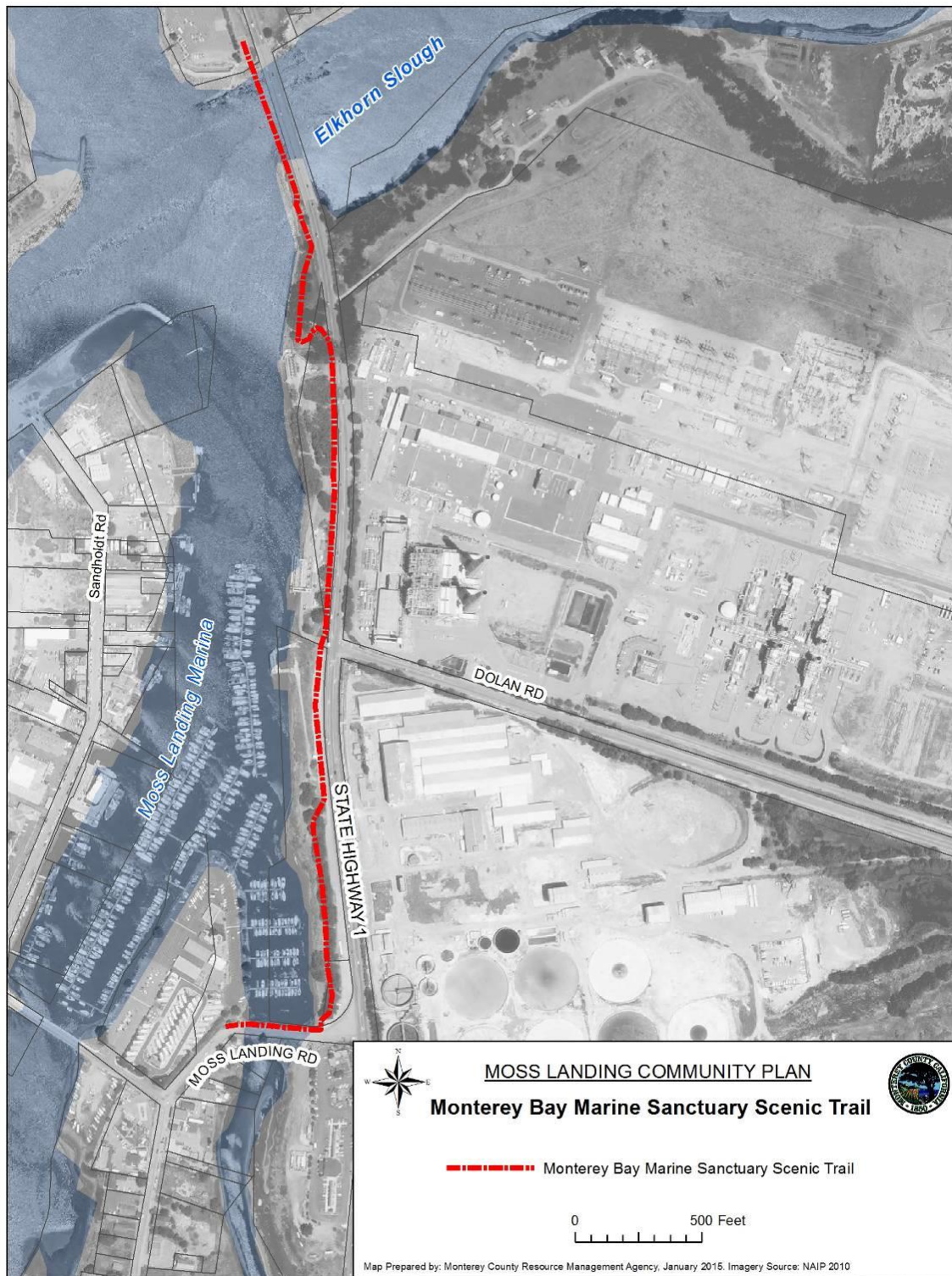
The County of Monterey is planning to improve Moss Landing Road to improve drainage along the facility. The project would install curbs, gutters, sidewalks, parking, and possibly bike lanes (to accommodate the Monterey Bay National Marine Sanctuary Scenic Trail). The basic design concept is to improve drainage and provide formal parking while retaining the essential character of this quaint "village center" area. Further detail on this project is provided in Section 7.0 (Specific Projects) under the discussion on drainage improvements to Moss Landing Road.

#### 3.4.1.3. *Pedestrian Link between State Route 1 and Moss Landing Road*

The County of Monterey shall maintain, and as opportunities arise improve, pedestrian linkage between the commercial area located on State Route 1 south of Moss Landing Road (north end of Moss Landing Road) and the commercial area along Moss Landing Road. Currently the two areas are connected by Moss Landing Road, which crosses Moro Cojo Slough close to the northern end of Moss Landing Road at State Route 1.



Figure ML-8: Monterey Bay Sanctuary Bicycle Trail



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### 3.5 Public Transit

Public transit is provided in the North County by Monterey-Salinas Transit (MST). Public transit stops are located along the State Route 1 corridor near Dolan Road, at Jetty Road and at Potrero Road. Neither the Moss Landing Village Center along Moss Landing Road nor the Moss Landing Island is directly served by public transit.

### 3.6 Rail Service

The Union Pacific Railroad operates a rail branch line that connects the Moss Landing industrial areas east of State Route 1 to the main Coast Rail Line located approximately 1.4 miles to the east. This rail spur allows Union Pacific to provide freight service to the Moss Landing Power Plant and the Moss Landing Business Park.

The County of Monterey will work with TAMC, Union Pacific Railroad, and any regional rail authority that is in existence at the time, to ensure continued freight service to the Moss Landing Business Park and the Moss Landing Power Plant.

### 3.7 Supplemental Transportation Policies

The following policies supplement the more general coastal circulation policies contained in the *North County Land Use Plan*, and for a complete understanding of the policies that govern development in the Moss Landing Community Area, one must refer also to that document.

#### 3.7.1. STREETS AND HIGHWAYS

- NCLUP-ML-3.1. New or expanded visitor-serving commercial facilities in Moss Landing shall provide adequate parking, either on or off site, and safe access, including necessary turning lanes, acceleration lanes, and signing. Wherever possible, access to State Route 1 from commercial facilities should be consolidated. The creation of new direct driveway access onto State Route 1 from new or existing commercial uses should be avoided.
- NCLUP-ML-3.2. The County of Monterey shall plan for a balanced, multimodal transportation network that meets the needs of all users of the streets,

roads, and highways for safe and convenient travel, in a manner that avoid impacts to important natural resources, including Elkhorn Slough and wildlife

- NCLUP-ML-3.3. The County of Monterey shall require all feasible traffic generation reduction measures of any new or expanded industrial facility that would generate significant freight and employee traffic on the segment of State Route 1 between Castroville and Salinas Road.
- NCLUP-ML-3.4. The creation of new direct driveway access onto State Route 1 from either the Moss Landing Power Plant or the Moss Landing Business Park should be avoided. Limited exceptions include:
- a. Egress from Moss Landing Power Plant onto State Route 1 for northbound only traffic, and
  - b. Emergency egress from either site. Major access for each facility should be maintained on Dolan Road.
  - c. Access identified through a comprehensive corridor study as a necessary improvement.
- NCLUP-ML-3.5. The County of Monterey shall work with TAMC to include the set of improvements identified as a result of the 2017 Corridor Study prepared for the Moss Landing Community Plan in the Regional Transportation Improvement Program and the Regional Traffic Impact Fee Program.
- NCLUP-ML-3.6. The County of Monterey shall work with TAMC to include improvements to the State Route 183/State Route 1 intersection in its Regional Transportation Improvement Program and the Regional Traffic Impact Fee Program.
- NCLUP-ML-3.7. The County of Monterey shall work with Cal-Trans to identify shared access opportunities for

the State Route 1 corridor north of the Elkhorn Slough bridge.

### 3.7.2. PEDESTRIAN AND BICYCLE FACILITIES

- NCLUP-ML-3.8. The County of Monterey shall develop a plan and funding strategy for the improvement of Moss Landing Road that includes improved on-street parking and sidewalks, and adding sidewalks along Sandholdt Road. The corridor may also include the Monterey Bay National Marine Sanctuary Scenic Trail.
- NCLUP-ML-3.9. The County of Monterey shall work with property owners and California State Parks to provide beach access in the area immediately south of Sandholdt Bridge that is accessible to persons with disabilities, and in other areas owned by State Parks. This access may be combined with a part of the Monterey Bay National Marine Sanctuary Scenic Trail.
- NCLUP-ML-3.10. The County of Monterey shall require new development on the Island to incorporate pedestrian connections to the beach into site plans and provide other improvements such as picnic tables or benches.

### 3.7.3. PUBLIC TRANSIT

- NCLUP-ML-3.11. The County of Monterey shall work with MST to provide improved bus service to Moss Landing, including the re-routing of MST buses along Moss Landing Road and the construction of new bus stops along that corridor to provide access to the re-routed buses. The re-routing of buses should only be instituted after transportation improvements are constructed that allow safe access to State Route 1 from Moss Landing Road.

### 3.7.4. RAIL SERVICE

- NCLUP-ML-3.12. The County of Monterey shall, in coordination with Union Pacific Railroad, work to retain the

railroad branch line and spurs that serve Moss Landing, along with its necessary supporting facilities. Improvements to this branch line shall include measures to insure rail safety through the wetlands, including: replacement of outmoded bridges, contingency plans for spills, and restoration of wetland within causeways.

- NCLUP-ML-3.13. The County of Monterey shall support and participate in initiatives for regional transportation planning, improved rail service, expanded transit service, demand reduction, and providing signing and other travel instructions that implement the *Moss Landing Community Plan* to the extent that resources allow.

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## 4.0 PUBLIC SERVICES

### 4.1 Introduction

This section sets forth a plan for the provision of public services to Moss Landing.

### 4.2 Wastewater Management Facilities

#### 4.2.1. BACKGROUND

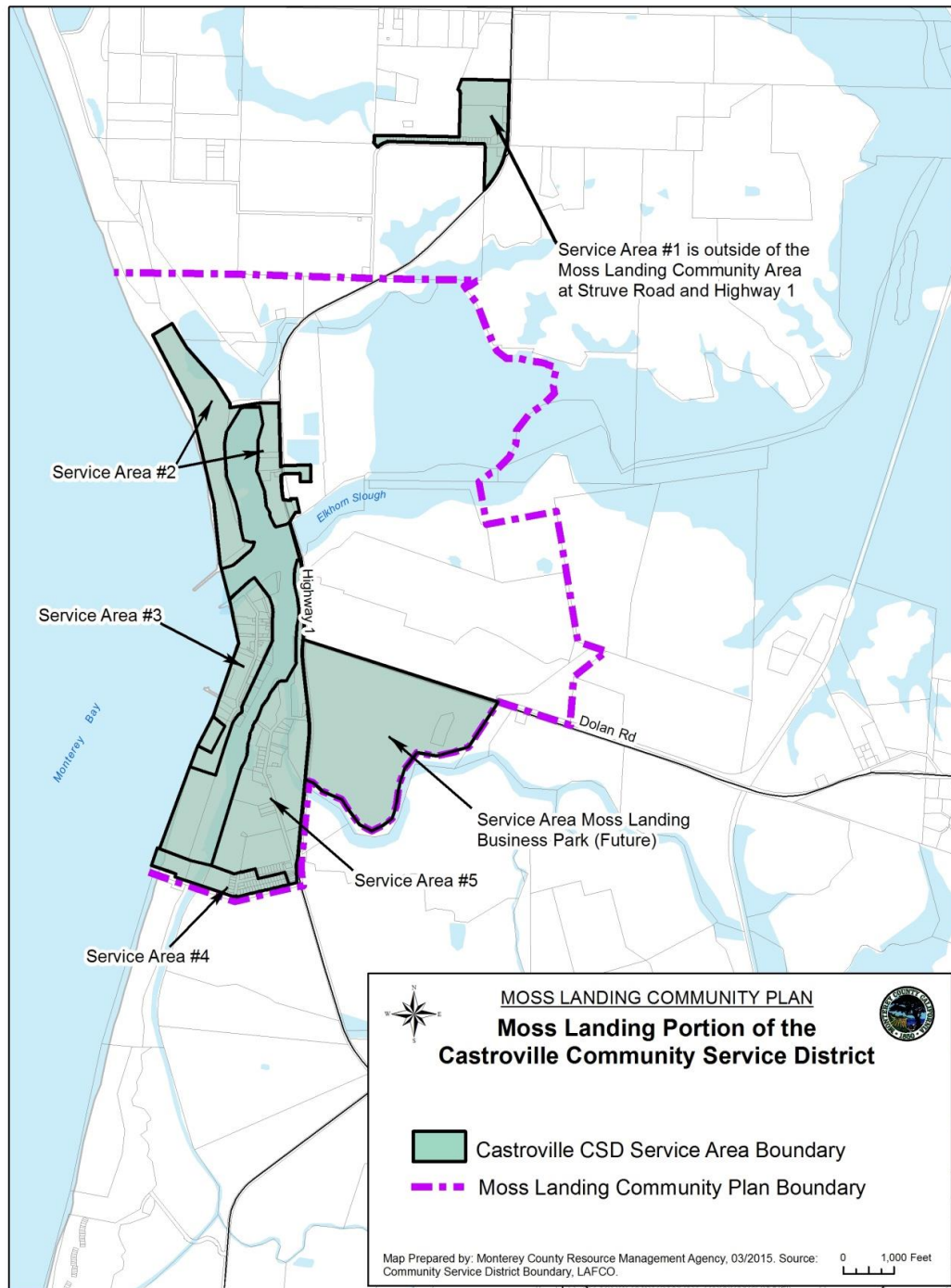
The Moss Landing County Sanitation District (MLCSD) was formed in response to the ban on installation of additional septic systems ordered by Monterey County. The MLCSD provided sewer service to the Struve Road Area, North Harbor, the Island, downtown, and to the residential area known as the Heights until June 2014, when the district was merged with the Castroville Community Services District (CCSD). The Moss Landing Power Plant and Moss Landing Business Park are not currently included in the urban service area and instead dispose of effluent using on-site septic systems.

The transition of the Moss Landing Business Park from a single-use facility to a multiple-use facility suggests that it be placed within the service area boundary and connected to the sewer. While all domestic wastewater would be collected in Moss Landing, aquaculture and fish processing industries would probably continue to discharge their processing wastewater in other manners. Figure ML-11 shows the current CCSD service areas that are located in the Moss Landing Community Plan area and an additional site at Struve Road/Highway 1.



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**Figure ML-9: Castroville Community Services District Service Areas**



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#### 4.2.2. CURRENT WASTEWATER TREATMENT CAPACITY ALLOCATION

The CCSD provides sanitary sewer services to the five Moss Landing service areas (four of which are located within the Moss Landing Community Plan planning area) based on a Coastal Commission-certified Sewer Allocation Plan (SAP), which was adopted by the MLCSD in December 1984. The allocation plan was administered by the Moss Landing County Sanitation District as part of its billing process up until June 2014, when the Castroville Community Services District took over. The sewer allocation plan was implemented in tandem with the 1982 *Moss Landing Community Plan* to ensure that the community's sewer treatment capacity, which at the time was limited to approximately 105,000 gallons per day, would be equitably distributed among Moss Landing rate payers. The Plan allocated sewer service to each service area based upon existing land use and expected future growth, including future priority uses.

Since the adoption of original *Moss Landing Community Plan* in 1982, the Monterey Regional Water Pollution Control Agency opened its regional wastewater treatment plant near Marina, providing a greatly expanded sewer treatment capacity to the region, including Moss Landing. As the rationale for the original sewer allocation plan fell away with the opening of the regional wastewater treatment plant in Marina, planners and Moss Landing community members who initiated work on the update of the *Moss Landing Community Plan* in 2008 began an effort to retire the sewer allocation plan.

In January 2009, the Monterey County Board of Supervisors received a report from the Moss Landing Community Plan Update Committee that included a recommendation that Moss Landing “move away from a land use regulatory system that uses a sewer allocation as the primary means of limiting land use and allow land use regulations to control the type and intensity of development” (Recommendation #18). Accordingly, this updated *Moss Landing Community Plan* contains new policies that set a new allocation limit and work with Castroville Community Services District to eliminate the Moss Landing Sewer Allocation Plan.

Table ML-2 shows the original allocation by district and the current usage in each district (2012):

**Table ML-2: Wastewater Treatment Capacity**

District	1982 Allocation	Current Usage
1 – Struve Road	34,250	31,218
2 – North Harbor	10,100	971
3 – The Island	14,000	14,097
4 – The Heights	13,000	3,973
5 – Downtown	33,650	29,471
Total Allocation	105,000	79,730

Source: Moss Landing County Sanitation District, 2012

#### 4.2.3. TREATMENT SYSTEM CAPACITY

According to the Monterey Regional Water Pollution Control Agency (MRWPCA), the agency has sufficient treatment capacity to accommodate current uses, plus additional unused capacity that can accommodate future uses. According to agency staff, the MRWPCA can treat approximately 309,000 gallons per day (GPD) from Moss Landing—a significant increase over the 1984 Sewer Allocation Plan. This is sufficient to accommodate proposed new and expanded uses in Moss Landing, including the addition of the Moss Landing Business Park to the urban service area.

#### 4.2.4. FUTURE WASTEWATER COLLECTION AND TREATMENT

This plan calls for an expansion of the urban service area to include the Moss Landing Business Park. This would allow this use to connect to the sanitary sewer system and decommission septic systems. The Monterey County Code requires all properties within two hundred feet of an existing sewer to connect to the sewer wherever possible. There is an existing sewer line along the State Route 1 corridor and Moss Landing Road that is within two hundred feet of the Business Park property.

One project currently under construction, the History and Heritage Center located at the south end of Moss Landing Road at State Route 1 (an approved but as yet uncompleted project that includes 30 hotel rooms, an 80-seat restaurant, and commercial retail space), has been guaranteed sewer service, which has been estimated to be approximately 5,780 GPD.

According to the Monterey Regional Water Pollution Control Agency (MRWPCA), the regional pumping facilities are capable of handling the projected future demand that is outlined above. The collection and pumping system would need to be analyzed for capacity and rehabilitation requirements. The one potential bottleneck is the Moss Landing lift station. Depending on where the Moss Landing Business Park ties into the regional conveyance system, detailed engineering studies will be needed to determine if the existing regional lift station in Moss Landing can accommodate the additional flows from the Moss Landing Business Park. Connections made downstream of the lift station would probably not require detailed study.

## 4.3 Water Resources

### 4.3.1. BACKGROUND

This section describes freshwater and seawater resources available to Moss Landing and sets forth a plan for the continued use of these resources to accommodate planned land uses.

### 4.3.2. FRESHWATER RESOURCES

Historically, groundwater overdraft significantly exceeds recharge, which comes solely from rainfall. Additionally, like the south side of Elkhorn Slough, increased scouring and the permanent changes and the opening of the harbor mouth, have increased seawater impacts and intrusion on near-slough aquifers. The Springfield Terrace aquifers suffer from chronic and acute groundwater contamination from seawater intrusion and from nitrates, from fertilizers and historic septic tank effluent discharges. These constitute significant public health challenges due to a lack of any identified alternative potable supplies.

Moss Landing, a small fishing, coastal shipping, and residential community has been dependent upon groundwater since its founding in the 19<sup>th</sup> century. Originally reliant upon naturally-occurring fresh-water springs fed by a shallow "perched" aquifer, Moss Landing now is solely dependent upon deep and distant groundwater wells for its potable supplies due to seawater intrusion and groundwater overdraft. Freshwater is supplied to the Moss Landing Community Plan planning area by both the Pajaro/Sunny Mesa Community Services District and private wells.

#### *4.3.2.1. Pajaro/Sunny Mesa Community Services District*

The Pajaro/Sunny Mesa Community Services District (PSMCSD) has provided water service to most of the Moss Landing Community Plan planning area since 2005 when the PSMCSD took over operational control and management of the Moss Landing Water System as a result of an order from the United States District Court. The newly added Moss Landing Water System was outside of the PSMCSD's formal district boundaries. In 2013, this extension of services was formalized by Local Agency Formation Commission (LAFCO) (see LAFCO File No. 13-07). In late 2013, the PSMCSD submitted an application to LAFCO to annex the territory of the former Moss Landing Water System into the boundaries of the PSMCSD. LAFCO approved this request in April of 2015 (see LAFCO File No. 14-05).

Most of the freshwater provided to the Moss Landing Community Plan planning area by the PSMCSD is drawn from two wells located south of Elkhorn Slough near Avila Road, approximately two miles east of Moss Landing. The area served by the Avila Road well includes all neighborhoods south of Elkhorn Slough, plus the North Harbor Neighborhood (generally south of Jetty Road and west of State Route 1). As part of this Moss Landing system, the PSMCSD maintains three storage tanks with a capacity of 59,000 gallons each.

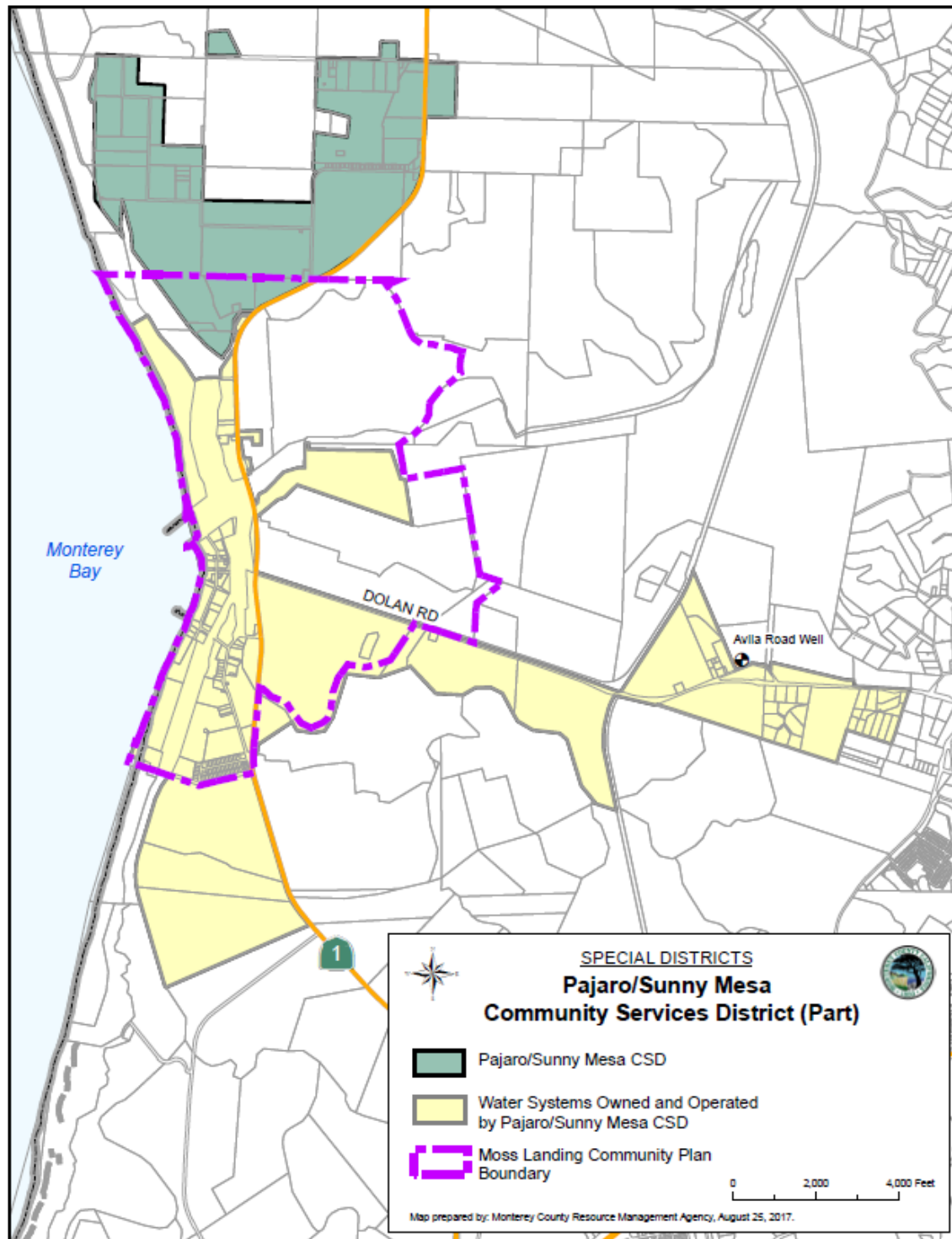
The PSMCSD also serves the northernmost part of the planning area (designated in the Moss Landing Community Plan as "Agricultural Conservation") as part of a separate Springfield

Terrace system. Figure ML-12 shows the areas served freshwater by the PSMCSD.

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Figure ML-10: Pajaro/Sunny Mesa Community Services District



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#### 4.3.2.2. *Other Potable Water Sources*

#### 4.3.2.3. *Moss Landing's Hydro-Geologic Setting*

According to the PSMCSD, there are two separate hydro-geologic zones in the Moss Landing area—north of Elkhorn Slough and south of Elkhorn Slough. These zones have been modified by separate actions taken by both private parties and the federal government, causing significant seawater intrusion. The zone north of Elkhorn Slough is known as Springfield Terrace, which is bordered on three sides by tidally influenced and increasingly deepening slough channels filled with seawater. The hydro-geology of the water-bearing formations that underlie Springfield Terrace is primarily sands and sandstone formations with some non-uniform and discontinuous clay layers. The zone receives most of its current recharge from rainfall, and the hydro-geology of this zone is decidedly dissimilar from the water-bearing formations of the Pajaro Valley or the Salinas Valley.

The zone south of the Elkhorn Slough, and the hydro-geology found there, should be divided into two areas for proper characterization—south of the Moro Cojo Slough and north of the Moro Cojo Slough. The area south of the Moro Cojo Slough has long been identified as being part of the Salinas River groundwater system. Similarities in well logs between wells drilled immediately south of Moss Landing and wells drilled in the Castroville area have confirmed over many decades that the uniform, confined, water-bearing aquifers predominate this area.

The area north of the Moro Cojo Slough shows a much less uniform and far more complex hydro-geology, with less similarity to the Salinas River groundwater system. This area has fewer uniform clay layers and is far more similar to the unconfined aquifers located north of the Elkhorn Slough. Areas both south and north of Moro Cojo Slough receive the vast majority of their recharge from rainfall.

#### 4.3.2.4. *Service Capacity and Problems*

Today, the Avila Road well, which serves most of the planning area, has not yet experienced groundwater contamination

problems. According to PSMCSD staff, the pumping capacity of this well is 350 gallons per minute, which is sufficient to accommodate existing water users, development that has already been approved, lots of record, and development that is occurring on property that already has a water connection. According to PSMCSD, however, without additional sources of water (or a water conservation plan that would reduce water demand from existing development), new development that increases the overall demand for freshwater cannot currently be accommodated.

The PSMCSD's Springfield Terrace system, which serves the northernmost part of the planning area, is already suffering from chronic and acute groundwater contamination caused by seawater intrusion and nitrates.

#### *4.3.2.5. Water Resources for Future Growth*

According to PSMCSD staff, the district currently has available water resources for new development in Moss Landing as follows:

- 250 gallons per day for each un-built lot of record in the district (approximately 51 lots).
- The Moss Landing Business Park is entitled to water from three legal sources: 1) PSMCSD water pursuant to an order of the court, 2) groundwater rights for the property, and 3) independent appropriative rights for an off-site well located on Dolan Road.
- The Moss Landing History and Heritage Center has been allotted 10,171 gallons per day, per letter from PSMCSD dated March 31, 2008.
- New or relocated uses that do not result in an overall increase in water demand.

#### *4.3.2.6. Capacity Improvements*

PSMCSD is pursuing conservation strategies to maximize the beneficial uses of its existing supplies and rights. Nonetheless,

increased pumping of existing wells in the area south of Elkhorn Slough will likely exacerbate seawater intrusion from Elkhorn Slough water into lands to the east along Dolan Road. In response, the PSMCSD may pursue alternate sources of potable water supplies.

Due to the limited financial resources of the district, PSMCSD is hopeful of receiving grants to rebuild the aging water systems and to permanently close and seal existing contaminated wells. In 2010, the PSMCSD qualified for a California Department of Public Health grant to develop a new well for the area at the Moss Landing School. PSMCSD has also identified the following water system improvements:

- A new water pipe in the Heights Subdivision
- A 500,000 gallon water tank constructed on the Avila Road well site.
- Upgrades to the existing pressure system to curb electrical costs.

The County of Monterey has committed itself to develop a program to eliminate the overdraft of the Northern Salinas Valley Ground Water Basin. Possible program elements include:

- Groundwater banking,
- Groundwater and aquifer recharge and recovery,
- Desalination,
- Pipelines to new supplies, and/or
- A variety of conjunctive use techniques.

#### 4.3.3. SEAWATER RESOURCES

Moss Landing has numerous land uses that rely on seawater drawn from the Monterey Bay. Seawater intake facilities exist in three locations to facilitate these uses.

A Memorandum of Agreement (MOA) to manage water quality was adopted for the Monterey Bay National Marine Sanctuary between federal, state, and local agencies.

#### *4.3.3.1. Moss Landing Power Plant*

The Moss Landing Power Plant is currently permitted to intake 1.2 billion gallons of seawater daily. The power plant uses seawater to cool its energy generation process. According to the California Water Resources Control Board, however, coastal power plants that rely on seawater to cool their systems must cut seawater intake by 93 percent over the next several years to comply with new state rules. The Moss Landing Power Plant is scheduled to comply by the end of 2017.

The Moss Landing Power Plant uses a once-through cooling system that can result in a high mortality of small sea life. The new rules promulgated by the California Water Resources Control Board aim to reduce mortality in accordance with the Clean Water Act of 1972. Proposals have been forwarded that would use sub-surface pipes to pull water from below the sea floor.

#### *4.3.3.2. Moss Landing Business Park*

The Moss Landing Business Park owns a seawater intake/outfall system that supplies seawater to its site on Dolan Road at State Route 1. The intake/outfall system crosses submerged lands owned by the Moss Landing Harbor District, as well as under State Route 1. The outfall pipe is a 51-inch concrete outfall pipe that extends along the ocean floor to approximately 400 feet from shore.

The Moss Landing Business Park was last granted a National Pollution Discharge Elimination System (NPDES) permit from the California Regional Water Quality Control Board (Central Coast Region) in 2009 allowing a discharge of up to 56 MGD for the calcium and magnesium depleted seawater discharge (NPDES Permit No. CA0007005, Order No. R3-2009-0002). An application to renew the permit was submitted in late 2013, and permit renewal is pending.

#### 4.3.3.3. *Moss Landing Marine Laboratories (MLML)*

MLML operates a seawater intake system that consists of a pair of eight-inch seawater intake pipes extending along the ocean floor approximately 500 feet out and 55 feet deep. MLML operates its seawater system under a waiver by the Central Coast Regional Water Quality Control Board to draw up to 400 gallons per minute of seawater. MLML currently draws between 200 and 250 gallons per minute, using one intake at a time by using a portion of the capacity of an intake pipe owned by the Moss Landing Business Park, and pumps much of the water to its main facility on Moss Landing Road. Seawater is returned to the ocean through the concrete outfall pipe owned by the Moss Landing Business Park.

MLML uses seawater to support aquaculture operations on Sandholdt Road and a sea lion tank at its main facility on Moss Landing Road. MLML also supplies seawater to MBARI, which uses the water to maintain a research tank in its facility on Sandholdt Road, and to local fishermen, who use the seawater to refill their fish storage tanks. Prior to 2010, seawater from the MLML system was used to maintain a seawater fire suppression system at MBARI's Sandholdt Road facility, but this fire suppression system was decommissioned when additional freshwater supplies were provided to the Island via the reconstructed bridge on Sandholdt Road.

#### 4.3.3.4. *Desalination Proposals*

In October 2008, the Monterey Bay National Marine Sanctuary published the *Monterey Bay National Marine Sanctuary Final Management Plan*, which set forth its "Desalination Action Plan" for the region. According to the "Desalination Action Plan," three desalination facilities currently operate within the boundaries of the Monterey Bay National Marine Sanctuary (MBNMS), one of which is at the Moss Landing Power Plant. In addition, the Desalination Action Plan notes that there is an interest for both private and public desalination plants to supply potable water supplies to the region; approximately ten facilities have recently been proposed. The Moss Landing Community Plan allows for small- and large-scale desalination facilities in the "Coastal Heavy Industry" land use designation. Small-scale desalination facilities

(for on-site use only) are also allowed in the "Waterfront Industry" and "Visitor Serving Commercial" designations (see Chapter 2 for details).

## 4.4 Supplemental Public Services Policies

### 4.4.1. WASTEWATER MANAGEMENT FACILITIES

The following policies supplement the more general coastal public services policies contained in the *North County Land Use Plan* related to wastewater management facilities, and for a complete understanding of the policies that govern development in the Moss Landing Community area, one must refer also to that document.

- NCLUP-ML-4.1. The County of Monterey shall, in cooperation with Monterey County Local Agency Formation Commission (LAFCO) and the Castroville Community Services District, work to expand community services district to include the Moss Landing Business Park. New development or redevelopment on this site should be required to connect to the sewer as a condition of project or plan approval.
- NCLUP-ML-4.2. In implementing Policy NCLUP-ML-4.1 above, the County of Monterey shall require the Moss Landing Business Park to install any sewer conveyance system improvements that are required to ensure that operations at the Moss Landing Business Park do not significantly limit the existing or future sewer conveyance system capacity otherwise required to accommodate development anticipated by the *Moss Landing Community Plan* outside of the business park. Such system improvements shall be funded at the sole expense of the Moss Landing Business Park and installed on or before the time that



such business park uses come on line that could exceed septic system capacity.

NCLUP-ML-4.3. Under its powers established by Government Code §65401, the County of Monterey shall coordinate with the Castroville Community Services District to review the district's "program of proposed public works" for conformity with the Moss Landing Community Plan. If non-conformities are found, the County of Monterey shall coordinate with the district to resolve the non-conformity.

NCLUP-ML-4.4. The County of Monterey shall continue to collaborate with the Castroville Community Services District to maintain a plan and funding strategy for the repair, maintenance, and upgrade of the Moss Landing sewer conveyance system to serve development anticipated by the Moss Landing Community Plan. The plan, among other things, should emphasize measures that minimize infiltration from storm water and high tides, including the potential effects of sea level rise.

NCLUP-ML-4.5. The County of Monterey shall work with the Castroville Community Services District to retire the Moss Landing Sewer Allocation Plan in favor of a traditional service system that ensures equitable service to all Moss Landing rate payers, including undeveloped and under developed properties, in line with regional sewer conveyance and treatment capacities. The replacement system could include the metering of sewer flows at individual properties.

NCLUP-ML-4.6. The County of Monterey will work to ensure that any replacement of the allocation system includes a process that preserves the rights of each parcel, that has paid into constructing

and maintaining the system, a minimum of 250 gallons per day per vacant parcel or for any parcel that is not currently utilizing the full 250 gallons per day. In addition, the replacement system shall also preserve the right of each parcel that utilizes greater than 250 gallons per day to that historic amount of discharge.

#### 4.4.2. FRESHWATER RESOURCES

- NCLUP-ML-4.7. Recognizing that the *Moss Landing Community Plan* accommodates public and commercial recreation uses, visitor-serving uses, coastal-dependent land uses, and essential public services and basic industries that are vital to the health of the region, the County of Monterey shall not deny development applications that are consistent with the Plan solely because of limitations—otherwise in effect—on the use of groundwater set forth in the water resource policies of Section 2.5.3.A. of the *North County Land Use Plan*, provided:
- a. The water purveyor—operating a public system, private system, or private well—is able and willing to supply potable water that meets all applicable water quality and water quantity standards to the proposed development; and
  - b. All reasonable and feasible conservation measures are taken to reduce fresh water consumption in the proposed development.
- NCLUP-ML-4.8. Should the water purveyor find, after it has exhausted all reasonable short- and long-term efforts to expand the supply of potable water available to the Moss Landing community, that it is unable to accommodate full build-out of the Moss Landing Community Plan, as

estimated by the "Moss Landing Community Plan Environmental Impact Report," then the County of Monterey shall curtail development in Moss Landing to the degree necessary to ensure that the demand for water does not exceed the water purveyor's ability to provide potable water.

- NCLUP-ML-4.9. For the purpose of determining whether a proposed development project has a source of potable water, the County of Monterey shall not treat new development in Moss Landing as an intensification of water use when the new development would be sufficiently served by potable water that was continuously provided to an existing use on the same site that is scheduled to be discontinued before the new use comes online.
- NCLUP-ML-4.10. The County of Monterey shall support strategies, including but not limited to desalination, increased use of recycled water, and conservation measures, to address historic groundwater overdraft and seawater intrusion, sustain river and stream habitats, and produce additional supplies of potable water.
- NCLUP-ML-4.11. The County of Monterey shall encourage existing and new development in Moss Landing to supplement its supply of fresh water with on-site facilities, including but not limited to the installation of small-scale desalination facilities, recycled stormwater and wastewater, additional water conserving fixtures and facilities, rainwater collections systems (for landscaping) or other fresh water sources, as made feasible by emerging technologies.

#### 4.4.3. SEAWATER RESOURCES AND DESALINATION

NCLUP-ML-4.12. Prior to approval of any new or expanded seawater pumping facilities for desalination, the County of Monterey shall ensure that such facilities are designed consistent with environmental standards identified by the appropriate regulatory agencies.

#### 4.4.4 UNDERGROUNDING OF UTILITIES.

NCLUP-ML-4.13. County shall prioritize Moss Landing as one site for undergrounding of utilities using Rule 20-A monies.



## 5.0 SAFETY, CONSERVATION, AND OPEN SPACE

### 5.1 Introduction

This section sets forth a plan and policies to conserve natural resources and open space in and around Moss Landing and to safeguard against coastal hazards.

### 5.2 Biological Resources

This section discusses biological resources in Moss Landing and the region.

#### 5.2.1. BACKGROUND

The Plan Area is located in the Central Coast sub-region of the California Floristic Province, which extends along the Pacific Coast from near Bodega Bay in the north to Point Conception in the south. This sub-region supports coastal vegetation, and in some areas only contains coastal bluffs.

The Plan Area is located along the Central California coast and within Monterey Bay, approximately 110 miles south of San Francisco and midway between Santa Cruz and Monterey. The Plan Area includes three distinct marine geographic areas: Elkhorn Slough Estuary (tidal lagoon), Moss Landing Harbor (North and South Harbor), and Monterey Bay. Each of these areas contains similar and distinct aquatic biological habitats. Distinct aquatic habitats present within the boundaries of Moss Landing Harbor and Elkhorn Slough include shallow open water, submerged aquatic vegetation, sand/mud/salt flats, fresh/salt/brackish marshes, rocky subtidal and intertidal. Distinct habitats present in Monterey Bay include sandy beach, rocky intertidal and subtidal, and open water areas.

The coastal waters of the Plan Area are also located within the Monterey Bay National Marine Sanctuary (MBNMS), designated as a federally protected area in 1992. The sanctuary was established for the purpose of research, education, public use, and resource protection.

The Central Coast of California experiences a Mediterranean climate with cool, wet winters and warm, dry summers; the Pacific

Ocean has a moderating effect on temperatures, producing a maritime temperature regime with mild temperatures year-round. Windy conditions are common around Monterey Bay, and fog occurs during all seasons, but is most prevalent during summer months. Based on the Watsonville Waterworks weather station data collected from 1948 to 2005, annual average temperatures near the Plan Area range from 45.9 to 67.1 degrees Fahrenheit. Annual average precipitation totals 22.4 inches; approximately 84 percent of this total amount occurs from December through March.

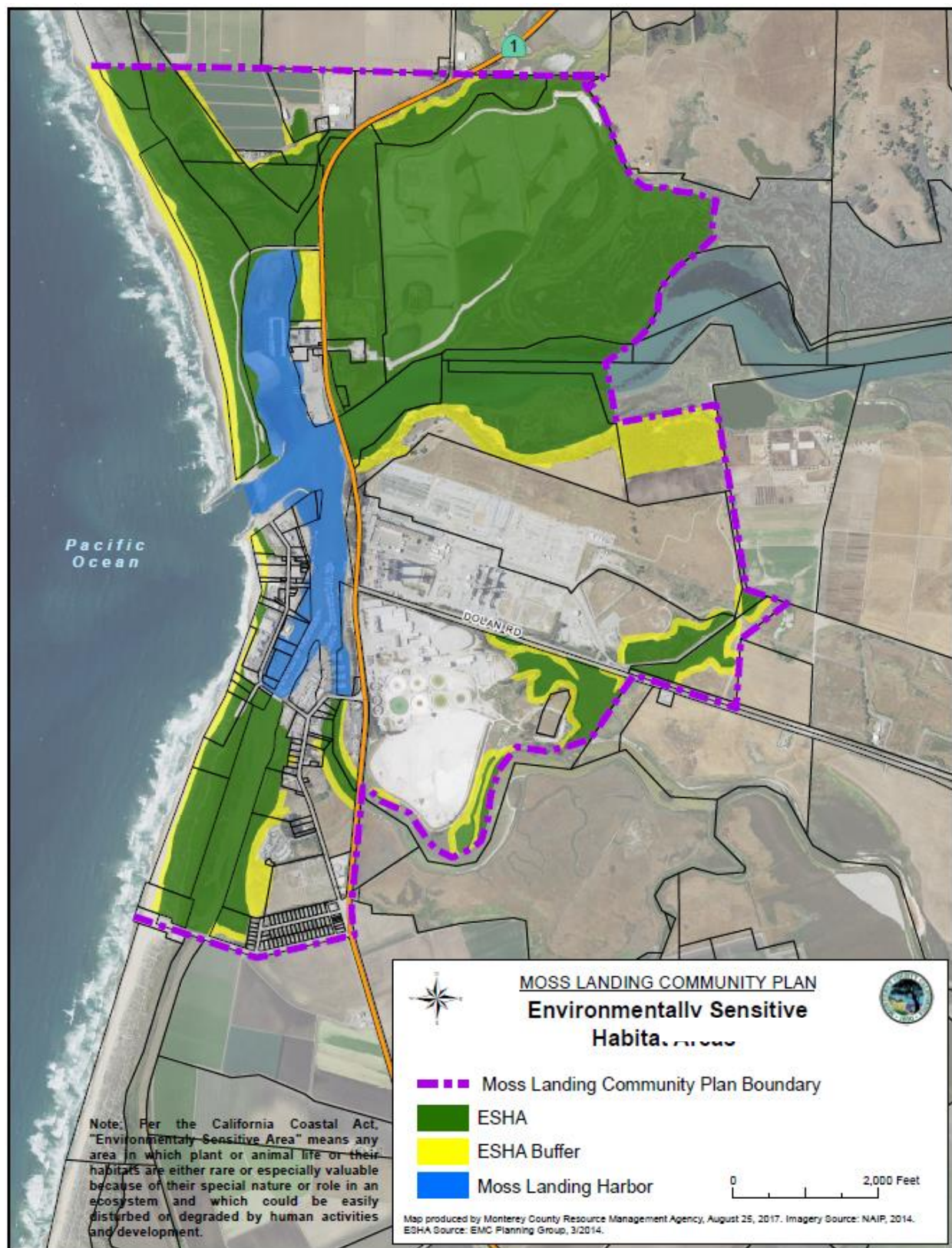
Moss Landing Harbor serves as the marine gateway to the Elkhorn Slough National Estuarine Research Reserve, California's second largest marine estuary. This expansive tidal area is an important habitat for terrestrial and marine species. The coastal estuary is a particularly valuable resource because California has lost more than 75 percent of its coastal marshes.

The California Department of Fish and Wildlife (CDFW), Elkhorn Slough Foundation, and other agencies and organizations protect natural resources and manage many conservation areas within the Plan Area. This includes, but is not limited to, Moss Landing State Beach and Moss Landing Wildlife Area in the northern portion of the Plan Area, and Salinas River State Beach in the southern portion of the Plan Area.

#### 5.2.2. ENVIRONMENTALLY SENSITIVE HABITAT AREA

Monterey County has mapped environmentally sensitive habitat area (ESHA) and ESHA buffer areas in Moss Landing. Figure ML-13 shows these areas, as of 2010. The policies of the North County Land Use Plan (LUP) require assessment of the surrounding habitat area at the time a development application is submitted, as the habitat areas may move over time.

Figure ML-11: Environmentally Sensitive Habitat Areas



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## 5.3 Shoreline Erosion and Sea Level Rise

This section discusses shoreline erosion and the likely effects of sea level rise in the Moss Landing Community Plan area. Shoreline erosion issues are largely confined to the Island, which is the only developed portion of the area located directly on the ocean waterfront. The information contained in this section is based largely on a study published on behalf of MBARI in 2007.<sup>1</sup>

### 5.3.1. SHORELINE EROSION

The following section discusses shoreline erosion in Moss Landing.

#### 5.3.1.1. *Background*

Due to the continued erosion of the shoreline of the "Island" a comprehensive shoreline erosion plan for the area should be developed to protect existing and future development. This plan should be based on engineering studies that address the stabilization of the entire length of the Moss Landing spit shoreline from the Moss Landing Marine Lab to the South Jetty and that take into account sea level rise related to climate change. It should involve the cooperation of property owners, the Moss Landing Harbor District, the County, the State, and other governmental bodies, in the planning, financing, and construction phases.

#### 5.3.1.2. *Evaluation of Shoreline Change*

According to the MBARI study (Griggs, 2007), the historical position of the vegetation line on the Moss Landing spit is a useful indicator of long-term shoreline erosion patterns. For the purposes of the study, Griggs compiled a record of the vegetation line on the Moss Landing spit using aerial photographs taken over a 74-year period. Then using this record, the study established the "most severe erosion conditions" that were evident in the photographic history. Griggs mapped the extent of these conditions to establish a recommended setback line for new construction on the spit using Sandholdt Road as a reference point.

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<sup>1</sup> The report was entitled: "Coastal Processes, Shoreline Change and Sand Dune History on the Moss Landing Sand Spit" (Griggs, December 2007). While this report was commissioned by MBARI as a site evaluation for its development master plan, the information contained in the report addresses shoreline erosion processes for all of the Moss Landing Island Area.

Griggs summarized the conclusions of the vegetation line analysis as follows:

- The vegetation line on the spit (the position reached by maximum wave run-up) varied between 38 and 100 feet from mean high tide in the 74-year history of aerial photographs.
- The vegetation line varied depending on weather patterns, with the vegetation line moving seaward in the relatively calm La Niña period (i.e., 1965 to 1974) and moving landward in the stormier El Niño period (i.e., 1976 to 1984). Since 1998, when severe storms resulted in significant shoreline retreat, the vegetation line has generally advanced seaward.
- The distance between Sandholdt Road and the vegetation line is the narrowest on the southern portion of the spit in the vicinity of the pier, where beach retreat has been arrested by the seawall constructed in this area.
- The shoreline has been gradually advancing at the sandy point in the vicinity of Perch Way and retreating slightly toward the northern end of the spit.

Figure ML-14 shows a map of the maximum landward extent of shoreline vegetation established by Griggs in the 2007 MBARI study.

Figure ML-12: Maximum Landward Extent of Vegetation



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### 5.3.2. EFFECTS OF SEA LEVEL RISE

The following section discusses the likely impacts of sea level rise on Moss Landing.

#### 5.3.2.1. Background

[Note: Much of this discussion is excerpted directly from the *California Climate Change Adaptation Policy Guide* (California Emergency Management Agency, California Natural Resources Agency, May 2012<sup>2</sup>).

According to the Intergovernmental Panel on Climate Change (IPCC) and the California Natural Resources Agency (CNRA), sea level has risen about seven inches over the last century due to global melting of land-based ice and thermal expansion (i.e., water expanding as it warms) (IPCC, 2007; CNRA, 2009).

#### 5.3.2.2. Likely Impacts of Rising Sea Levels

According to a report prepared for the County of Monterey in June 2017<sup>3</sup> more changes related to climate change can be expected by the year 2060 and on to the end of the century (2100):

- Average annual precipitation may show little change, but more intense wet and dry periods can be expected with more floods and more droughts.
- Flood peaks will become higher and natural spring/summer runoff will become lower.
- Sea levels in the Central Coast Region may rise by six to 28 inches by mid-century and 16 to 62 inches by the end of the century. (The estimated 62-inch rise in sea level corresponds to the high estimate for the year 2100).

Rising sea levels in the Central Coast Region are likely to affect coastal recreation resources such as beaches, wharves, and

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[http://www.water.ca.gov/climatechange/docs/Climate\\_Change\\_Handbook\\_Regional\\_Water\\_Planning.pdf](http://www.water.ca.gov/climatechange/docs/Climate_Change_Handbook_Regional_Water_Planning.pdf)

<sup>3</sup>" Moss Landing Community Coastal Climate Change Vulnerability Report", Figure 6, Central Coast Wetlands Group, Moss Landing Marine Labs, June 2017.

campgrounds. Sea level rise is also expected to affect vulnerable populations along the coast through the immediate effects of flooding and temporary displacement and longer-term effects of permanent displacement and disruption of local tourism. Impacts could include temporary and/or permanent displacement, drowning, property damage, and coastal erosion.

Sea level rise also will affect the provision of basic services through disruption of linear infrastructure. Impacts to State Route 1 could affect regional transportation, access to Moss Landing, and access to tourism areas. Finally, communities that depend on groundwater basins within the coastal zone may be affected by increasing saltwater intrusion driven by sea level rise.

## 5.4 Tsunami Risk

### 5.4.1. BACKGROUND

Because the planning area abuts Monterey Bay and the Pacific Ocean, inundation from tsunami is possible. Tsunamis are typically triggered by earthquakes, local or distant, and can also be triggered by larger underwater landslides.

### 5.4.2. LIKELY IMPACTS OF TSUNAMI

A submarine landslide in the Monterey Canyon offshore of the Plan Area is considered capable of producing a significant tsunami on Monterey Bay. Large tsunamis can result in significant damage and loss of life.

On March 11, 2011, Moss Landing Harbor was damaged by a tsunami that caused approximately \$1.75 million in damages. According to Moss Landing Harbor District consultant Ken Israel, of Sea Engineering, the water surged and receded about 7 feet in a matter of minutes, slamming the docks against the pilings in two directions. An investigation by Israel's firm revealed almost 200 damaged pilings and 20,000 cubic yards of extra sediment in the harbor.

Large portions of the Plan Area are shown as areas of potential tsunami wave movement. According to State Planners, a wave height of up to three meters (9.8 feet) should be considered when planning shoreline structures in the Monterey Bay area. The actual

pattern of tsunami movement onto land is dependent on numerous factors, including the location and size of the event triggering the tsunami, tidal phase, etc.

## 5.5 Historical Resources, Visual Resources, and Community Character

The following section discusses historical resources, visual resources, and community character. According to Coastal Act §30251, “the scenic and visual qualities of coastal areas shall be considered and protected as a resource of public importance.”

Communities and neighborhoods that are popular visitor destination points for recreational uses or have highly scenic and historical features are important to protect and even enhance.

### 5.5.1. HISTORICAL AND ARCHAEOLOGICAL RESOURCES

According to “Historical Context Statement for Agricultural Resources in North County Planning Area, Monterey County (PAST Consultants, September 2010),” Moss Landing was built by Captain Charles Moss, who settled in the area in 1866 and constructed a wharf and warehouses to serve as the main shipping point for the Salinas Valley’s agricultural goods. The shipping facility was soon eclipsed by railroad service, which arrived in 1871. Approximately 75 years later, in 1947, Moss Landing Harbor began operations.

According to the Monterey County Parks Department, three historical properties are listed on the Monterey County Register of Historic Resources. These properties are shown in Figure ML-15. The entire community was designated as historically significant by the Board of Supervisors in 1977.

As regards archaeological resources, according to the Monterey County Department of Information Services, the entirety of Moss Landing is located in an area of high archaeological sensitivity, due largely to pre-historical habitation of the area by the Ohlones.

### 5.5.2. VISUAL RESOURCES AND COMMUNITY CHARACTER

Viewed from great distances, Moss Landing is one of the most easily identifiable coastal communities in California. The 550-foot power plant stacks serve as a landmark feature that unmistakably marks the location of the community from any approach.

But the special character and unique visual features of the community are derived from more than its significant industrial activities. Other factors also play a part, including its status as an historical port and setting for cannery activities; its cultural significance for scientific research; its striking natural setting and abundance of marine life and shorebirds; and its well-known collection of antique shops. The recreational opportunities it affords make it a unique destination point for an increasing number of visitors.

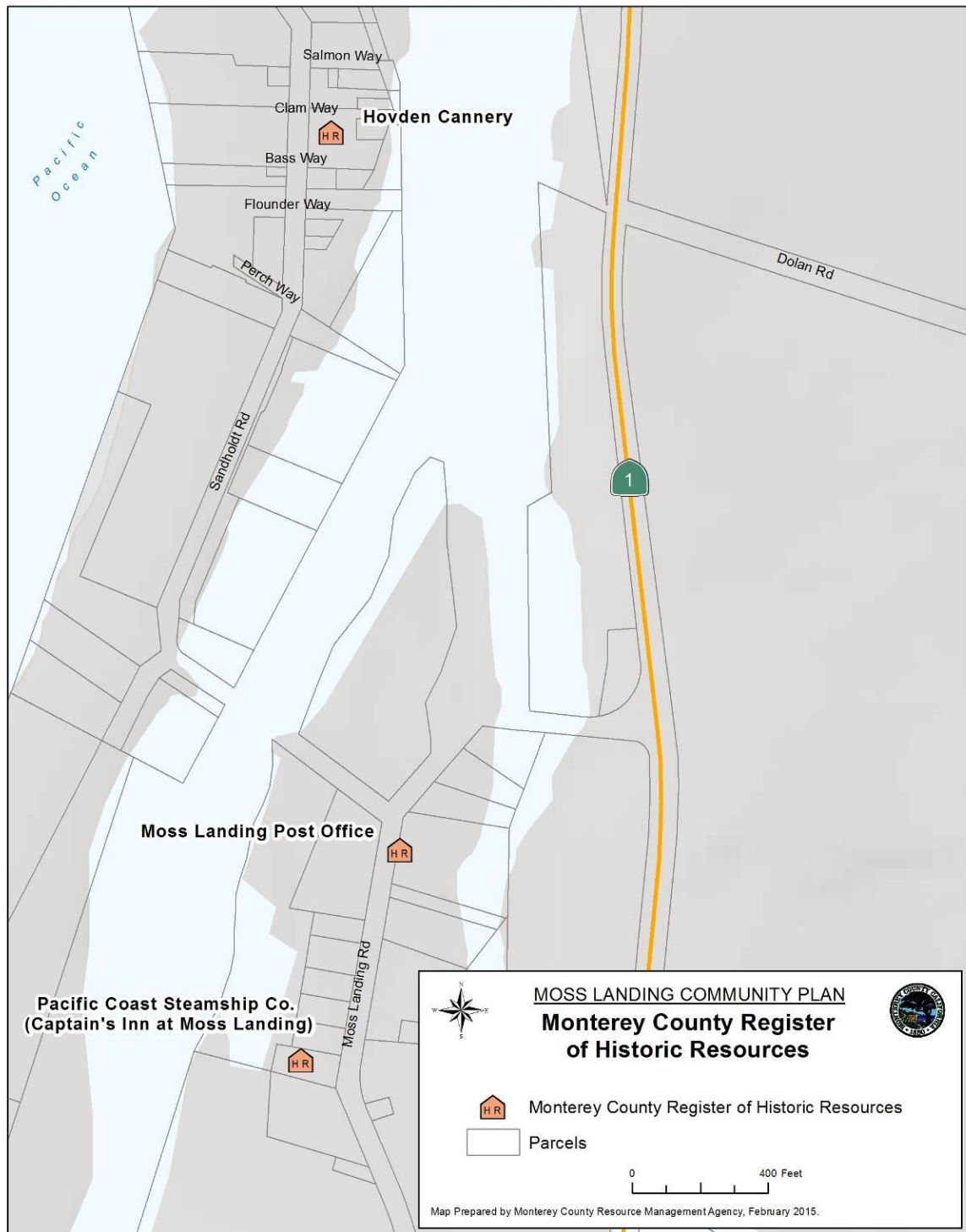
In summary, Moss Landing contains a diversity of natural and man-made visual features that contribute to the community's strong vitality and special character. For the benefit of both residents and those who come to work and play, care should be taken to preserve and enhance these important visual resources as the community changes and grows over time.

It is particularly important to recognize that the community itself is composed of distinctly different areas that accommodate the needs of different groups of people pursuing varying activities. The visual resources of these areas are different. The policies that follow acknowledge this by giving protection to specific natural and cultural resources as well as setting forth some broad guidelines to be used by the County, when it considers development proposals in the different areas of the community.

The success of efforts to enhance the visual and scenic qualities of the Moss Landing ultimately rest on the active participation of the many public and private members of the community and the support they can provide for the County.



**Figure ML-13: Historical Resources**



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## 5.6 Supplemental Safety, Conservation and Open Space Policies

The following policies supplement the more general coastal policies contained in the *North County Land Use Plan* related to safety, conservation and open space, and for a complete understanding of the policies that govern development in the Moss Landing Community area, one must refer also to that document.

### 5.6.1. SHORELINE EROSION AND SEA LEVEL RISE

- NCLUP-ML-5.1. All development shall be designed or constructed to **withstand** rising sea levels based on: 1) the Regional "Projection" sea level rise data contained in the Moss Landing Community Coastal Climate Change Vulnerability Report (2017; Figure 6); or 2) a site specific assessment; or 3) updated sea level rise report(s) that define or describe a likely scenario.
- NCLUP-ML-5.2. The County of Monterey shall, in cooperation with the Moss Landing Harbor District and other affected agencies and property owners, plan the necessary steps to protect (armoring, dune restoration, beach replenishment, vegetation planting, etc.) against the effects of sea level rise to maintain the long-term viability of Moss Landing Harbor and associated coastal-dependent and coastal-related uses as long into the future as is economically feasible.
- NCLUP-ML-5.3. Outside of the Island area, Monterey County shall, in cooperation with Elkhorn Slough Foundation, Elkhorn Slough National Estuarine Research Reserve, and other affected agencies and property owners, plan the necessary steps for managed shoreline retreat that promotes the conservation of beach, dune, slough, and other natural habitats. Such planning shall also

include measures to ensure that expected increases in sediment load from Elkhorn Slough do not compromise harbor operations.

#### 5.6.2. TSUNAMI RISK

- NCLUP-ML-5.4. The County of Monterey shall work with the Moss Landing Harbor District and state and federal agencies to install and maintain a warning system and signing for tsunami evacuation and education. Such a system should be installed after Coastal Commission certification of the *Moss Landing Community Plan*. As feasible, the County of Monterey will work with property owners to identify publicly accessible safe havens for use in the event of tsunami.

#### 5.6.3. HISTORICAL AND ARCHAEOLOGICAL RESOURCES

- NCLUP-ML-5.5. The County of Monterey shall conserve the unique cultural, historic, and archaeological resources of Moss Landing to the greatest extent possible while protecting private property rights.
- NCLUP-ML-5.6. The County of Monterey shall, as a part of its Housing Element, maintain an identification survey and inventory program of historical sites and maintain a registry program to protect and preserve historical landmark sites and districts.
- NCLUP-ML-5.7. The County of Monterey shall identify any historical, architectural, archaeological or cultural resources eligible for inclusion on historical registers which may be located within the project's potential impact area. Owners of the properties containing those resources shall be promptly notified. Guidelines for preservation, restoration or adaptive use of designated historic sites should be developed.

- NCLUP-ML-5.8. The County of Monterey shall apply the "HR" Zoning District Ordinance to designated historical sites to ensure that new onsite development is compatible with existing historical resources and to maintain the special values and unique character of the historical properties.
- NCLUP-ML-5.9. The County of Monterey shall work with private and public organizations that have the capacity to properly manage and supervise historic properties to acquire property where the preservation of designated historical buildings and landmarks is in jeopardy.
- NCLUP-ML-5.10. For all development projects which involve ground disturbance, an on-site tribal representative shall monitor all earth-moving activities.
- NCLUP-ML-5.11. All development projects shall be reviewed by the Monterey County Historic Resources Review Board (HRRB) prior to approval, to ensure consistency with the historical designation of the Moss Landing Community.

#### 5.6.4. VISUAL RESOURCES AND COMMUNITY CHARACTER

- NCLUP-ML-5.12. The County of Monterey shall conserve the unique visual resources of Moss Landing to the greatest extent possible while protecting private property rights.
- NCLUP-ML-5.13. Visual access from the nearest public road to the shoreline of Elkhorn Slough and other estuaries shall be maintained and enhanced for the enjoyment of the public in a manner compatible with other land uses permitted in the plan. Visual access to Moss Landing Harbor shall be retained as part of improvements to Highway 1 and adjacent properties.

- NCLUP-ML-5.14. All properties located within the Moss Landing Community Plan planning area shall be zoned to include the Design Control ("D") Combining District and thereby required to undergo design review as part of the development review process so as to avoid blocking or having a significant adverse impact on significant public views, including by situating lots and/or buildings to maximize the preservation of the public viewshed. The required design review shall gauge the acceptability of the project based on adopted design guidelines.
- NCLUP-ML-5.15. The County of Monterey shall limit development, wherever possible in scenic beach, dune, estuary, and wetland areas, consistent with the resource protection policies of this plan, to protect the visual resources of Moss Landing.
- NCLUP-ML-5.16. Monterey County shall adopt procedures and standards for review of the siting, design, landscaping, and grading for any structures proposed in scenic beaches, dunes, estuaries and wetlands.
- NCLUP-ML-5.17. The County of Monterey, in coordination with the Moss Landing Harbor District, shall protect views of the Moss Landing community, harbor and dunes from State Route 1 through regulation of landscaping and siting of new development adjacent to the highway to minimize the loss of visual access.
- NCLUP-ML-5.18. The County of Monterey shall form a design review committee to provide guidance to the County in the consideration of development proposals in the Moss Landing Community.
- NCLUP-ML-5.19. The County of Monterey shall seek funding to install or retrofit street lights that meet dark sky criteria, provide safe travel, direct lighting such

that sensitive resources are not adversely affected and produce minimum glare.

#### 5.6.5. NOISE

- NCLUP-ML-5.20. The County of Monterey shall require new residential development, not including remodels, within 400 feet of the centerline of State Route 1 to prepare an acoustical report containing, among other things, design recommendations to maintain interior noise levels at 45 dBA Ldn or less.

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## 6.0 RECREATION AND PUBLIC ACCESS

### 6.1 Introduction

According to Coastal Act §30001.5(c), one of the basic goals of the state for the Coastal Zone is to "maximize public access to and along the coast and maximize public recreational opportunities in the coastal zone consistent with sound resource conservation principles and constitutionally protected rights of private property owners". This chapter sets forth a plan for public access to coastal resources and related policies.

### 6.2 Recreation and Public Access

The Moss Landing Community Plan area contains a variety of sandy beaches, dunes, estuaries and wetland habitats that offer diverse recreational opportunities. In the spirit of the Coastal Act, public access to these areas will be provided, consistent with the conservation of the sensitive natural resources.

At Moss Landing State Beach, problems with sand blowouts, littering, fires in the dunes, crowded parking conditions, congestion along Jetty Road, and illegal camping, limit the aesthetic appreciation and quality of the recreational experience. Uncontrolled access to fragile sand dunes is resulting in trampling of dune vegetation and severe damage to the dunes themselves. Similar problems exist at Salinas River State Beach and the sand dunes south of the Marine Laboratories.

Overall, the lack of adequate management and public facilities at the two state beaches is a pressing problem in need of correction. Improved parking facilities and restrooms are needed at both beaches. Other facilities needed at Moss Landing State Beach include fish cleaning tables, fire pits and bicycle racks. Finally, the lack of adequate public transit service to the two state beaches limits the degree to which either facility can be used and appreciated by those dependent upon public transit services.

Opportunities for public access to the Island beach are limited by inadequate parking, as well as by the developed character of this



area. Improved public access and low intensity recreational use also exist in Bennett and Elkhorn Sloughs. The Moro Cojo Slough, by virtue of its proximity to State Route 1, represents a potential recreational opportunity that could be appreciated by the public in addition to the areas above. Figure ML-16 shows the public access plan for Moss Landing.

### 6.3 Parking Facilities

Locations for improved parking facilities are shown on Figure ML-16 for the Plan area. It is recommended that the improved parking area to be located between the sand dunes and Bennett Slough at the curve of Jetty Road be limited to not more than 100 spaces. Consistent with access policies in the North County Land Use Plan (see Chapter 6 ), parking improvements shall be made only upon completion of more detailed management plans for the area by the State Department of Parks and Recreation. Care should be taken during development of parking at the Jetty Road curve, to avoid filling the Bennett Slough wetlands or disrupting wildlife and shorebird habitat.

The potential for parking improvements should be studied at "the opening" a popular parking area midway along Jetty Road where there are no longer any dunes remaining and where there is easy beach access.

Parking improvements are proposed for the South Harbor area. The existing Caltrans Park and Ride facility is shown on the west side of State Route 1 near Dolan Road. Parking is also shown at the Southwest corner of Moss Landing Road North and State Route 1, and near the south intersection of Moss Landing Road and State Route 1. General upgrading of the existing parking area at Moss Landing State Beach is also needed.

Figure ML-14: Public Access Diagram



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## 6.4 Supplemental Recreation and Public Access Policies

The following policies supplement the more general coastal public access policies contained in the *North County Land Use Plan*, and for a complete understanding of the policies that govern development in the Moss Landing Community Area, one must refer also to that document.

### 6.4.1. RECREATION AND PUBLIC ACCESS

NCLUP-ML-6.1. Major access areas, whether in public or private ownership shall be permanently protected for long-term public use. They shall be improved where necessary and managed properly. Major access locations are:

- a) Jetty Road - access to Bennett Slough and Moss Landing State Beach
- b) Sandholdt Road - access to "The Island" beaches and North Harbor
- c) Moss Landing Marine Lab - access to beach
- d) Potrero Road - access to Salinas River State Beach

NCLUP-ML-6.2. Secondary access areas which, because of natural or man-made constraints are suitable for limited public use shall also be protected for such use. When new access is provided or existing access is formalized or expanded, an appropriate public agency or private organization must assume management responsibility for public use, or agreements concerning such responsibility must be reached with landowners. Secondary access areas are:

- a) North Harbor Commercial area - access to Elkhorn Slough and North Harbor

b) Moss Landing Road - access to Moro Cojo Slough

- NCLUP-ML-6.3. The County of Monterey encourages an optimal level of development of recreation and public access opportunities consistent with the conservation of sensitive natural resources of Moss Landing.
- NCLUP-ML-6.4. New access and recreation areas should be guided by detailed management plans, and the rights of residents and property owners should not be jeopardized by irresponsible public access. Low and moderate cost recreation and visitor-serving facilities are preferred to higher cost facilities.
- NCLUP-ML-6.5. The Monterey County Sheriff's Department, in cooperation with the State Department of Parks and Recreation, will continue to provide public safety services at Moss Landing State Beach and Salinas River State Beach.
- NCLUP-ML-6.6. The County of Monterey shall work with responsible agencies to continue to provide educational displays and signs at major access points to the state beaches alerting visitors to the fragile nature of the dune environment and directing them to controlled accessways.
- NCLUP-ML-6.7. The County of Monterey shall work with Monterey-Salinas Transit to improve bus scheduling to allow more frequent transit service to the state beaches and Moss Landing's village center.
- NCLUP-ML-6.8. The County of Monterey shall review development projects and public agency planning documents to seek opportunities to develop plans and funding strategies for the construction of public accessways to Bennett Slough, Elkhorn Slough, Moro Cojo Slough, the

Island beach, and the sand dunes south of the Moss Landing Marine Laboratories.

- NCLUP-ML-6.9. Controlled public access to Moro Cojo Slough and Bennett Slough should be included in any wetlands restoration programs for these areas. Accessways should not infringe upon sensitive natural habitats. Provision of boardwalks constructed of permeable materials should be favored over foot trails where the potential for damage to wetland habitat exists. Access to Moro Cojo Slough, including an improved parking facility, should be provided via Moss Landing Road and from the parking lot near the intersection of Moss Landing Road North and State Route 1. Access to Bennett Slough, with education displays and viewing areas, should be provided via Jetty Road. Visual access shall also be maintained to these wetland areas.
- NCLUP-ML-6.10. The County of Monterey shall work with the State Department of Parks and Recreation to establish a dune restoration program, including protective fencing, replanting with native vegetation, and boardwalks constructed of permeable material to link parking areas and access sites with the shoreline. Controlled access points should be clearly marked, and educational displays developed to inform the general public about fragile dune habitats. The development of a dune habitat interpretive center should also be considered.
- NCLUP-ML-6.11. The County of Monterey shall, where feasible, require adequate off-street parking and public access to the beach as a condition of development permit approvals on the Island.

#### 6.4.2. PARKING FACILITIES

- NCLUP-ML-6.12. The County of Monterey, in collaboration with property owners, shall work to provide up to 150 improved parking spaces at the end of Jetty

Road, where there is ample area for a paved turnaround, or loop to assist circulation.

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