STATE OF HAWAII
DEPARTMENT OF LAND AND NATURAL RESOURCES
POST OFFICE BOX 621
HONOLULU, HAWAII 96809

ref:OCCL:MC

CDUA MA-3738

FEB 25 2015

Director
Office of Environmental Quality Control
Department of Health, State of Hawai'i
235 S. Beretania Street, Room 702
Honolulu, Hawai'i 96813

Dear Director:

With this letter, the Office of Conservation Lands (OCCL) hereby transmits the draft environmental assessment and anticipated finding of no significant impact (DEA-AFONSI) for a trailered vessel facility situated at TMK (2) 3-7-001:023 and 021 at the Kahului Harbor West Breakwater in the Wailuku District, Maui on the island of publication in the next available edition of the *Environmental Notice*.

Enclosed is a completed OEQC Publication Form, two copies of the DEA-AFONSI, an Adobe Acrobat PDF file of the same, and an electronic copy of the publication form in MS Word. Simultaneous with this letter, we have submitted the summary of the action in a text file by electronic mail to your office.

If there are any questions, please contact Michael Cain at 587-0048.

Sincerely,

Samuel J. Lemmo, Administrator
Office of Conservation and Coastal Lands

enclosures:
OEQC Publication Form,
DEA-AFONSI
Disc: Pub Form, DEA (pdf)
OCCL determiniation

via email: pub form / summary; agency determination

copy: Thorne Abbot

APPLICANT ACTIONS
SECTION 343-5(C), HRS
PUBLICATION FORM (JANUARY 2013 REVISION)

Project Name: Trailered Vessel Facility
Island: Maui
District: Wailuku
TMK: (2) 3-7-001:023 and 021
Permits: Conservation District Use Permit (CDUP)
Approving Agency:
Office of Conservation and Coastal Lands, PO Box 621, Honolulu, HI 96809; contact Michael Cain, 587-0048
Applicant:
Maui Dry Dock and Storage LLC, PO Box 1119, Lahaina, HI; contact Jeff Strahn, manager, 270-9813
Consultant:
Coastal Planners LLC, 3993 Maalaea Bay Place, Wailuku, HI 96793; contact Thorne Abbot, 344-1595
Status (check one only):

X DEA-AFNSI	Submit the approving agency notice of determination/transmittal on agency letterhead, a hard copy of DEA, a completed OEQC publication form, along with an electronic word processing summary and a PDF copy (you may send both summary and PDF to oeqchawaii@doh.hawaii.gov; a 30-day comment period ensues upon publication in the periodic bulletin.
__FEA-FONSI	Submit the approving agency notice of determination/transmittal on agency letterhead, a hard copy of the FEA, an OEQC publication form, along with an electronic word processing summary and a PDF copy (send both summary and PDF to oeqchawaii@doh.hawaii.gov; no comment period ensues upon publication in the periodic bulletin.
__FEA-EISPN	Submit the approving agency notice of determination/transmittal on agency letterhead, a hard copy of the FEA, an OEQC publication form, along with an electronic word processing summary and PDF copy (you may send both summary and PDF to oeqchawaii@doh.hawaii.gov; a 30-day consultation period ensues upon publication in the periodic bulletin.
__Act 172-12 EISPN	Submit the approving agency notice of determination on agency letterhead, an OEQC publication form, and an electronic word processing summary (you may send the summary to oeqchawaii@doh.hawaii.gov. NO environmental assessment is required and a 30-day consultation period upon publication in the periodic bulletin.
__DEIS	The applicant simultaneously transmits to both the OEQC and the approving agency, a hard copy of the DEIS, a completed OEQC publication form, a distribution list, along with an electronic word processing summary and PDF copy of the DEIS (you may send both the summary and PDF to oeqc@doh.hawaii.gov); a 45-day comment period ensues upon publication in the periodic bulletin.
__FEIS	The applicant simultaneously transmits to both the OEQC and the approving agency, a hard copy of the FEIS, a completed OEQC publication form, a distribution list, along with an electronic word processing summary and PDF copy of the FEIS (you may send both the summary and PDF to oeqc@doh.hawaii.gov); no comment period ensues upon publication in the periodic bulletin.
__ Section 11-200-23 Determination	The approving agency simultaneous transmits its determination of acceptance or nonacceptance (pursuant to Section 11-200-23, HAR) of the FEIS to both OEQC and the applicant. No comment period ensues upon publication in the periodic bulletin.
__Statutory hammer Acceptance	The approving agency simultaneously transmits its notice to both the applicant and the OEQC that it failed to timely make a determination on the acceptance or nonacceptance of the applicant's FEIS under Section 343-5(c), HRS, and that the applicant's FEIS is deemed accepted as a matter of law.
__Section 11-200-27 Determination	The approving agency simultaneously transmits its notice to both the applicant and the OEQC that it has reviewed (pursuant to Section 11-200-27, HAR) the previously accepted FEIS and determines that a supplemental EIS is not required. No EA is required and no comment period ensues upon publication in the periodic bulletin.
__Withdrawal (explain)	

Summary (Provide proposed action and purpose/need in less than 200 words. Please keep the summary brief and on this one page):

The intent of the project is to provide secured trailered vessel parking for the public and to support vessel repair, maintenance, and inspections. The project involves installation of two concrete pads, two grassy swales, and attendant subsurface drainage and treatment system.

Vinyl coasted chain link fencing along the site's perimeter and key card access for convenience would help create a secure parking area for boats, trailers, and tow vehicles on the 1.453 acre, vacant, unimproved, barren site. Two key card operated electric gates would afford boaters 24-hour access and convenient trailer turning, ingress and egress from the facility. No price or rental period has been determined; the rate would be determined in consultation with DOBOR.

Landscape plantings would surround both the perimeter fencing and be planted along the edge of two grassy swales located next to area. Plantings of hau and naupaka would provide visual screening, attenuate storm water runoff, and serve as a wind break.

The proposal does not include any above ground buildings or structures beyond installation of a fence, gates, key card readers and concrete maintenance pads.

The applicant will pursue a lease with the Department should they secure a Conservation District Use Permit (CDUP).

DAVID Y. IGE
GOVERNOR OF HAWAII

STATE OF HAWAII
DEPARTMENT OF LAND AND NATURAL RESOURCES
POST OFFICE BOX 621
HONOLULU, HAWAII 96809

REF:OCCL:MC

CDUA MA-3738
180 Day Deadline: August 24, 2015

Thorne Abbot
Coastal Planners LLC
3993 Ma`alaea Bay Place
Wailuku, HI 96793

FEB 25 2015

Dear Mr. Abbot,

NOTICE OF ACCEPTANCE and
PRELIMINARY ENVIRONMENTAL DETERMINATION

Conservation District Use Application (CDUA) File No. MA-3738
(Board Permit)

This acknowledges the receipt and acceptance for the processing of Maui Dry Dock and Storage's application for a trailered vessel facility at the Kahului Harbor West Breakwater, Wailuki District, Maui, TMK (2) 3-7-001:023 and 021. Both parcels are on State-owned land managed by the Department of Land and Natural Resources (DLNR) Division of Boating and Ocean Recreation (DOBOR).

The intent of the project is to provide secured trailered vessel parking for the public and to support vessel repair, maintenance, and inspections. According to the applicant these services are not readily available on Maui`s north shore.

The project involves installation of two concrete pads, two grassy swales, and attendant subsurface drainage and treatment system. The impervious surface areas would provide an appropriate space to conduct vessel maintenance and inspections, including mandatory bi-annual U.S. Coast Guard inspections of commercial and privately-owned vessels.

Vinyl coasted chain link fencing along the site's perimeter and key card access for convenience would help create a secure parking area for boats, trailers, and tow vehicles on the 1.453 acre, vacant, unimproved, barren site. Two key card operated electric gates would afford boaters 24-hour access and convenient trailer turning, ingress and egress from the facility. No price or rental period has been determined, but key cards are anticipated to be available for approximately $100 to $130 per month and are intended to help defray the facility's construction costs. The rate would be determined in consultation with DOBOR.

Landscape plantings would surround both the perimeter fencing and be planted along the edge of two grassy swales located next to the unpaved parking area and concrete maintenance pad areas. Plantings of hau and naupaka would provide attractive visual screening, attenuate storm water runoff and serve as a wind break.

Because of its approximately 50 feet x 40 feet size, one of the two grassy swales could accommodate a shaded gathering place. The area would be allocated to boaters for a future gathering place and traditional pavilion if the boating community desired to construct a shaded gathering place.

The proposal does not include any above ground buildings or structures beyond installation of a fence, gates, key card readers and concrete maintenance pads.

The parcel is composed of dredged fill material, and native flora and fauna are absent.

According to the applicant the project will provide a safe, dedicated location for vessel haul out, mandated U.S. Coast Guard bi-annual inspections of commercial vessels, and boat maintenance on imperious surface while adding a storm water drainage system to help protect near shore waters and the environment. The fenced, unpaved parking area and two access gates provides convenient access and security for individual boat owners to store their vessel overnight or longer term.

The applicant states that they have worked with DOBOR in developing the proposal, and will pursue a lease with the Department should they secure a Conservation District Use Permit (CDUP).

After reviewing the application, OCCL finds that:

1. The proposal is an identified land use within the Conservation District, pursuant to Hawai`i Administrative Rules (HAR) §13-5-22 Identified Land Uses in the Limited Subzone, P-8 STRUCTURES AND LAND USES, EXISTING, (D-1) *Major alteration of existing structures, facilities, uses, and equipment, or topographical features which are different from the original use or different from what was allowed under the original permit.* OCCL is basing this determination on the fact that the proposed lot is a new use at the existing harbor. This use requires a permit from the Board of Land and Natural Resources, who have the final authority to grant, modify, or deny any permit.

2. A public hearing will be required pursuant to HAR §13-5-40 *Hearings*, (a) *Public hearings shall be held on* (1) *All applications for a proposed use of land for commercial purposes.*

   OCCL will contact you shortly to coordinate the public hearing.

3. Pursuant to HAR §13-5-31 *Permit applications,* the permit requires that an environmental assessment be carried out. The draft environmental assessment (DEA) will be submitted to the Office of Environmental Quality Control (OEQC) for publication in the March 8, 2015 *Environmental Notice.*

   The official 30-day public comment period on the DEA will run until April 7, 2015.

4. It is the applicant's responsibility to comply with the provisions of Hawaii's Coastal Zone Management law (HRS Chapter 205A) pertaining to the Special Management Area (SMA) requirements administered by the various counties.

Upon completion of the application review process, your client's CDUA will be placed on the agenda of the Board of Land and Natural Resources for their consideration. Should you have any questions regarding this application, please contact Michael Cain of our Office of Conservation and Coastal Lands Staff at 587-0048.

Sincerely,

CARTY CHANG, Interim Chairperson
Board of Land and Natural Resources

c: *Maui Board Member*
Office of Hawaiian Affairs
Maui County Department of Parks and Recreation
Maui County Department of Planning
DLNR- Land Division, DOCARE, Division of Aquatic Resources, DOBOR
Department of Transportation – Harbors Division
US Army Corps of Engineers
US Coast Guard
Department of Health
Community Marine Management Areas

ENVIRONMENTAL ASSESSMENT

IN SUPPORT OF A
CONSERVATION DISTRICT USE PERMIT APPLICATION

FOR A

TRAILERED VESSEL
PARKING, MAINTENANCE, STORAGE AND INSPECTION FACILITY

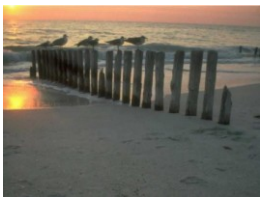
AT THE
KAHULUI SMALL BOAT HARBOR
WEST BREAKWATER

SITUATED AT
KAHULUI BEACH ROAD
MAUI, HAWAII

TMK (2) 3-7-001:023 POR. 21

PREPARED BY

COASTAL PLANNERS, LLC
WAILUKU, MAUI, HI



JANUARY 2015

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Appendix A: Preliminary Drainage Report

LIST OF ACRONYMS & ABBREVIATIONS

AEHR	Annual Erosion Hazard Rate
asl	above sea level
Board	Board of Land and Natural Resources
BLNR	Board of Land and Natural Resources
BMPs	Best Management Practices
CDUP	Conservation District Use Permit
cfs	cubic feet per second
Chapter 343	Environmental Impact Statements Law
Commission	Maui Planning Commission, Maui County
CP	Community Plan
CPP	Countywide Policy Plan
CZMA	Hawaii Coastal Zone Management Act
DAR	Division of Aquatic Resources
DLNR	Department of Land and Natural Resources
DOBOR	Division of Boating and Ocean Recreation
EA	Environmental Assessment
FEMA	Federal Emergency Management Agency
FIRM	Flood Insurance Rate Map
FONSI	Finding of No Significant Impact
HAR	Hawaii Administrative Rules
HDOH	Hawaii Department of Health
HDOT	Hawaii Department of Transportation
HRS	Hawaii Revised Statues
HRS 183C	Conservation District
HRS 205A	Hawaii Coastal Zone Management Act
KWCP	Kahului-Wailuku Community Plan
MCC	Maui County Code
MDDS	Maui Dry Dock and Storage
MIP	Maui Island Plan
MPC	Maui Planning Commission
MTBC	Maui Trailer Boat Club
NPDES	National Pollution Discharge Elimination System
OCCL	Office of Conservation and Coastal Lands
OEQC	Office of Environmental Quality Control
ORMP	Ocean Resource Management Plan
pH	potential hydrogen (a measure of acidity)
PM	particulate matter
sf	square foot/square feet
SHPD	State Historic Preservation Division
SMA	Special Management Area
SOEST	School of Ocean and Earth Science and Technology
SUP	stand up paddling
TMK	Tax Map Key
U.S.	United States of America
USACE	U.S. Army Corps of Engineers
VOC	volatile organic carbon

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CHAPTER 1
PROJECT SUMMARY

Project Name:	Trailered vessel parking, maintenance, storage and inspection facility.
Purpose:	To improve the site to provide secure trailered vessel parking for the public and to support vessel repair, maintenance and inspections.
Proposed Action:	Creation of 20 or more, unpaved, parking stalls for boats on trailers, by erecting vinyl-coated chain link fencing around a 1.453 acre site. The site would have two electric entry gates, 24-hour key card access for convenience, and landscape plantings along the perimeter to serve as an attractive wind break. The project includes the installation of two concrete pads to accommodate vessel maintenance and inspections. Two grassy bio-swales would be connected to a subsurface drainage system to capture, stabilize and filter water runoff in an environmentally sound manner. One swale would serve as a shaded gathering place. The improvements would provide a secure location for parking, storing, maintaining, and inspecting both large and small trailered vessels, as these services are not readily available on Maui's north shore for the boating community.
Property Vicinity:	Kahului Harbor, West Breakwater.
Parcel TMK:	(2) 3-7-001:023 por. 21
Project Footprint	1.453 acres of a 6.100 acre parcel
Existing Use:	Unimproved, vacant, bare soil area used intermittently for vessel and vehicle parking.
Landowner:	State of Hawaii, Department of Land and Natural Resources
Managing Agency:	Division of Boating and Ocean Recreation
State Land Use:	Conservation District –Resource subzone
Community Plan:	not applicable
Zoning:	not applicable
Flood Hazard Zone:	VE with base flood elevation of 18 feet above sea level (asl).
Special Designations:	Inland of the County and State maximum shoreline setback area. Property is within the County Special Management Area.
Applicant :	Maui Dry Dock and Storage, LLC. PO Box 1119, 207 Kupuohi Street Lahaina, Maui, Hawaii 96761.

Accepting Authority:	Board of Land and Natural Resources
	c/o The Department of Land and Natural Resources
	Office of Conservation and Coastal Lands
	Kalanimoku Building, Room 131
	1151 Punchbowl Street, Honolulu, HI 96813
Agent / Representative:	Mr. Thorne Abbott, Coastal Planners, LLC
	3993 Maalaea Bay Place, Wailuku, HI 96793
	Tel: (808) 344-1595
	Email: Thorneabbott@yahoo.com

1.1 PROJECT DESCRIPTION

The proposed action would expand the range of maritime related services and activities available at the Division of Boating and Ocean Recreation (DOBOR) Kahului small boat harbor facility. The project would improve a currently vacant portion of DOBOR's facility on the Kahului Harbor West Breakwater. The project site is located inland of the boat ramp and inland of the shoreline setback area and in the same configuration as the DOBOR Master Plan for the harbor. The project would create parking for 20 or more vessels on trailers in a secure fenced area available to the public for a nominal fee.

The project involves installation of two concrete pads, two grassy swales, and attendant subsurface drainage and treatment system. The impervious surface areas would provide an appropriate space to conduct vessel maintenance and inspections, including mandatory bi-annual U.S. Coast Guard inspections of commercial and privately-owned vessels. The project would offer a site on Maui, rather than neighboring islands, to conduct these mandated safety inspections for large (up to 65 feet) catamarans and smaller vessels owned by individual boaters.

Vinyl coasted chain link fencing along the site's perimeter and key card access for convenience would help create a secure parking area for boats, trailers, and tow vehicles on the 1.453 acre, vacant, unimproved, barren site. Two key card operated electric gates would afford boaters 24-hour access and convenient trailer turning, ingress and egress from the facility. No price or rental period has been determined, but key cards are anticipated to be available for approximately $100 to $130 per month and are intended to help defray the facility's construction costs. The rate would be determined in consultation with DOBOR.

Landscape plantings would surround both the perimeter fencing and be planted along the edge of two grassy swales located next to the unpaved parking area and concrete maintenance pad areas. Native, drought tolerant, climate adapted Hau and Naupaka plants would provide attractive visual screening, attenuate storm water runoff and serve as a wind break .Because of its approximately 50 feet x 40 feet size, one of the two grassy swales could accommodate a shaded gathering place. The area would be allocated to boaters for a future gathering place and traditional pavilion if the boating community desired to construct a shaded gathering place. However the Applicant's proposal does not include any above ground buildings or structures beyond installation of a fence, gates, key card readers and concrete maintenance pads.

Overall, the project provides a safe, dedicated location for vessel haul out, mandated U.S. Coast Guard bi-annual inspections of commercial vessels, and boat maintenance on imperious surface while adding a stormwater drainage system to help protect nearshore waters and the environment. The fenced, unpaved parking area and two access gates provides convenient access and security for individual boat owners to store their vessel overnight or longer term.

1.2 PURPOSE OF ANALYSIS

This Environmental Assessment (EA) evaluates and summarizes the potential impacts of the proposed action. The EA evaluates alternative actions and measures that can be taken to avoid, minimize and mitigate adverse impacts to the environment. The EA has been developed pursuant to Hawaii Revised Statutes (HRS) 343 and the significance criteria provided in Hawaii Administrative Rules (HAR) 11-200. This informational document is intended to assist decision makers in determining whether the proposed action is anticipated to have a significant impact. The document describes potential adverse impacts on the environment and if such impacts can be appropriately mitigated.

The EA process offers an opportunity for input and participation by the public, stakeholders, government agencies, and nearby landowners and invites their comment and participation in decision-making. Should a Finding of No Significant Impact (FONSI) be determined by the accepting authority, additional discretionary permitting would be sought including a Conservation District Use Permit, approval of a lease of State lands to the Applicant, and ministerial permits such as building, plumbing, electrical and grading permits, where applicable.

1.3 TRIGGERS FOR ENVIRONMENTAL REVIEW

This Draft Environmental Assessment (EA) is being prepared for the Proposed Action in accordance with the State of Hawaii requirements in Chapter 343 of HRS and Chapter 200 of HAR from the Department of Health describing the contents of an EA (HAR 11-200-17).

The purpose of HRS Chapter 343 is to establish a system of environmental review to ensure that environmental concerns are given appropriate consideration in decision-making along with economic and technical considerations. Within the law are seven 'triggers' or uses that necessitate environmental review. Environmental review is required for any program or project that contains specified land uses or administrative acts, including use of State or County lands or funds other than for feasibility studies, the use of any land classified as Conservation District by State law, and the use of the shoreline setback area, among others.

The Proposed Action is subject to review under HRS Chapter 343-5(a) (1) and (2) because the site is State-owned land and it is located within the Conservation District, respectively. HAR § 11-200-6 requires that an environmental assessment be prepared for applicant actions that assesses the significance of the potential impacts of the proposed action on the existing environment. The approving agency for the EA is the Department of Land and Natural Resources (DLNR) Office of Conservation and Coastal Lands (OCCL) because they are the designated discretionary authority for approving uses within the Conservation District and on State lands.

HAR § 11-200-5(D) requires that for all proposed actions not exempt from environmental review, an EA is required that must assess the significance of the potential impacts of its action on the existing environment. The existing environment includes the physical and socio-economic environment as well as infrastructure systems and services. Potential impacts may be direct, indirect, or cumulative (HAR § 11-200-2). The EA process is intended to inform the public and decision makers, offer alternatives to the proposed action where possible, and consider the potential effects of the project and prudent mechanisms to avoid, minimize and/or mitigate adverse impacts to the environment. The EA process in not a permit in the context of a government approval of a specific action, but rather a review of whether the information provided is sufficient to make an informed decision relative to the proposed action and its effects on regulated resources.

This document presents the existing state of the environmental resources from the perspective of the preferred alternative. It presents the findings and discussion of the potential direct, indirect, or cumulative impacts the proposed action may have on existing resources and identifies any necessary mitigation measures.

Direct (or primary) impacts are those impacts that are caused by the action and occur in the same place and time. Indirect (or secondary) impacts are impacts caused by the action that are later in time or farther removed in distance, but still reasonably foreseeable. These may include impacts to land use patterns, population density or growth rate, or air, water, and other natural systems. Cumulative impacts are defined as those impacts on the environment that result from the incremental impact of the action when added to other past, present, and reasonably foreseeable future actions regardless of what agency or person undertakes such other actions. Such impacts can result from individually minor but collectively significant actions taking place over a period of time (HAR § 11-200-2).

This environmental assessment considers the affected environment, potential for environmental impacts, and proposed mitigation within a time horizon of approximately 20 years. Short-term impacts are considered within a range of a few days to a few months, relative to the time a specific action occurs. Because the proposed location is within a harbor, the region of influence is the subject property, adjacent properties and ocean waters near the subject property, unless otherwise noted.

This EA was prepared in accordance with HRS Chapter 343 and HAR Chapter 11-200 to provide sufficient information, evidence and analysis for determining whether to prepare an EIS or to issue a Finding of No Significant Impact (FONSI) pursuant to HRS Chapter 343.

1.4 PUBLIC AND GOVERNMENT AGENCY INVOLVEMENT

As part of the EA process, a 30-day public notice and comment period begins with an announcement of availability of the Draft EA in the Hawaii Office of Environmental Quality Control (OEQC) *Environmental Notice*. Copies of the Draft EA are made available at public libraries near the affected area, including the State library in Honolulu and online at http://oeqc.doh.hawaii.gov. As shown in Figure 1-1, interested parties are provided 30 days to comment on the Draft EA.

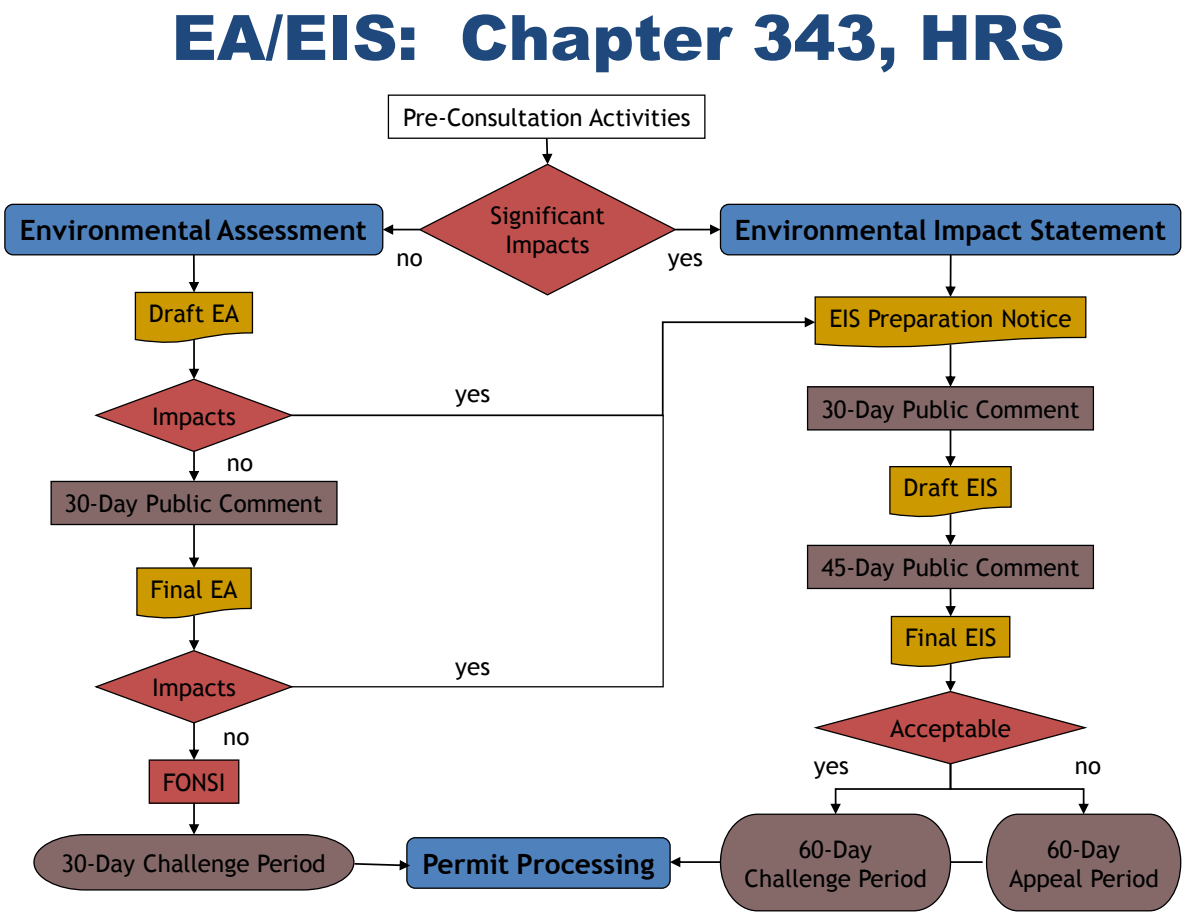

Figure 1-1: Hawaii's Environmental Review process.

Through the process of coordination for environmental planning, relevant Federal, State, and local agencies are provided copies of the Draft EA. The DLNR OCCL would distribute copies of the Draft EA to agencies and interested parties requesting them to evaluate and comment on the potential environmental impacts associated with the proposed action. Comments from agencies and the public would be addressed and subsequently incorporated into the Final EA.

The Applicant's contractor, Coastal Planners, LLC would be responsible for compiling responses to any public or government agency comments. Comments and responses would be collated and included in an Appendix of the Final EA. A Notice of Availability of the Final EA and anticipated FONSI, should it be appropriate, would be distributed in the same manner as the Draft EA.

Thereafter, the DLNR OCCL would determine whether a full Environmental Impact Statement (EIS) is needed, defer their decision pending additional itemized information, or issue a FONSI. The DLNR OCCL would report their findings to the Chairperson of the DLNR for concurrence. Should the agency issue a FONSI determination, a 30-day challenge period to the decision would begin. No action would be taken by the Applicant until the public 30-day period is complete. Thereafter, the applicant would be required to apply for discretionary and ministerial permits before any action could begin, including a Conservation District Use Permit (CDUP) approved by the Board of Land and Natural Resources (BLNR or Board) during a hearing on the matter.

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CHAPTER 2
PROJECT SITE &CHARACTERISTICS

2.1 SITE HISTORY

Kahului Harbor is located in a small open embayment on the north shore of Maui. The embayment is protected from offshore swells by two long jetties that lie nearly perpendicular to each other. The mouth of the harbor faces due north created by an opening between the two jetties. Commercial port operations are located on the eastern side of the harbor. Kahului Beach Road, Route 3400, fringes the inland mauka extent of the embayment near the mid-point of the harbor.

The town of Kahului was a hub of commercial and transportation activity in the mid-1800s. The harbor was originally constructed by the Kahului Railroad Company in 1900 to transport both passengers and freight to the harbor. The original harbor consisted of a berthing area, a dredged channel and a 400-foot long east breakwater. In 1917/1919, the U.S. Army Corps of Engineers (USACE) constructed the west breakwater to a length of 1,950 feet and in 1931, extended it to the current length of 2,315 feet (Sargent et al., 1988 in HDOT, 2014). The long western breakwater was augmented between 1960 and 1987 with an inner (bay facing) rock revetment in order to create a location to retain material dredged from the harbor. This fill created the 23 acre spit or peninsula along the west side of the harbor, referred herein as the "West Breakwater". The filled land is under the jurisdiction and ownership of the DLNR, except a navigation maintenance area where the two rock revetments come together to form the tip of the West Breakwater.

Figures 2-1 to 2-13 illustrate the West Breakwater's creation over time, DOBORs parcel, the proposed project site, DOBORs previous master plan for the site, and aerials of the West Breakwater.

There were several uses established for the West Breakwater, including a 3-acre work and storage area at the makai extent of the spit, easements for access to federal navigation aids, and easements for utilities and other purposes. In 1972, the BLNR set aside various portions of the spit. The BLNR assigned 3.7636 acres of the tip of the spit to the U.S. Army Corps of Engineers (USACE) as a work and storage area for future repairs to the breakwater. Another 20.983 acres was set aside to the DLNR Land Division as the Kahului Harbor Park for future use by Maui County. Finally, 2.451 acres was set aside for a boat-launching site under the management of the Hawaii Department of Transportation (HDOT). The site plan envisioned boat storage, car parking, boat ramp and public facilities. The delegation of facilities was memorialized in 1977 by Governor Ariyoshi who set aside the various portions of the spit by Executive Orders (ExO) #3064 and 3066.

Mayor Elmer Cravalho envisioned a regional park in the area, connecting the vacant spit to the Maui Central Park complex (i.e., Ke'Opuolani Park) located on the opposite side of Kahului Beach Road. In 1972, the Maui County Parks Department submitted a Conservation District Use Application (CDUA) to the BLNR to use the spit for a public park for beach, boating and picnic use. The County Planning Department developed landscape plans, trail routes and site plans for the parcel that included a terminal, boat trailer parking, boat launch, and boat ramp. Other improvements envisioned were picnic areas, a promenade, play grounds, tot area, parking for 90 cars, restrooms with dressing and storage areas, kite flying area, and native re-vegetation. A designated swimming area along the sandy shoreline with a floating dock with diving board platform was also envisioned.

Although the 1977 ExOs allocated the land to the County, after many attempts and extensive effort the County was unsuccessful at developing the site for a variety of reasons, including the need for an Environmental Assessment (EA) and shoreline permits. By 2004/2005and due to economic conditions, a very large homeless encampment had developed along the West Breakwater creating health and safety issues necessitating their removal by police. During that interim, responsibilities for small boat and

boating recreational facilities were transferred from HDOT to DLNR DOBOR by Act 272 and separately, the OCCL was created as a new Division of the DLNR to manage conservation lands.

In September 2006, the BLNR, with the County's consent, cancelled the ExO #3064 granting Maui County control of the site and it reverted to the DLNR OCCL. In addition, the BLNR voted to expand the site from 2.45 acres to 3.649 acres for the Kahului boat-launching ramp and/or a haul-out facility. Subsequently, in 2009 ExO #4283 reapportioned the spit with the USACE retaining 3.736 acres for staging breakwater repairs and the HDOT allocated 17.3334 acres as an addition to the Kahului Harbor for commercial harbor purposes. Simultaneously, ExO #4282 expanded the original 2.451 acre by more than the BLNR recommended and allocated a total of 6.1 acres for the boat-launching ramp site. The 6.1 acre Kahului Harbor boat-launching ramp site was placed under the jurisdiction of DOBOR for boating and ocean recreation purposes.

In 2006, the DLNR and USACE worked together to provide dredging of the entrance channel and turning basin. The work removed approximately 14,000 cubic yards of material including the large rocks and boulders that now encircle the site. The $7.5 million project demolished the former boat ramp and breakwater, and realigned the entrance channel. The project also constructed a new breakwater, added a three-lane boat launch ramp and two loading docks, and trailered parking.

In August 2009, the State constructed a new 55-foot long by 5-foot wide engineered aluminum loading dock with fiberglass grating adjacent to the existing concrete loading dock. The $379,000 project added a new concrete paved access road and new boat trailer turn around area and boat wash down area. The State has plans for the construction of more trailer boat parking stalls, electrical and lighting improvements, pavilions and a comfort station, and prefers to have a fuel service station, bait and tackle shop at some future juncture. The Small Boat Harbor is regularly used by recreational and commercial boaters and is particularly well used during fishing tournaments and canoe regattas, races and events. The Maui Fire Department and the U.S. Coast Guard also use the site to launch boats for training and ocean rescues.

2.2 OTHER FACILITIES ON MAUI

The Island of Maui has seven small boat harbors for recreational use. These facilities include: Hana Harbor and small boat ramp, Maalaea Harbor and small boat ramp, Lahaina Harbor, Mala Wharf, Kihei Boat Ramp, Maliko Gulch, and Kahului Commercial Harbor and the Kahului Small Boat Ramp. Kahului Harbor provides commercial port services along the eastern breakwater and a boat ramp on the west breakwater for recreational boaters. The Kahului small boat harbor is the only facility on Maui's north shore that offers consistent protected access to the ocean. The much smaller Maliko Gulch facility is often hampered by inclement weather, large sea swell, or heavy rains that impair the dirt road access to the site.

Of the seven recreational harbors, only Lahaina and Maalaea offer dedicated moorings for private use. Each harbor supports approximately 100 private vessels each, 40% of which are commercial vessels. U.S. Coast Guard regulations require commercial vessels that carry passengers (i.e., tour boats) to be inspected every two years. The inspection must be conducted with the vessel out of the water (i.e., dry-docked). On West Maui, Lahaina Harbor has very limited space and capacity for vessel removal and dry docking. Mala Wharf has more space but is shallow and thus limits vessels with deeper draft than the shallow harbor affords. In South Maui, the Kihei boat ramp presents similar challenges to Mala Wharf in terms of draft and there is limited space and security to leave a vessel dry docked. The Kihei Boat ramp also cannot accommodate wide vessels.

Maalaea Harbor is one of the only locations that vessels can pull out, dry dock, and be repaired and inspected. DOBOR invested considerable funds into upgrading the Harbor's facilities and amenities starting in 2005. However, even with these upgrades, wide vessels and those with deep draft cannot use the boat ramp provided. The boat ramp is simply not wide enough and the harbor itself not deep enough to accommodate many larger tour boats and private vessels. Another considerable limitation of

conducting vessel maintenance and repair activities at Maalaea Harbor is the lack of stormwater and runoff treatment facilities.

The present situation at Maalaea allows for up to six small to medium sized vessels to be dry-docked at any one time. Vessel repairs and dry dock maintenance activities are conducted in very close proximity (less than 250 feet) to the edge of the water in the harbor. Dry docked vessels are placed on the impervious (mostly asphalt with some concrete section) parking area adjacent to Buzz's Wharf restaurant. The areas around Buzz's Wharf, a now-empty restaurant, have no sub-surface catchment and treatment systems. Although Maalaea is fairly arid, when it rains accumulated dust, debris and contaminants are carried by rainwater sheet flow directly into harbor waters without filtration or treatment and can be readily transported into Maalaea Bay and the ocean. The harbor is also the home base for the U.S. Coast Guard, but the boat ramp is too small for dry docking most of the Coast Guard's fleet. Finally, Maalaea Bay is within the U.S. National Marine Humpback Whale Sanctuary, which was established to foster the education and protection of this endangered species of whale. Thus, increased use of Maalaea Harbor for dry dock vessel repair and maintenance activities could contravene efforts to improve the ecological health of whale sanctuary waters. For these reasons, an alternative site is needed.

2.3 PURPOSE & NEED

A portion of the West Breakwater of the Kahului Harbor has been granted to DLNR- DOBOR. The site has long been slated for uses that support recreational boating including a boat ramp, parking, storage, and wash down areas. Recent site improvements by DOBOR have included some of these facilities, such as a new boat ramp, new docks, driveway access, parking and trailered parking, ice vending services, and dredging and aligning the channel to the boat ramp.

Presently, the boating public has to drive their trailered vessel to Kahului or Maalaea in order to use the small boat harbor facility and must leave their vehicles and trailer unattended. Upon return from an ocean excursion, boaters must move their trailered vessel to a private location using Maui's highways, roads and/or streets. Recreational boaters must also find a privately-owned location to store and house their vessel, or as is sometimes the case, park along the edge of neighborhood streets causing a safety hazard. The lack of a secure parking and storage site at the DOBOR facility creates an unnecessary inconvenience for the boating public, increases risk of roadway accidents, particularly for those transiting from Kula and upcountry, increases the likelihood of break-ins and theft of trucks and trailers left unattended while conducting ocean boating activities, and reduces the time vessel owners can spend recreating in their boat upon ocean waters. Additionally, there are instances where public street parking for cars and private yard space adjacent to public streets are being used for overnight and/or long-term parking of trailered boats.

The 2013 Ocean Resource Management Plan, the 2007 Kahului Harbor Master Plan for 2030, the 2002 Maui County Kahului-Wailuku Community Plan, House Concurrent Resolution 163 enacted by the 21st State Legislature in 2002 and other State and local planning documents have identified the site and a number of recreational boating needs on Maui's north shore and shortfalls in recreational boating services in Maui. In particular, there is a severe shortage of secure vessel parking for trailered boats and there are no dedicated boat inspection and/or maintenance facilities for wide or deep draft vessels on Maui.

Inspections, repairs and regular commercial tour vessel maintenance are normally conducted during the fall or spring. Typically, a vessel's hull is dried and sanded to remove unwanted growth and contaminants that slow the vessel's speed and create drag. Fiberglass may be applied to the hull to repair thinning, worn or rough portions or to patch holes. Anti-fouling paint is applied to the submerged portion of the vessel using rollers, given the paint's viscosity. Repaired areas may also require painting, which is done with a pneumatic spray gun and low-level volatile organic carbon (VOC) paint. Low VOC paints are preferred, and would be used in this case, as they produce considerably less fumes and over-spray, and reduce the amount of paint used to complete the job. Because the aforementioned activities have the ability to produce dust, fumes and odor, best practices and standard operating procedures are prudent. Wind tends to disperse, diffuse and diminish the concentration of any airborne particulates generated from these

activities. Additionally, wind breaks and buffering tend to increase air turbulence and the infusion of fresh air which increases dispersion and reduces concentrations in the air column.

Commercial catamarans and large vessels must transit to Oahu or Honokohau Harbor on the Kona Coast, Island of Hawaiian order to obtain mandatory U.S. Coast Guard inspections at least every two years, and to conduct dry maintenance of these vessels as they are too large to be removed from the water at Maui's other harbors. This adds expense to private and commercial boating operations, reduces the operational period due to the time to transit vessels between islands, displaces crew and staff, and increases danger for the vessel and crew when crossing the channels and large, open ocean waters between islands. The crews that operate these vessels may be unnecessarily jeopardized by these seafaring trips due to a lack of inspection and maintenance facilities on the Island of Maui. The Maui County Fire Department and the U.S. Coast Guard may also face similar constraints and dilemma in servicing their larger vessels.

Five Maui-based commercial vessel operators have formed a consortium; The Maui Dry Dock and Storage, LLC (MDDS). The consortium members operate catamarans and large vessels of 50 to 65 feet in length for maintenance and inspections. Presently, the Maalaea Small Boat Harbor is the only location on Maui that provides a vessel haul out and repair facility. However, the Maalaea site is too small to accommodate dry docking or hau lout of the MDDS boats given vessel beam and depth limitations.

As a result, the MDDS is interested in collaborating with DOBOR to establish a secure area for vessel inspections and short-term maintenance and a secure area for public boaters to store their watercraft on Maui. The result would yield benefits to both the MDDS and to the boating public by having a secure, convenient location to park and store boats. Furthermore, the proposed facility would provide the boating public with an impervious surface area for vessel inspections and maintenance that is served by a suitable storm water treatment system to capture and stabilize potential pollutants in an environmentally sensitive manner. In contrast, Maalaea has minimal stormwater retention or treatment and vessel repairs are conducted in very close proximity (less than 200 feet) from the waters edge in the harbor.

Planning for development of the overall harbor has involved many stakeholder and public meetings, including those hosted by the HDOT Harbors Division. During the Kahului Commercial Harbor 2025 and 2030 Master Plan updates, stakeholders stressed the need to expand harbor facilities while balancing recreational uses such as surfing, fishing, outrigger canoe racing, and subsistence gathering. It was well recognized that Kahului Harbor is used for recreation as well as commerce, and solutions must be developed that allow the two to co-exist.

The public-private partnership between MDDS and DOBOR would benefit boating recreationists and the public by meeting needs that have previously been identified for fishermen and recreational boaters. The proposed use of the currently vacant, unimproved site is in concert with the DOBOR Master Plan for the West Breakwater and the 2013 Ocean Resource Management Plan. The proposal would also provide commercial vessel operators, including the MDDS, with services presently not available on Maui and only available on neighboring islands, thereby enhancing local economic welfare and boater safety. In addition, providing a controlled area for vessel maintenance and inspections would benefit both private and commercial boaters.

The site is well suited to serve as a vessel maintenance and storage facility capable of serving the diversity of the boating community on Maui and neighboring islands of Molokai and Lanai. The site is in close proximity to the DOBOR boat ramp within the protected harbor, adjacent commercial port and industrial uses, a deep water channel to the open ocean, and a 4-lane highway specifically designed with pocket lanes for the ingress and egress of trucks pulling trailered vessel.

The proposed improvements would help minimize potential negative impacts to the environment from vessel maintenance and maritime activities by directing these actions to controlled, impervious areas with proper drainage and treatment systems. Having a centralized controlled location would ensure that sediment, stormwater runoff, and any potential water or airborne contaminants are captured, treated and

stabilized onsite and would prevent them from entering the nearshore waters. The drainage system was designed by Otomo Engineering, Inc. to accommodate twice the amount of runoff created by a 50-year, one-hour storm event.

The consortium is committed to managing the leased area with utmost sensitivity to environmental concerns and has consulted with other harbor users to address the boating community's needs. The site would have 24-hour key card access to accommodate the range of ocean recreational users at the small boat harbor. Fees for the key cards have not yet been determined, but would likely range between $100 to $150 for a month-long rental depending on vessel size and other parameters. The fee collected is primarily intended to defray a portion of the consortium's capital expenditure on the areas improvement. There would be no restriction on the public's use of the facility with key cards, save that best practices are fully implemented during facility use to ensure user safety and protect the natural environment.

For the reasons describe above, adding a secure parking and storage area for trailered vessels would be beneficial to the boating public and commercial boating operators. In addition, providing a controlled area for vessel maintenance and inspections would be beneficial to both private and commercial boaters, and reduce the potential for adverse impacts to the environment by directing vessel maintenance activities to an impervious surface area that provides stormwater treatment to protect water quality.

Figures 2-1 through 2-20 illustrate the West Breakwater, project site, previous State plans, and suggest that additional trailered vessel parking may be needed on Maui. Specifically, Figures 2-1 to 2-13 illustrate the harbor and the project site's characteristics. The figures identify the West Breakwater (Figure 2-1), harbor uses (Figure 2-2), the West Breakwater's creation over time (Figures 2-3 to 2-6). DOBOR's property boundary's and the project area (Figures 2-7 and 2-8) are shown, as well as the State's previous master plan for the Small Boat Harbor (Figure 2-9). Figures 2-10 through 2-13 provide recent aerial views of the West Breakwater and the footprint of the DOBOR small boat facility within the landscape.

Figures 2-14 to 2-20 suggest that there may not be sufficient, suitable trailered vessel parking in central and north Maui. Private boat parking in, or adjacent to, public roadways could be the result of not having sufficient, affordable parking options for boats and tow vehicles. This may be creating unintended effects on public uses or private properties. These current examples reflect that there may be a need for secure, safe, trailered vessel parking location that does not obstruct roadway traffic, hinder line of site for automobile drives, or hinder pedestrian movement.

2.4 PROJECT LOCATION

The project is proposed on a portion of State of Hawaii owned lands at the Kahului Boat Ramp at Kahului Harbor, Owa, Wailuku, Maui, Tax Map Key:(2)3-7-001:023andPor.21. The 1.453 acre project site consists of unimproved, vacant land within DOBORs 6.1 acre Kahului small boat harbor facility along the West Breakwater of the Kahului Harbor. Dimensions of the project site and its footprint are 452 feet long by 140 feet wide, or 63,280 square feet, located inland of the boat ramp and paved driveway access to the small boat harbor's existing amenities.

2.5 SITE CHARACTERISTICS

Slope: Flat, level, unpaved, unimproved vacant and barren open area with an elevation of eight (8) feet asl.

Access: The site is presently accessed in an unhindered, uncontrolled manner from and through the harbor facility.

Harbor Access: The harbor facility is accessed via Kahului Beach Road. The State roadway has dedicated turnout and pocket lanes designed to accommodate safe ingress and egress of vehicles towing trailered vessels.

Utilities: Underground potable water and electric utility lines service the adjacent boat ramp and wash down area. The Applicant would be responsible for connecting to the existing utility lines and providing any sub-metering. No wastewater or sewer lines are present. Provisions for portable toilets would be the responsibility of the Applicant.

Legal access: Access to the boat harbor is via Kahului Beach Road. Access to the subject property is unconstrained and not encumbered by any easement or restriction.

Subdivision: The property is not proposed for subdivision and would involve the lease of a 1.453 acre portion of the existing 6.1 acre DOBOR property established by Executive Order #4282.

Encumbrances: Encumbered by Executive Order #4282 on May 15, 2009 to DOBOR for the "Kahului Harbor Boat Launching Ramp Site".

Harbor Boat Ramp: A double-wide boat ramp completed in 2006 is designed for wide vessels to be hauled out by trailer and is the only boat ramp on the Island of Maui designed to accommodate vessels larger than 55 feet in length.

2.6 SURROUNDING USES

There are a variety of users and uses of the West Breakwater, the shoreline, boat ramp, and waters of the harbor. Several of the more significant uses are described below and their location shown in Figure 2-2.

Food Vending. Presently, various food-vendor trucks use the wide berm along the makai side of Kahului Beach Road on a day-to-day basis for commercial activities such as serving lunch and selling fresh caught fish and fruits. The vendors leave at the end of the day and are not believed to have permits to operate on DOBOR or State property.

Ice Vending. A large ice-dispenser commissary is located on the corner of the DOBOR parcel. The private commercial ice service is important for fishermen and was permitted as part of the boat ramp improvements. The facility clearly provides an important public purpose that is directly related to DOBOR responsibility for the site and the agency's objectives.

Hale Kiawe. Mayor Alan Arakawa, the present mayor of Maui County, granted a small area makai of the boat ramp along the eastern side of the harbor to a club of retirees. The Senior Boaters Club was granted permission to build the Hale Kiawe clubhouse along the West Breakwater. They moved into the Hale in mid-2006 and have improved the area around it with landscaping and several picnic tables under shade trees. The club had previously occupied state land closer to the boat ramp for 25 years. The club has about 70 members, most of whom are retired, and they fish in the harbor from the boulder revetment adjacent to the clubhouse, primarily for papio and ulua. Although small, the group has long-standing ties to the area. Their enclosed building offers respite from the arid, windy surroundings, a restroom and eating areas, among other amenities.

Fishing. Fishing is a common activity at the harbor and a fish catch reporting station is located next to the DOBOR Boat-Ramp. There are three designated fishing areas within the harbor. Area 1 is located between Piers 1 and 2 on the eastern side of the harbor. Since 9-11, Area 1 has incorporated a security zone, which is highly restricted for fishing or other recreational activities. Area 2 is located between Pier 2 and the extension of Pu'unēnē Avenue on the eastern side of the harbor. Area 3 is located along the inner edge of the Western Breakwater extending to the shoreline along Kahului Beach Road. Fresh water springs can be found in the corner of the harbor near the DOBOR boat-launch ramp and mullet congregate there to feed on seaweed.

Pole fishing and throw nets are allowed and these activities commonly occur along the shoreline, from rock structures and piers. Spear fishing for tako is also common on the shallow reef in the harbor, however the water quality is generally poorer than other areas, particularly at the intersection of Kaahumanu Avenue and Kahului Beach Road.

Commercial fishing occurs within the harbor with permission from the Maui District Managers office. Commercial fishers use surround nets, usually on the east side around Piers 1 and 2, although lay nets and gill nets are illegal to use in the harbor. Recreational boaters fish outside the harbor, mostly at several fish aggregation devices (FADs) offshore of Haiku. Given the considerable exposure of the north shore to strong trade winds, trolling for fish is not favorable.

Gathering. Some nearshore collection of limu and other marine life occurs primarily along the shoreline adjacent to Kahului Beach Road within the harbor. The Maui Ocean Center also has a permit to collect aquarium fish and marine life through the bay. Some aquarium enthusiasts collect sand from specific locations in the harbor believing it has enhanced qualities that are better for their aquarium specimens.

Maui Trailer Boat Club (MTBC). Each year, the MTBC puts on two fishing tournaments. Both tournaments use the DOBOR boat-launch ramp for the event. The MTBC is a volunteer organization and actively engaged in promoting recreational boating activities.

Swimming. Most swimming occurs at Hoalaoha beach on the east side of the harbor. However, given the consistent trade winds and murky, turbid water, swimming is not particularly popular in the harbor. Furthermore, water quality is poor within the harbor itself.

Kayaking. Kayaking in the harbor is one of several water sports activities practiced by residents and ocean enthusiasts. Few embayment's on the north shore offer the relative protection from large waves, swell and strong currents for kayaking that the harbor does. However, the water is generally murky and of poor quality, diminishing the attractiveness of the area for kayak use.

Surfing. There are frequently good waves for traditional surfing on the west side of the harbor, both outside the breakwater and within the confines of the harbor. The area can become congested on weekends when multiple ocean recreationalists are using the harbor for different activities.

Stand Up Paddling. Similar to surfing, stand up paddling (SUP) is growing in popularity. Because of their longer view horizon, SUPs can catch smaller waves and catch waves earlier than most traditional surfers. As a result, conflicts between SUPs and other surfers are not infrequent. The DOBOR boat ramp offers a good location for putting in and taking out SUP boards, thereby making it more attractive for this activity, particularly when strong winds do not favor other areas of the north shore for the activity.

Outrigger Canoeing. Canoe paddling including individual, group and team are significant users of the harbor. Three canoe clubs use Kahului Harbor for practice, cultural strengthening, and hosting canoe race events including: Hawaiian Canoe Club, Na Kai Ewalu, and Lae'ula O Kai. In general, pre-season runs from early March until mid-May, regatta season runs from June to late July, and long distance races run from August to late October. The Hawaiian Canoe Club has regular competitions within the harbor and has weekly, if not daily, practices and activities during season, including outreach and team programs for high-school aged students. Their Hale is located along the sandy beach on the opposite side of the harbor from the DOBOR boat ramp. The Club has over 100 members, many of whom are active in the community. Longer races such as the Maliko Gulch to the Kahului Harbor run often require trailered chase boats for safety and event logistic purposes.

Maui Central Park Complex. Keopuolani Regional Park is the largest park in Maui with 110 acres that include seven playing fields, a pool, a gym, skate park, and amphitheater. The park is next door to the Maui Arts and Cultural Centre, which has a number of open-air events such as evening concerts. The War Memorial Complex is also located within the regional park and hosts the annual Maui County Fair. The YMCA, Maui Girls and Boys Clubs, and skate board park are located in buildings adjacent to the War Memorial Complex. The county park has a number of sports and playgrounds located across, and down-wind of the proposed lease area on the Western Breakwater. The soccer and other sports fields of the park complex are well used for after-school sports activities from fall to spring, and various clubs and leagues throughout the year.

Neighboring Developments. Other neighborhoods and points of interest near the harbor include (from north and west to south and east):

- low-rise commercial and residential areas;
- the Harbor Lights condominium complex, with approximately 350 units overlooking the harbor;
- recreation fields and the Maui Arts and Culture Center;
- Maui Community College, which serves approximately 2,900 students and180 faculty;
- two low-rise hotels along the waterfront, with a total of approximately 380 rooms;
- Hoaloha Park, with recreational facilities for the canoe clubs that practice in the harbor;
- three retail centers inland of Ka‘ahumanu Avenue and a bank, an automobile dealer’s lot, and two older buildings leased to multiple tenants on the seaward side of the road in the vicinity of the harbor; and
- an industrial area adjacent to the harbor, with harbor-related operations and warehouses.

2.7 DISCRETIONARY PERMITTING

A Conservation District Use Permit (CDUP) could be required because the proposed action occurs within the State Conservation District. Uses within the Conservation District are regulated by the DLNR OCCL pursuant to HRS Chapter 183C and HAR 13-5. The rules require an analysis of coastal hazards and potential impacts Indigenous Hawaiian customs, access and rights, and potential effects on natural and public trust resources, among other considerations. Should a FONSI, be approved for the project, approval of a CDUP would be sought from the DLNR OCCL with approval of the Board (BLNR)through a public hearing and public participation process. Thereafter, ministerial permits such as County building, plumbing, electric, and grading approvals would be sought, where applicable.

2.8 PROJECT COST & TIMELINE

Should a FONSI and CDUP be granted County ministerial approvals such as minor grading, trenching and electrical permits would be sought and are anticipated to take four to six (4-6) months. Construction is anticipated to take six (6) months. The total development time is anticipated to take one to two years. Construction of the project is estimated to cost approximately $425,000

Figure 2-1: The approximately 27 acre Kahului West Breakwater and DOBOR boat ramp.

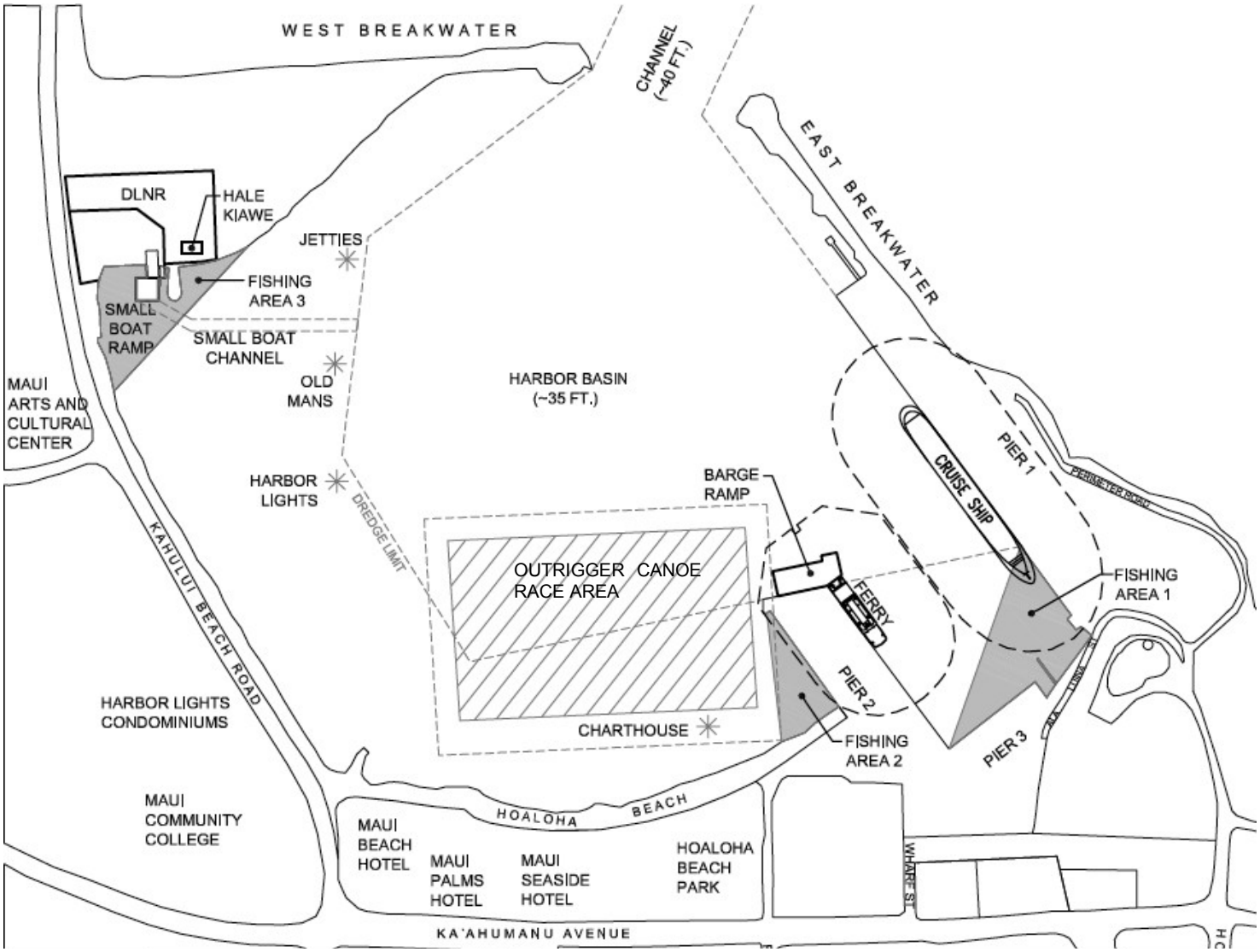

Figure 2-2: Recreational uses at the Kahului Harbor.

Source: HDOT, 2017 page 5-53

Figure 2-3: West Breakwater, Kahului Harbor, 1960.

Figure 2-4: West Breakwater, Kahului Harbor, 1975.

Figure 2-5: West Breakwater, Kahului Harbor, 1987.

Figure 2-6: West Breakwater, Kahului Harbor, 1997.

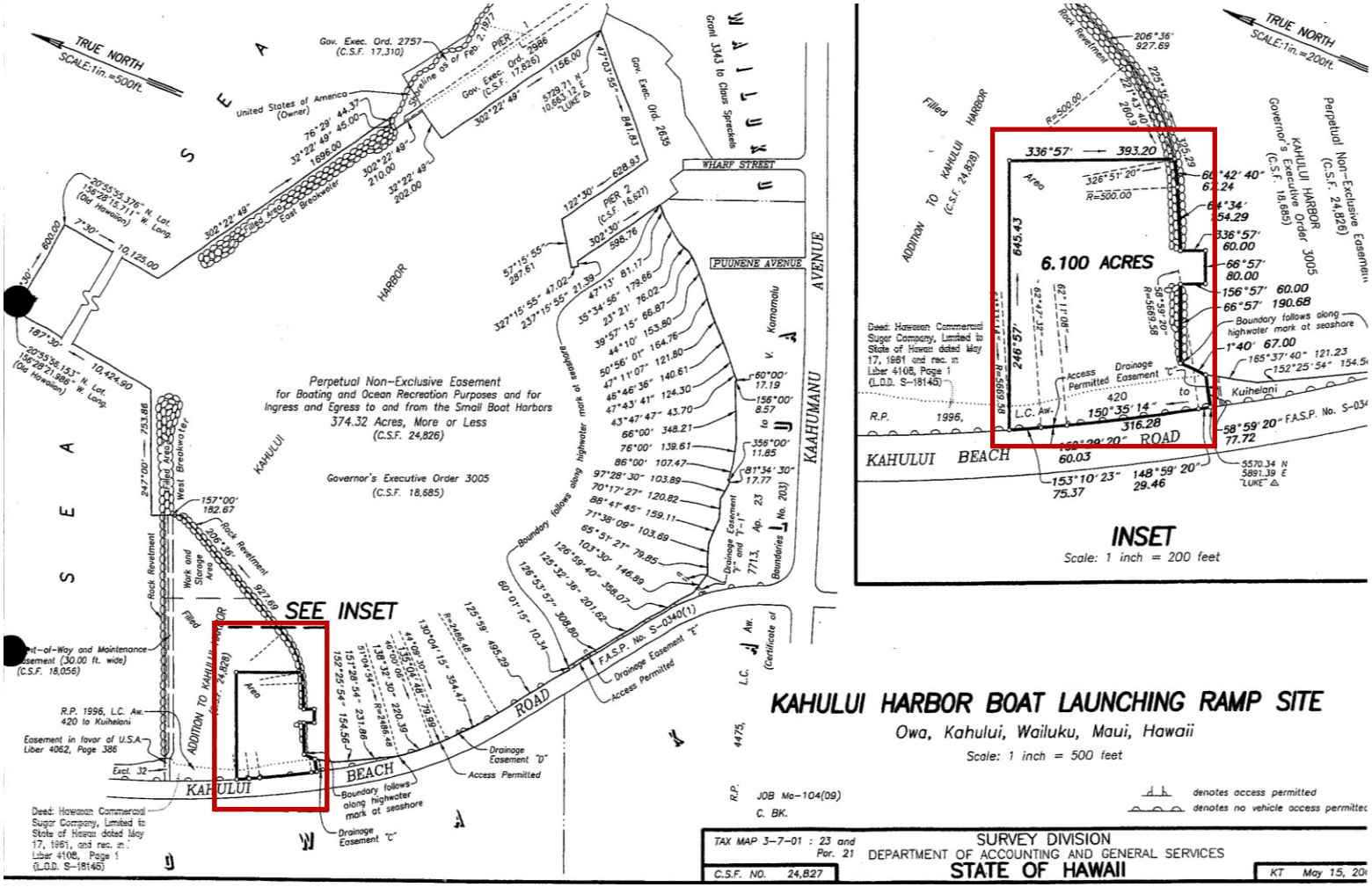

Figure 2-7: Property location on the West Breakwater.

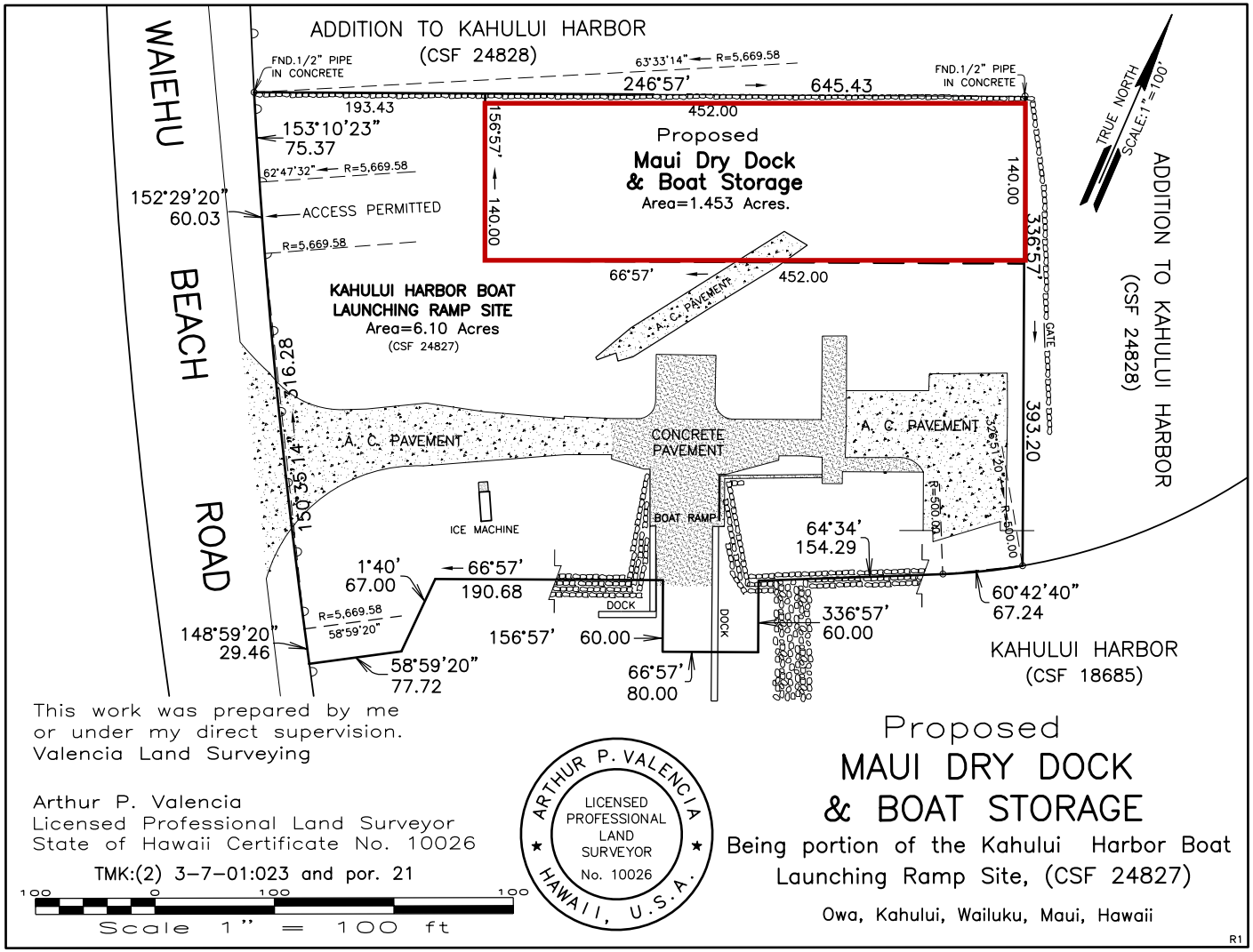

Figure 2-8: Survey of the 452 feet long, 140 feet wide, 1.453 acre project area.

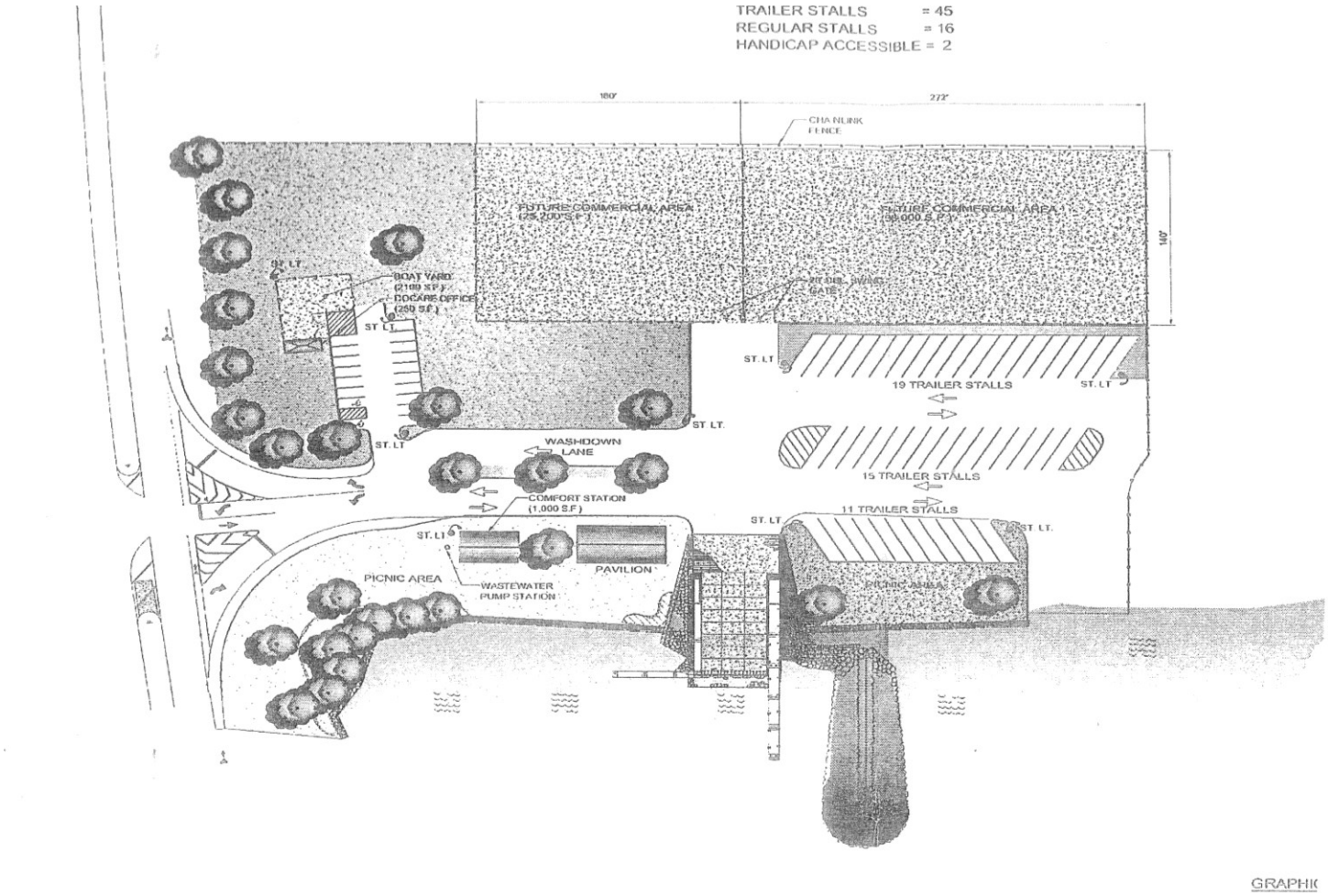

Figure 2-9: DOBOR's master plan for the Kahului Small Boat Harbor.

Figure 2-10: Aerial view of the West Breakwater and DOBOR parcel facing east.

Figure 2-11: Aerial view of the West Breakwater and DOBOR parcel facing west.

Figure 2-12: Aerial view of the West Breakwater and DOBOR parcel facing north.

Figure 2-13: Aerial view of the West Breakwater and DOBOR parcel facing south.

Figure 2-14: Some private trailered vessels park adjacent to public streets in Maui.

Figure 2-15: Street side boat parking may hinder safe pedestrian access and vehicular line of sight.

Figure 2-16: Street side boat parking impact pedestrian routes and reduce vehicular line of sight.

Figure 2-17: Lack of rental space may crowd out other residential uses in Maui.

Figure 2-18: Private trailered vessel parking may reduce the supply of vehicle parking areas in Maui, HI.

Figure 2-19: Public allocations for vehicle parking may inadvertently be impacted by private trailered vessel parking in Maui.

Figure 2-20: Vehicle parking spots may be impacted by private trailered vessel parking in Maui.

CHAPTER 3
ALTERNATIVES ANALYSIS

3.1 PROJECT DESCRIPTION

The Applicant proposes to build a secure, trailered vessel parking facility and two maintenance and inspection pads with an attendant stormwater treatment system as described in the preferred alternative below.

3.2 NO ACTION ALTERNATIVE

Under the no action alternative the vacant unimproved area would remain as-is. Boats would temporarily and intermittently be dry docked for vessel maintenance and inspections at the West Breakwater with the permission and at the discretion of the Kahului Harbor Master. This ad hoc use would allow for limited maintenance and vessel inspections to occur in the corner of the DOBOR parcel. Most commercial catamarans and larger private vessels would continue to sail to neighbor islands to obtain mandated U.S. Coast Guard inspections and/or maintenance of their vessel. These vessel owners would continue to incur the costs and increased danger associated with transiting vessels and paying laborers on neighboring islands.

Authorized vessel maintenance would continue to be conducted on the open, porous, barren West Breakwater without the benefit of a dedicated storm and runoff water catchment and treatment system. Presently, tarps are placed below vessels to capture any potential dust, dirt or debris and these materials must be swept up and disposed of in a suitable fashion to prevent them from becoming wind blown pollution or contaminating near shore water quality.

The site would continue to lack security and unattended boats and their trailers parked at the facility would continue to be at risk of theft, vandalism, and malicious damage. After ocean recreation activities are completed, vessels are towed by trailer to private parking or storage sites using Kahului Beach Road, among other roadways. Currently, vessels are not routinely left overnight. Additional trips of tow vehicle, trailer and vessel, to and from the small boat harbor, are necessary when undertaking boating activities on consecutive days, such as during weekend or holiday canoe races or fishing tournaments. As a result, trailer traffic on Kahului Beach Road could become congested during these events.

Given the lack of dedicated boat storage facilities on the north shore of Maui, individual boaters spend time and effort transiting vessels, as opposed to being in the water, and this situation would continue under the no action alternative.

Views and scenery at the project site would continue to be dominated by a flat, barren area within the overall windswept landscape of the harbor. Views to the west of the project site include sparsely vegetated dredge spoil mounds, whereas views of Maui's mountains and the commercial harbor exist to the east and south. These views, the landscape and the scenery at the project site, would remain unchanged.

Parking at the boat harbor is random and this would continue under the no action alternative. After launching their boats, trucks with trailers generally cluster together inland of the boat ramp facing west towards the vacant, 153 feet wide portion of the DOBOR lot. Some tow vehicles use the vacant area to pull forward, make a wide arc, and circle back towards the boat ramp to tow their vessel out of the water at the harbor's floating docks.

Figures 3-1 to 3-5 illustrate current uses of the project area, DOBOR lot, and small boat harbor that would continue under the no action alternative.

Figure 3-1: Large trailered catamaran undergoing maintenance and inspection on site.

Figure 3-2: Dry docked large trailered catamaran on site.

Figure 3-3: Dry docked large trailered catamaran on site.

Figure 3-4: Dry docked large trailered catamaran on site.

Figure 3-5: Visual of a large dry docked trailered catamaran with the landscape.

3.3 CONSTRUCT TWO CONCRETE PADS WITH LANDSCAPED SECURITY FENCING (PREFERRED)

The preferred alternative would construct two concrete pads dedicated to vessel maintenance and inspection. The pads would be served by a subsurface storm and runoff water catchment and treatment system. One pad would be used for conducting inspection and maintenance of large vessels, whereas the second pad would be dedicated for day–to-day public use for smaller watercraft.

This alternative would reduce potential adverse impacts to the environment by directing vessel maintenance activities to a central location with an impervious surface area that provides treatment of storm and runoff water to protect nearshore water quality. This aspect of protecting water quality is currently not present at the Maalaea, Kihei, or Lahaina harbors. Of two vegetated swales designed to capture runoff from the parking area and maintenance pads, the larger would be fringed with Naupaka to serve as a break and could accommodate a future ,traditional, open air, pole hale pavilion in the event the boating community wanted to construct a shaded gathering place..

This preferred alternative would include the installation of security fencing surrounded by landscape plantings of Naupaka and hau shrubs to break the wind, enhance security and visually enhance the currently barren area. The fencing would create an enclosed, secure parking area with a porous surface that would accommodate at least 20 trailered vessels. The parking stalls would be accessible to the public using an electronic key card available for purchase at a nominal fee. The key card would operate a gate to enter or leave the secure site 24 hours a day at the convenience of individual boaters. Access to the site would be provided by two gates, allowing ease of ingress/egress for towing vehicles and trailers.

Irrigation and electric would be trenched to the site from the existing utility connections (Figure 3-6). The figure also illustrates an example of a subsurface drainage system to capture, stabilize and treat stormwater. The stormwater system shown is not sized for this application, but rather an example for informational purposes.

Figure 3-7 illustrates the preferred alternative. The figure is an overlay of the proposed improvements onto an aerial photograph of the site as it presently exists.

3.3.1 Project Sequencing

The proposed action would be constructed using an erosion control plan and other best management practices according to the following sequential activities:

1. Installation of sub-metered, underground water and electrical lines to the site.
2. Installation of a stormwater catchment and treatment system for the concrete pads consisting of two inlet filter screens with absorbent socks, leading to a 40 foot long, 2.5 foot diameter perforated pipe wrapped in geotextile fabric and surrounded by gravel.
3. Creation of two vegetated areas that would capture runoff and have inlets leading to the subsurface stormwater treatment system. A small vegetated \ retention basin would be located between the small and larger concrete pads. A large vegetated swale would be located between the larger concrete pad and the boat trailer parking area. Both vegetated swales would be bordered by Naupaka and the larger designed to accommodate shade from mature vegetation.
4. Installation of drip irrigation lines for the initial propagation of landscape plantings of Hau and Naupaka shrubs within a buffer 6 feet wide along and within the perimeter of the 1.453 acre site. Creation of two grassy swales, with part of The swales have grated inlets leading to the subsurface drainage treatment system. The landscaping would provide vegetative screening, capture and attenuate storm water, add a security barrier, and serve as a wind break.
5. Installation of a chain link fence 6 to 7 feet high along the 1,136 feet perimeter of the site but within the aforementioned vegetative barrier. The fence would consist of vinyl coated galvanized wire with greater than 50% flow through and metal fence posts of sufficient size and anchored depth to retain the fence in an upright position.
6. Installation of a 30 foot wide gate, comprised of at least two (2) electrically-powered rolling gates and

appurtenant entry apparatus, such as a card reader and small motor to move the gates, for secure access to the site at the convenience of boaters. The arrangement of the two gates would facilitate ease of ingress and egress for vehicles towing trailered boats. During regattas and fishing tournaments, the two gates could remain open to facilitate more efficient towed vessel movement.

7. Installation of a gate and fencing between the 20+ trailered vessel parking area and the large vessel concrete maintenance and inspection area.
8. Pouring of two concrete pads. A small, 30 feet wide by 49 -feet long (1,470 sf) concrete pad would facilitate use by individual boaters at their convenience. A second large concrete pad would facilitate dry boat maintenance and safety inspections of large vessels, including commercial catamarans. The pad would be 8 inches thick, 94 feet wide by 128 feet long (12,032 sf). Given the site's flat topography, no grading is anticipated however minor ground preparations may be necessary to accommodate the two concrete maintenance area pads.

3.3.2 Requirements for Facility Use

Users of the facility would be required to implement specific practices to minimize potential impacts on other users of the harbor and neighboring properties. All boat owners and facility users must agree in writing to adhere to the following practices and standards of safe operation:

1. Safety is the number one priority and this should guide the conduct of all facility users, boat owners and crew.
2. Work shall be conducted on the concrete area to avoid containment of debris. Worksite is to be clean and orderly at all times. Geotextile screening cloths and/or tarps must be used around and under the vessel to capture normal sanding, scraping debris and paint droplets, as well as screws, nails, and other solid materials. Area under and around the boat is to be swept up daily. All fiberglass dust and paint fragments are to be swept up immediately to avoid water runoff.
3. All sanders must have shop-vacs or vacuums attached at all times. Use vacuum sanders or grind on concrete areas only and in tarp or barrier enclosures.
4. Storage of open containers such as oil, thinners, paint or fuel is prohibited.
5. Avoid pressure washing except when located on the impervious concrete pad area. Running water is prohibited in the dry dock area. Washing, rinsing, filling of water tanks and wet sandblasting activities will not be allowed. However, water will be available for emergencies (i.e. emergency eye wash).
6. Spray painting will only be permitted if the vessel is located on the concrete area and is completely surrounded by a barrier which will contain the paint aerosol. Use a containment (tarp) barrier when painting. Use high volume low pressure painting equipment to minimize any overspray and contain the area with tarps. Use brushes and rollers for painting (roll &tip technique). Do not paint on extremely windy days.
7. Grinding and/or sanding may only occur on the concrete areas. Owners/Users will be required to erect a screen or drop curtain to prevent the spread of any excessive dust from their work areas to other dry dock or parking areas.
8. Boats will not be launched until worksite is completely cleaned.
9. There shall be no haul-outs on weekends or during fishing tournaments. All dates must be communicated to the Maui Trailer Boat Club and must not interfere will Kahului Harbor day use. Appropriate cones and markers must be in place while towing a vessel on and off the launch ramp.
10. Minimize working times to 7 am to 7 pm
11. Use a company like Unitek Supply to contain and dispose of any oils, waste, or chemicals etc. used.
12. Use, provide and service portable restrooms at the site.

3.3.3 Timing of Facility Use

The large concrete pad could accommodate two boats at a time. All commercial vessels are required to be inspected every two years by the U.S. Coast Guard. Normally, maintenance and inspection takes about one week to complete and commercial operators usually conduct these activities between May and June

(8 weeks), or between September and the 2nd week of December (15 weeks). Consequently, if all 84 commercial vessels on Maui used the facility for their U.S. Coast Guard inspection, the large pad could serve 42 boats per year, two boats at a time, equating to 21 weeks of use annually. The large concrete pad is envisioned to be used primarily during the fall and spring when weather and business conditions favor removing commercial boats from active service. Furthermore, during canoe regattas, races, and fishing tournaments high use of the DOBOR boat ramp is common and while vessels may be parked on the large pad, maintenance work on the vessels would be scheduled to avoid these high use periods.

This alternative meets the purpose and needs previously identified for the small boat harbor. For this reason, the alternative is carried forward as the preferred alternative in this analysis.

Figure 3-6: Existing site utility connections, plus an example of a stormwater treatment system.

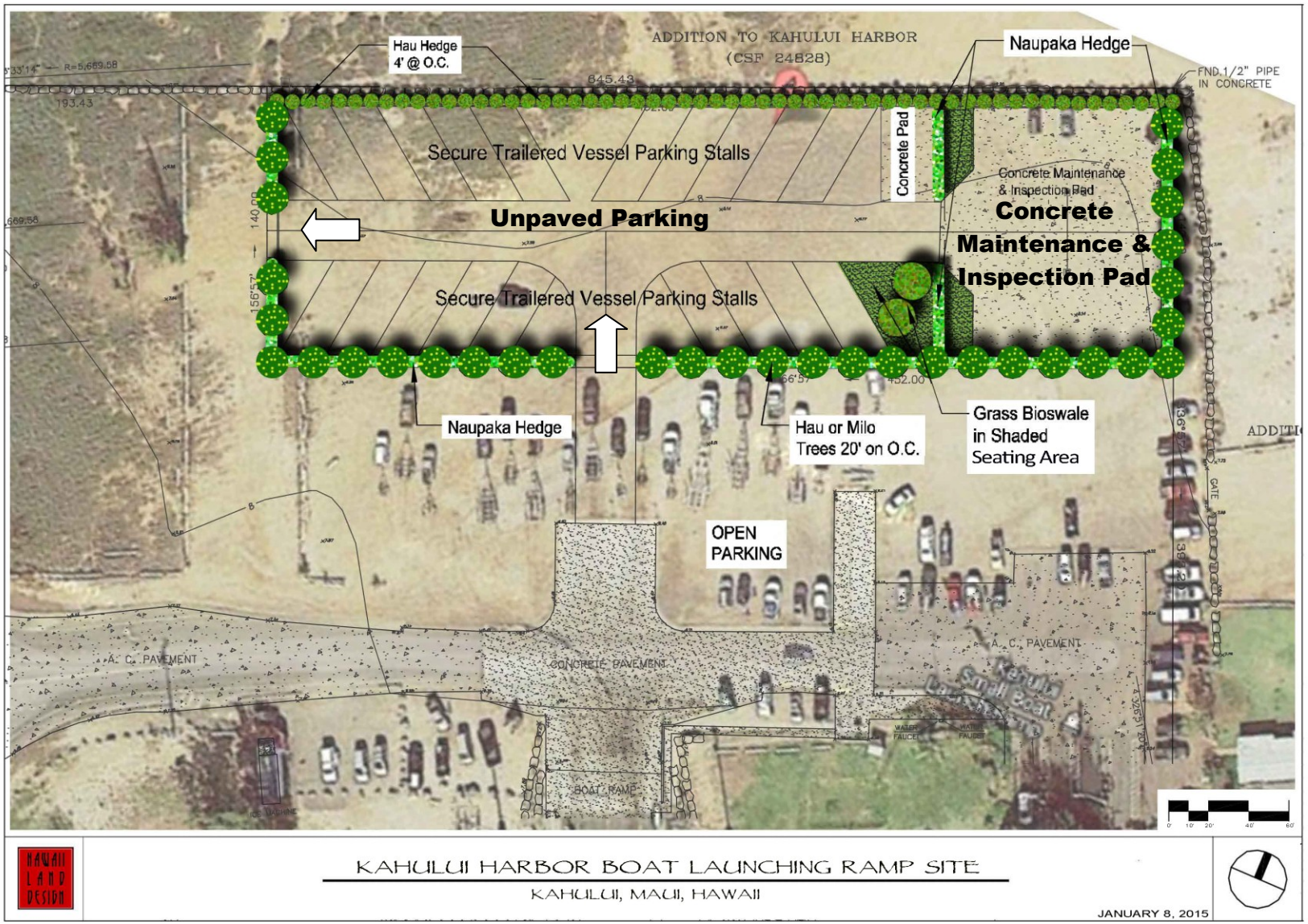

Figure 3-7: Proposed unpaved enclosed parking, entrance, exit, two inspection pads, and landscaping.

3.4 INSTALL SECURITY FENCING WITHOUT IMPERVIOUS SURFACE AREAS

This alternative would provide the benefit of having a secure trailered vessel parking, maintenance and inspection area in close proximity to the DOBOR small boat harbor ramp. However, without concrete pads (i.e., impervious surface areas) to conduct vessel maintenance activities upon, dust, debris and potential contaminants could percolate into the soils. These materials could enter harbor waters given the site's highly porous soils, or be transported by runoff to nearshore waters during rainstorms. Sweeping up and disposing of dust, debris and loose materials would be more difficult on the irregular surface of the rough ground or tarp than a smooth, flat concrete pad.

Construction of the alternative would cost less than the preferred alternative. However, the alternative does not incorporate structural mitigation into its design that would help protect nearshore water quality. As a result, this alternative does not meet the purpose and need for the project. For this reason, the alternative is not carried forward in this analysis.

3.5 CONSTRUCT INSPECTION PADS WITHOUT FENCING

This alternative would provide the benefit of having a dedicated maintenance and inspection area in close proximity to the DOBOR small boat harbor ramp. However, without security fencing, the potential for damage, vandalism or theft of personal vehicles, equipment or vessels left at the site would remain. From a practical standpoint, the general public may inadvertently leave their vehicle parked unattended on the concrete pad thus hampering use of the pad for its intended purposes. For this reason, the alternative presents logistical challenges in terms of practical operations of a maintenance and inspection facility.

Without fencing and/or landscaping along the site's perimeter, dust and debris could be carried downwind by the gusty prevailing winds on the West Breakwater when conducting maintenance activities. The release of airborne contaminants or windblown litter and debris could potentially adversely affect drivers on Kahului Beach Road or users of Keopuolani Park. Construction of the alternative would cost less than the preferred alternative. However, the alternative does not incorporate structural mitigation into its design to protect air quality. The alternative lacks a means of capturing dust and debris, and dispersing potential airborne contaminants that may result from vessel maintenance activities. As a result, this alternative does not meet the purpose and need for the project. For this reason, the alternative is not carried forward in this analysis.

3.6 CONSTRUCT A FULL SERVICE FACILITY

The applicant could propose to construct a facility that offers a range of services and amenities for the small boat harbor. Services such as a fueling station bait and tackles shop, DLNR Enforcement offices, specialty repair of boat engines and water craft assembly shops could be beneficial to the boating public. However, these services would require significant capital expenditures to build and such services would require a number of supporting studies, considerable input from the boating community, and a wide variety of government approvals. Such a proposal would also require integration, coordination, and collaboration with long-term planning efforts, like the 2030 Plan for the Kahului Commercial Harbor's east breakwater operated by HDOT. The 2030 Plan acknowledges that the DOBOR parcel is intended to support recreational boating.

Construction of a full service facility is well beyond the financial resources of the applicant and exceeds the scope of the proposed action in terms of size, breadth, and land area used. Such a proposal would have the potential for much greater effects on the environment than the preferred alternative. For these reasons this alternative is not carried forward in this analysis.

3.7 REPURPOSE MAALAEA HARBOR TO SERVE LARGE CATAMARANS

With the recent closure of Buzz's Wharf restaurant at Maalaea, its building and surrounding parking area could be repurposed to serve the maintenance and inspection needs of large vessels such as catamarans.

To accomplish this, the existing boat ramp would have to be widened considerably. The length of the boat ramp would probably have to be extended to accommodate the rise and angle necessary to tow these longer vessels out of the water. The harbor, or at least the area fronting the boat ramp, would have to be dredged to accommodate the deeper draft common on larger vessels. Parking and vehicle travel lanes through the harbor would have to be reoriented to accommodate the wider turning arc required of large trailered vessels. The present boat maintenance area is located down a steep hillside and below the Honoapiilani Highway. Since the highway is located less than 200 feet inland of the existing boat ramp and relocating the highway is impracticable, the boat ramp would most likely have to be relocated elsewhere in the marina.

Figures 3-8 to 3-13 show the current situation at Maalaea Harbor's dry dock facilities, the boat ramp, and its constrains. Figure 3-12 shows vessel maintenance on an impervious surface area that lacks any stormwater catchment or treatment. Figure 3-13 shows an unattended van occupying one of the few elongated parking stalls dedicated for tow trucks and trailers.

Presently there are six elongated angled parking stalls to the north of the boat ramp that are designed for use by tow vehicles and trailers only. However, the stalls are sometimes inappropriately occupied by unattended cars, thereby removing the stalls from use by boaters. Since the site configuration would make it difficult to secure these stalls with fencing or a gate, additional parking areas would be required to accommodate tow vehicles and boat trailers if the harbor vessel maintenance services were expanded.

DOBOR recently spent millions of dollars to improve Maalaea Harbor and increase the harbor's capacity to support commercial and recreational boating. The improvements included repaving and strengthening travel lanes and parking stalls, electrical upgrades for boat slips, sewage pump out facilities, a new comfort station, ferry terminal upgrades at the end of the south mole revetment, a new sewage treatment package plant, and a new parking area to accommodate the influx of tourists that take whale watching and sunset cruises from the harbor. The plans for the harbor upgrades went through a lengthy public review and discussion process around 2005 to 2007. While improvements were made to the existing vessel dry dock area, they did not result in widening the small boat ramp for various reasons, among them were constraints and limits of the harbor's configuration. Repurposing Maalaea Harbor may offer viable opportunities in the future, however in recognition that this alternative has been previously vetted and evaluated and did not result in expanding the existing boat ramp, its usefulness in serving as an alternative to the proposed action is diminished and thus not carried forward in this analysis.

Figure 3-8: Aerial of the 1.453 acre improvement area overlaid with existing uses.

Figure 3-9: Aerial of the 1.453 acre improvement area overlaid with existing uses.

Figure 3-10: Aerial of the 1.453 acre improvement area overlaid with existing uses.

Figure 3-11: Aerial of the 1.453 acre improvement area overlaid with existing uses.

Figure 3-12: Aerial of the 1.453 acre improvement area overlaid with existing uses.

Figure 3-13: Aerial of the 1.453 acre improvement area overlaid with existing uses.

3.8 CREATE A NEIGHBORHOOD PARK ON THE WEST BREAKWATER

As described in Section 2.1, Site History, former Mayor Elmer Cravalho envisioned a regional park in the area, connecting the vacant spit to the Maui Central Park complex (i.e., Ke'Opuolani Park) located on the opposite side of Kahului Beach Road. In 1972, the Maui County Parks Department submitted a Conservation District Use Application (CDUA) to the BLNR to use the spit for a public park for beach, boating and picnic use. The County Planning Department developed landscape plans, trail routes and site plans for the parcel that included a terminal, boat trailer parking, boat launch, and boat ramp. Other improvements envisioned were picnic areas, a promenade, play grounds, tot (keiki) area, parking for 90 cars, restrooms with dressing and storage areas, kite flying area, and native re-vegetation. A swimming area was to be designated in the southwestern corner of the harbor, seaward of the sandy shoreline fronting Kahului Beach Road, and was proposed to have a floating dock with diving board platform.

After many attempts and effort, the County was unsuccessful in developing the Park. This stemmed from a variety of reasons, including the need for an Environmental Assessment (EA), CDUA, and shoreline permits. Another challenge was the amount of irrigation needed to establish and maintain vegetation for Park use given the site's poor soils and high exposure to salt-spray and winds. Yet the Park plan centered around the idea of a public boat ramp with various amenities to support recreational boating activities. In this context, the Park alternative incorporated the basic premise of the need for safe trailer vessel parking and maintenance areas and sought to address this need, as does the preferred alternative.

The scale of a Park alternative would be considerably larger than the proposed action and would necessitate an evaluation of many other types of uses and their potential impacts. However, a core function of a Park, based on past experience, would be to promote recreational boating and offer supporting infrastructure and services. The preferred alternative similarly seeks to address recreational boating needs, but within a smaller portion of the land area dedicated to that purpose. Furthermore, the proposed action does not extend into the surrounding lands that could be used for a public park. As such, a comparison of the Park alternative to the preferred alternative is not carried forward in this environmental assessment.

3.9 SUMMARY

The no action alternative serves as a baseline by which to compare the other alternatives. The alternative is commensurate with existing conditions at the site in this analysis. In contrast, the "Preferred Alternative" is to construct a secure parking facility for trailered vessels with two impervious surface areas for vessel maintenance and inspections, as previously described. Based on the discussion of other alternatives, the preferred alternative is carried forward in this analysis of impacts and compared to the

CHAPTER 4
PHYSICAL ENVIRONMENT

4.1 CLIMATE

4.1.1 Existing Conditions

The climate in Maui ranges from the wet forest in Hana to the dry lands of Makena. The Island has a range of micro-climates that vary depending on the terrain and elevation. An abundance of sunshine and comfortable temperatures predominate year round. Trade winds blow from the northeast80% of the time moderating temperatures and humidity to a relatively comfortable zone for human habitation. Maui's overall climate is relatively uniform year-round given its tropical latitude and position relative to storm tracts and the surrounding ocean influence. Average temperatures at the nearby Kahului Airport range from 67.4 to 83.8 degrees Fahrenheit, with September being the hottest month (Maui County, 2012).

Average rainfall varies considerably from 81 inches a year in Hana to 30 inches at the West Maui Airport. The Iao Valley, inland of Kahului within the West Maui mountains, is one of the wettest places in the State, however the harbor and its surrounds are relatively dry owing to its low lying coastal orientation and the constancy of the prevailing trade winds from the north.

4.1.2 Potential Impacts and Mitigation Measures

No specific mitigation measures are proposed and no adverse effects are anticipated.

4.2 TOPOGRAPHY & SOILS

4.2.1 Existing Conditions

The West Breakwater is composed of dredged marine sediments and fill. The area was created from the spoils from dredging the harbor and consists in large part of coral fragments and crushed coralline material with minimal soil overburden. As such, it is highly porous and infiltration capacity is high, but its capacity for vegetative growth is constrained by a lack of terrigenous organic materials and exposure to prevailing coastal trade winds and salt spray.

The topography of the West Breakwater ranges from sea level to 20 feet high and is mostly flat except for gradual rises to higher mounds of fill along the west side and tip of the breakwater. Figure 4-1 is a 1-foot contour map with the 8 foot asl. elevation contour line noted. The figure indicates that the project site is almost entirely flat.

The natural bottom of the western part of the harbor slopes gently downward except for dredged areas. The deepest part of the harbor is 35 feet deep in the turning basin.

4.2.2 Potential Impacts and Mitigation Measures

During construction BMPs would be implemented and there would be minimal to no change in topography. No adverse impacts are anticipated.

4.3 HYDROLOGY

4.3.1 Existing Conditions

Inland and to the far west of the harbor and West Breakwater, Iao Valley is one of the wettest places in Hawaii. The valley drains from the west Maui Mountains through the heavily channelized Iao Stream into coastal waters along the north shore. Heavy rains in the valley can bring mud, sediment, debris and large boulders and rocks into nearshore waters, especially near Waihee. River flooding occasionally occurs in nearby Wailuku and Kahului Streams that drain into the north shore. The streams are located nearly a mile to the northwest of the subject property and therefore would have nominal influence on the hydrology of the harbor’s embayment.

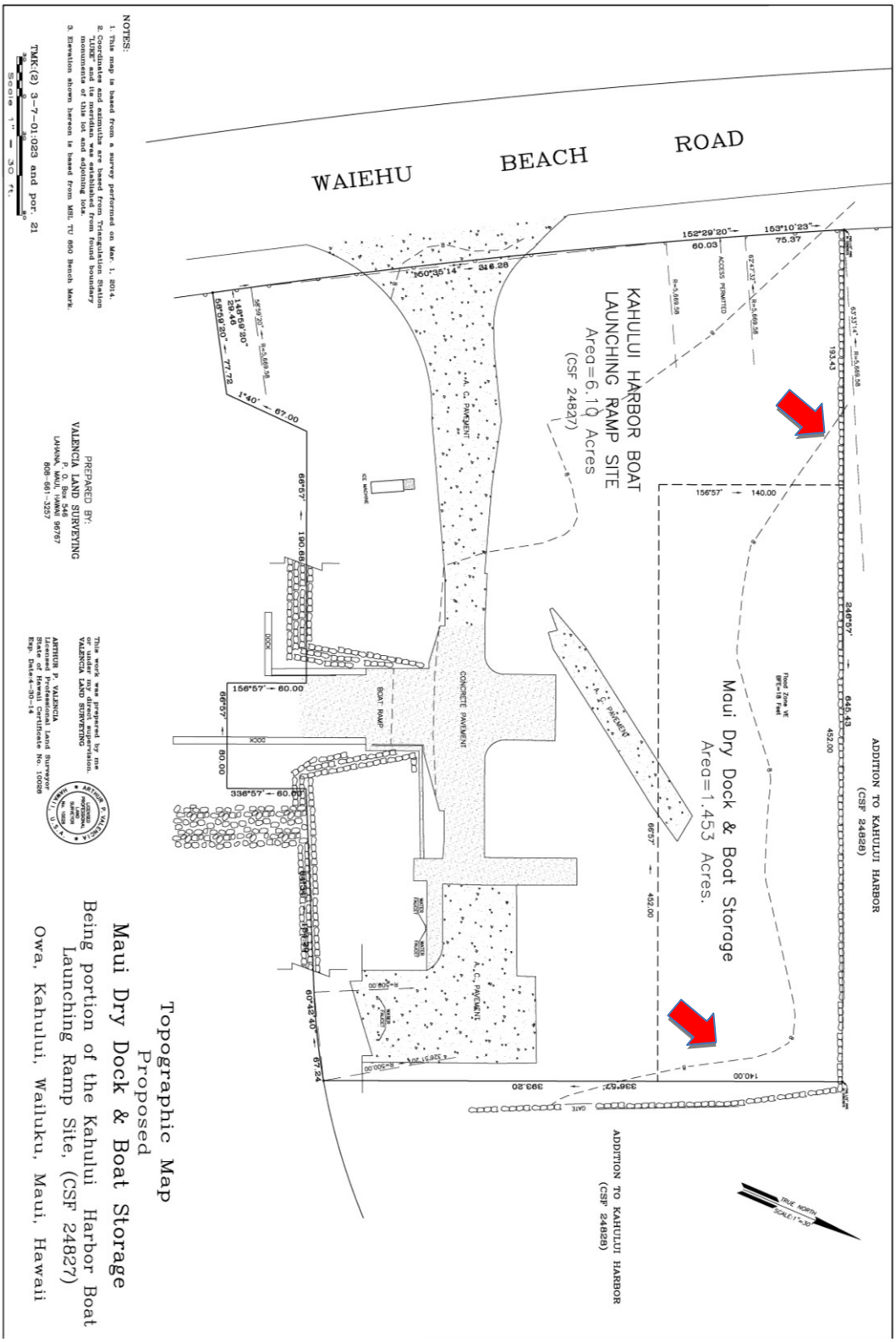

Figure 4-1: The site's flat topography is noted by the 8 foot elevation contour line.

Historically, several seeps were located along the eastern edge of the West Breakwater. These seeps bring freshwater to mix with seawater creating favorable conditions for certain species of fish. Freshwater inputs from up-gradient sources also serve wetlands such as the Kanaha Pond about ½-mile to the northeast of the Kahului Harbor. However, the subject property and Western Breakwater exhibit no wetlands or low-lying areas in which water may pool or remain standing after rain events. Storm and rainwater percolates quickly into the dredged fill over most of the area. Within developed portions of the subject property, rainwater flows to the ocean from impervious surface areas such as the boat ramp, vessel wash-down area, access road and paved portions of the parking lot.

4.3.2 Potential Impacts and Mitigation Measures

No changes in the parcels hydrology are proposed and no adverse impacts are anticipated.

4.4 NEARSHORE WATER QUALITY

4.4.1 Existing Conditions

The Hawaii Department of Heath (HDOH) classifies state waters as either inland or marine waters (HAR 11-54-2). The classification scheme relates to regulatory protections and does not reflect the actual quality of the water body. Marine waters are classified as "A" or "AA". The majority of ocean waters off of Maui's shorelines are listed as Class AA waters by the HDOH.

The objective of Class AA waters is that these waters remain in their natural pristine state as nearly as possible with an absolute minimum of pollution or alteration of water quality from any human-caused source or action (HDOH, 2011). These areas may not be degraded by the addition of specific point sources of water pollution without obtaining a National Pollution Discharge Elimination System (NPDES) permit. Overall, the purpose of the NPDES is to ensure that anthropogenic inputs do not exceed the natural assimilative capacity of the environment.

In contrast to Class AA, Class A waters are regulated for recreational purposes and aesthetic enjoyment. Any use compatible with the protection of fish, shellfish and wildlife and their propagation, as well as recreation or aesthetic activities is acceptable. Class A waters should not serve as receiving waters for untreated discharges.

The marine waters within the Kahului Harbor are designated as Class A marine waters and its waters have been listed as impaired due primarily to nutrient loads and turbidity (Ziermann, 2003).A 2003 water quality assessment determined that dissolved oxygen and pH levels in the harbor were typical of nearshore marine waters. Dissolved oxygen ranged from 6.0 to 4.8 milligrams per liter and 90% oxygen saturation compared to HDOH minimum standards of 75% saturation as stated in HAR 11-54-6 (Ziermann, 2003). Salinity was low, especially near the shoreline, given the freshwater inputs such as the seeps. Turbidity was high near the shoreline and lower within the harbor's bay, and may exceed water quality standards particularly during stormwater events.

OceanIT Laboratories Inc. (OceanIT, 2014) conducted benthic and water quality surveys within the harbor on October 5, 2010. The survey transects started at the waterline and extended 150 feet into the bay near the shoreline fronting Kahului Beach Road. Nearshore salinity was slightly lower (31-32 ppt) than open ocean salinity (35 ppt) due to freshwater inflow from groundwater seeps and stormwater. Turbidity, which is a measure of water clarity, was lowest adjacent to the existing revetment and the center of the shoreline that is comprised of bolder/cobble where it fringes Kahului Beach Road. However, turbidity increased rapidly near the west end of the beach where erosion is occurring and sediment is entering the water column. Flotsam and plastic debris were observed within the nearshore waters. The substrate at the shoreline progressed from sand, gravel and cobble in the 0-50 foot zone to a flat bottom beyond 50 feet where the space between rocks were filled with rubble or sand (OcenIT, 2014).

Anthropogenic inputs that can degrade water quality include sediment, fertilizers, pesticides, herbicides, oil and metals, trash and debris. Sediment from barren ground, over fertilized areas and organic waste can be captured by overland flows of stormwater, leading to pollution of nearshore waters. These types of nonpoint source pollution are among the major contributors to impaired water

quality in Hawaii (HDOH, 2000). Inappropriate application of fertilizer and chemical treatments to grassy maintained areas can contribute to nearshore algal growth (DAR, 2004). Pesticides and herbicides that are toxic to benthic organisms can wash off treated areas during rain events and enter the nearshore environment. Fecal matter from untreated and/or inappropriately treated human wastewater can also adversely affect marine environments and increase public health risks (Vermeij, 2008). Unrestricted or uncontrolled feral ungulates and vermin can also significantly contribute to the amount of sediment liberated or fecal matter available to be released by rainstorms and sheet flow. Combined, these forms of nonpoint pollution can degrade coastal water quality ultimately contributing to algal blooms, degraded coral reefs, and reduced fisheries (DAR, 2007).

A significant amount of commercial and industrial harbor activity occurs on the opposite side of the harbor from the subject property. Stormwater discharges from industrial activities or uses can degrade nearshore water quality if not properly treated. The HDOH can require routine testing, monitoring and reporting through a NPDES General Permit where industrial storm water discharges are authorized. Permits such as these are authorized by the HDOH pursuant to HAR 11-55, Appendix B and may require a Stormwater Pollution Control Plan, Spill Prevention Plan, and water quality monitoring of representative storm event(s) to determine if any contaminants are polluting ground or nearshore water sources. Typically, the level and intensity of monitoring decreases if contaminants are not found during testing or are shown to be captured, treated and stabilized and not causing degradation of nearshore or groundwater.

4.4.2 Potential Impacts and Mitigation Measures

During construction, a suite of government-approved best management practices (BMPs)would be implemented to control erosion and diminish potential water pollution. BMPs can help avoid or reduce the potential for adverse impacts to nearshore water quality. The use of silt fences, absorbent geo-tubes, and watering of barren areas or stockpiled soils to reduce the potential for wind-blown deposition, would be implemented during ground altering activities to reduce the potential for adverse impacts or the release of sediment into coastal waters. Minimizing ground altering during the rainy season is also a means to reduce the potential for sediment inputs to the nearshore environment. An erosion control plan would be fully implemented during ground-altering and construction activities to ensure protection of the nearshore environment. The Maui County Department of Public Works would review any BMPs and erosion control plans when processing applications for minor grading, utility trenching, or pouring of the two concrete pads to ensure sufficiency and protection of nearshore water quality.

Additionally, the use of climate-adapted, drought-tolerant and locally adapted plant species in the proposed action's landscape plans would reduce the need for pesticides, herbicides and fertilizer thereby avoiding potential impacts to nearshore waters and benthic organisms.

The proposed action includes the installation of a sub-surface drainage system with filter inlets to capture, retain, treat and stabilize storm and rainwater runoff from the project site's two proposed impervious surface areas. This helps avoid, minimize and mitigate potential adverse impacts to nearshore water quality, especially waters within the harbor, by re-directing stormwater to an adequately sized and designed drainage system located well inland of the shoreline area.

The project would fully implement BMPs both during construction and operation to help preserve water quality and reduce the potential for adverse impacts to nearshore waters and benthos. As such, no adverse impacts are anticipated.

4.5 PROTECTED SPECIES

4.5.1 Existing Conditions

The subject property is comprised of dredged fill material and native flora and fauna are generally absent. **Table 4-1** lists threatened, endangered, or rare species, or species of special concern found in Maui's coastal environment. There are no rare, threatened or endangered species on the subject parcel.

Table 4-1. Threatened and endangered species in Maui's coastal environment

T	Sea turtle, green (*Chelonia mydas*)
E	Sea turtle, hawksbill (*Eretmochelys imbricata*)
E	Sea turtle, leatherback (*Dermochelys coriacea*)
T	Sea turtle, loggerhead (*Caretta caretta*)
E	Seal, Hawaiian monk (*Monachus schauinslandi*)
E	Stilt, Hawaiian (Himantopus mexicanus knudseni)
E	Whale, humpback (*Megaptera novaeangliae*)

T = Threatened; E = Endangered

Rare and protected species can sometimes be observed offshore seasonally as transient species. However, there are no haul out or breeding grounds for Hawaiian monk seals, loggerhead or green turtles on the subject property. While occasional transient use of nearby oceanic waters by protected species such as humpback whales is not uncommon, the property itself does not exhibit habitat that would be suitable for these species.

The sandy beach along Kahului Beach Road and adjacent to the property has no recent record of its use by a protected species. The beach is not known for harboring protected species or marine life and is probably insufficient in size, orientation and quality to offer suitable habitat for these species.

The nearest wetland is the Kanaha Pond Wildlife Sanctuary, located about ½-mile to the northeast of the Kahului Harbor eastern breakwater and commercial port where Hawaiian black-necked stilt or ae'o (*Himantopus mexicanus knudseni*) are commonly observed. Wedge-tailed shearwater or 'ua'ukani (*Puffinuspacificus*) are not known to be located in the vicinity and the site does not present sandy escarpments preferred by the species for nesting purposes (DAR, 2005). These protected species are not commonly observed in this portion of harbor, as there is no habitat which they prefer. There are also no wetlands, intermittent or perennial streams, gulches, or critical habitat found on the subject property. There are fresh water seeps near the corner of the Harbor where the beach intersects with the Western Breakwater that attracts mullet and other fish species.

4.5.2 Potential Impacts and Mitigation Measures

No mitigation measures are proposed and no adverse impacts are anticipated.

4.6 MARINE BENTHOS

4.6.1 Existing Conditions

As stated in the Kahului Commercial Harbor 2030 Master Plan, (HDOT, 2007) the reef habitats outside of the West Breakwater are substantially different than those observed off the East Breakwater. Most of the bottom cover off the West Breakwater consists of sand, with the exception of an area of raised hard-bottom. Benthic cover of the platform consists almost entirely of the soft bodied zooanthids *Palythoa* spp.and *Zooanthus* spp. These "soft corals" are very abundant comprising up to 90 percent of bottom cover as opposed to stony corals that were found on 5 to 10 percent of the bottom cover. Stony corals were primarily of the species *Porites lobata, Pocillopora meandrina, Montipora patula* and *M. capitata*. The dominant algae in the area were various encrusting red calcareous species including *Pneophyllum sp*., and *Hydrolithon spp*. Similar to the outer East Breakwater, macro-invertebrates were very sparse, limited to rarely occurring burrowing urchin *Echinometra mathaei*.

In contrast to the open sea, the inner edge of the West Breakwater is composed of basaltic boulders that extend to the shallow, un-dredged harbor floor. Within the intertidal range, the boulders are covered with calcareous encrusting algae, patches of the red alga *Hypnea sp*., and the green alga *Chaetomorpha antennina*. Unlike the inner East Breakwater, where man-made structures are nearly completely colonized by coral, the submerged boulder surfaces on the inner side of the West Breakwater are mostly barren. The predominant colonizers are isolated heads of the hemispherical branching coral *Pocillopora damicornis* and *P. meandrina*, small plates of *Montipora spp*., and soft zooanthids *Palythoa and Zooanthus*. Sea urchins, particularly *Echinothrix diadema* and *Tripneustes gratilla*, were common on the boulder surfaces of the inner West Breakwater.

Common endemic species observed in the near shore tidal marine environment included: nerite snail or pipipi *(Nerita picea)*; black purse shells *(Isognomon californicum)*; and ʻopihi *(Cellanaexarta)*. Other commonly observed species included: the hook weed *(Hypnea musciformis)*; limu ʻakiʻaki *(Ahnfeltiopsisconcinna)*; *Hydrolithon onkodes*; and False ʻopihi *(Siphonaria normalis)*. *ʻAʻama* crab (*Grapsus tenuicrustatus*) was abundant on the boulders that armor the shoreline.

Shoreline areas outside of the harbor generally have minimal marine biota due to the absence of large boulders. These areas are exposed to ocean waves, which move the cobbles and substratum, preventing marine biota growth. However, driftwood is commonly found along this shoreline

4.6.2 Potential Impacts and Mitigation Measures

During construction activities, BMPs would be fully implemented such as the use of silt and debris fencing to ensure no pollution or sediment enters nearshore waters. Grading and ground-altering activities would occur during dry periods and ground work would be halted during inclement weather. An erosion control plan, to County standards, would be fully implemented. During operations of the facility, users of the facility would have to comply with a suite of specific BMPs that have been developed. Furthermore, a sub-surface drainage system is proposed that would capture, treat, and stabilize any potential water-borne contaminants in order to protect nearshore water quality and marine benthos. The use of locally adapted plants for landscaping avoids the need to use chemical fertilizers and pesticides and further reduces the potential for adverse impacts to nearshore water quality or the aquatic species living within it. With the implementation of BMPs and mitigation measures, no adverse impacts to benthic organisms are anticipated.

4.7 FLORA, FAUNA & INVASIVE SPECIES

4.7.1 Existing Conditions

Studies conducted as part of the 2025 Master Plan EA and the 2002 USACE EA of the West Break water characterized the existing flora as consisting of a scattering of trees, ground plants, shrubs and weeds. These included a mix of introduced and native species, such as beach naupaka, Bermuda grass, and tree heliotrope. Few faunal resources were identified in prior documents; some migratory birds such as wandering tattler (*Heteroscelus incanus*)and ruddy turnstone (*Arenaria interpres*) were identified on the West Breakwater. Rodents and feral ungulates are not known to populate or inhabit the project site, given that it is barren, absent of any food sources and lacks refuge for predator avoidance. However, within the subject parcel feral cats congregate near the picnic tables adjacent to the boat ramp with regularity.

Surveys of the eastern commercial harbor in 2003 found that Piers 1 and 2 supported a number of invasive marine species, particularly algae. The surveys identified individuals of 38 invasive and 11 cryptogenic species at Pier 1, and 31 introduced and 12 cryptogenic at Pier 2 (Coles, etal., 2004). Maui County occasionally collects macro algae that collects along the shoreline and places this green debris at a drying site on the West Breakwater in preparation for its final disposal.

4.7.2 Potential Impacts and Mitigation Measures

The proposed action could encourage the growth or propagation of invasive species, except as described in the Landscaping Plan which would use drought tolerant, climate-adapted plant species. During ground-altering and construction activities, BMPs for rodent and vector control would be fully

implemented. Care would be taken to ensure that construction wastes are handled, stored and disposed of properly so as to avoid creating habitat or areas that would attract and/or harbor rodents and other vectors or pest species. During operations, any stockpiled materials would be maintained and minimized to control the potential accumulation of areas favored by rodents and other invasive species. As a result, no adverse impacts are anticipated.

4.8 LANDSCAPING

4.8.1 Existing Conditions

Current vegetation in the project area is minimal. The West Breakwater is subject to near continuous strong trade winds blowing from offshore, across the vacant parcel, and landward from a northeast to southwest direction.

4.8.2 Potential Impacts and Mitigation Measures

A chain link fence is proposed to encircle the perimeter of the project site. The fence would provide security while allowing wind to pass through the barrier. As a consequence, a windbreak would be beneficial and would help prevent dust, dirt, debris and odor from impacting downwind areas or uses. The amount of area protected from the wind by a wind break is a function of the height of windbreak or barrier. To accommodate these needs, the proposal includes landscape plantings along the perimeter of the project site, as well as around the grassy swales within the project site.

Because the soil is poor and the area exposed to high winds, drip irrigation would initially be needed to establish landscaped plants and few species of vegetation would be successful given the sites exposure, poor soils and climate. However, a hedge row of Naupaka interspersed with Hau could serve as a functional windbreak and barrier. A 4-foot wide by 8-foot high hedge row could likely be established within 18 months of its planting. Naupaka could also form an attractive barrier between the taller Hau. Both species are drought tolerant and climate-adapted and require minimal maintenance once established with drip irrigation. Together, the Hau and Naupaka planting could serve as an attractive windbreak, provide visual screening, prevent dust from escaping into the larger grassy swale area and help secure the parking and vessel inspection and maintenance facility.

With the implementation of the landscape planting plan, no adverse impacts are anticipated.

Figure 4-2: Examples of Naupaka (left) and Hau (right) used in the landscape plan.

4.9 AIR QUALITY

4.9.1 Existing Conditions

Ambient air quality refers to the purity of the general outdoor atmosphere. Ambient air quality is regulated under the Clean Air Act. The U.S. Environmental Protection Agency (EPA) established National Ambient Air Quality Standards for six criteria pollutants as a measure of ambient air quality.

These six criteria pollutants include carbon monoxide, nitrogen dioxide, sulfur dioxide, lead, ozone and particulate matter ($PM_{2.5}$ and PM_{10}).Particulate matter is measured in microns and the subscripts 2.5 and 10 represent microns in aerodynamic diameter. The HDOH Clean Air Branch implements the program and monitors ambient air quality at 14 monitoring stations across the State. There is one monitoring station on Maui. Located in Kihei, the station monitors particulate matter due to agricultural activity and cane burning. In addition to these standards, County zoning addresses other forms of air quality. The zoning allows light manufacturing and processing facilities to emit minor emissions of odors, fumes, noise, vibrations, or glare from activities such as small craft assembly plants.

Salt spray from the ocean also influences air quality, particularly in close proximity to the sea. VOG, a word combining "volcanic" and "smog", can affect Maui as a result of volcanic activity on the Island of Hawaii. Exposure to VOG is greater on Maui's south and eastern shores than the north shore where the project is proposed given prevailing wind direction and proximity to the neighboring island. These are natural sources of air quality impairment and are not a result of the proposed action.

Fumes and odor are distinct forms of air quality because they are characterized by two levels of reception; detection and recognition (Mendes, 2013). The recognition of an odor may be instantaneous or continuous, the latter having the potential to become a nuisance, even if it was initially a pleasant experience. Odor is significantly diminished by turbulence, which comes from the mixing of fresh air with the source of the smell. Odors are more quickly dispersed and diluted when outside air mixes with the plume. Odors travel further downwind from their source when mixing is weak, wind speeds are low, and the evenings cool and clear. Odor disperses quickly when mixing is strong, wind speeds are high, and sunshine predominates. With light to moderate wind speeds of less than 13 mph, the amount of heating or cooling of the earth's surface is the primary factor in dispersion of odor (Douglas, Hamilton and Carlson, 2013). Dispersion is greatest during the day and, for a given wind speed, increases with the amount of solar radiation. Another factor in dispersing odor is the roughness of the terrain (Pope and Diosey, 2000). Increasing roughness with obstacles such as hills, trees, vegetative barriers and buildings increases dispersion and reduces detection.

Overall, air quality along Maui's northern shores is excellent given the lack of point sources and consistent trade winds that disburse air pollution. Stationary sources of pollution in the vicinity of the subject property include sugar cane mill operations at Puʻunēnē, the County's Kahului wastewater treatment facility, industrial activities within central Kahului, and operations of the commercial harbor. Intermittent and transient sources of air pollution come from the burning of cane fields, especially those in Paia upwind of Kahului. However, most air pollution comes from vehicle exhaust from nearby roadways that are heavily used during commuting hours, such as the Hana Highway and Kahului Beach Road. Air quality at the site is well within acceptable levels and standards set by HDOH and Hawaii's ambient air quality is considered to one of the best in the country (HDOT, 2014).

The West Breakwater is exposed to prevailing trade winds that blow from offshore throughout the majority of the year. These winds are frequently gusty at the project site. Solar radiation is high throughout most of the year contributing to air turbulence. Dust and dirt from barren land can become air borne and carried landward by the strong winds. The prevailing winds blow inland from the project site towards Kahului Beach Road and Ke'opuolani Park. The frequent wind gusts and turbulence tend to dispel, disperse and displace airborne contaminates, dust and odor at the West Breakwater.

The closest building to the proposed action is the Hale Kiawe clubhouse which is at an acute angle to the prevailing wind direction. The Hale is an enclosed building that caters to the Senior Boaters Club. The facility has outdoor picnic tables under several trees next to the revetment to facilitate rod and reel fishing. The Hale is approximately 290 feet to the east and perpendicular to project site and parallel to the prevailing winds at the West Breakwater. At less of an acute angle to the southeast of the project site is the Maui Arts & Cultural Center. The Center is some 1,223 feet away and not downwind.

The playground and pavilions at Ke'opuolani Park are approximately 836 feet to the southeast and downwind of the project site. However they are at a higher elevation (approximate 20 feet asl) than the project site (approximately 8 feet asl.). There is also an earthen berm and tree line along the edge of the Park to break the wind and buffer road and harbor noise. Further uphill are several outdoor sports fieldsat the Park, frequently used by youth soccer and ball teams. The nearest field enclosure is approximately 1,400 feet inland of the project site. A residential neighborhood is located more than 1,385 feet downwind to the southwest of the project site.

4.9.2 Potential Impacts and Mitigation Measures

Construction - Preparation of the site would include minor grading for pouring concrete, installing fencing, and trenching activities for utilities. These activities could generate fugitive dust and air-borne particulates that could affect ambient air conditions if not properly controlled. Maui County requires the implementation of BMPs during earth moving activities to ensure that dust, dirt, and debris do not enter the ocean, waterways, neighboring properties or create airborne pollution. BMPs such as regular watering and sprinkling of ground disturbance, covering soil mounds, reducing and/or stabilizing barren areas, and the use of wind and/or debris fences, would be fully implemented to control dust and minimize wind-blown emissions.

An Erosion and Sediment Control Plan that identifies BMPs to be implemented at the site during construction would be provided to the County for review in coordination with grading and ministerial permit submittals. Additionally, construction activities would be temporary and intermittent in nature and would have no long-term effect on air quality. Given the very flat topography of the project site, which ranges between 8 and 9 feet asl within the subject parcel, grading is anticipated to be very minimal and will primarily consist of trenching shallow electric and water utility line connections. No deep trenching for a wastewater line is contemplated; however excavation for the sub-surface drainage is anticipated to involve ground alteration.

The proposed work is not anticipated to excavate or stockpile more than one hundred cubic yards of soil and ground disturbance would be less than one acre is size. Given the size of the construction activity, an National Pollution Discharge Elimination System (NPDES) permit for grading is not anticipated however one would be obtained if required. Based on the above, the construction of the facility is not anticipated to adversely impact air quality.

Operations - Facility operations would include require users to comply with standards and practices that avoid and minimize the potential of being a source of air pollutants. Volatile chemicals, fumes, and odors could be emitted during vessel maintenance and repair activities if not properly mitigated. However, all operations at the site would meet applicable HDOH standards and requirements.

During operations, requirements would be in effect and implemented to avoid or minimize the generation of odor, fumes and air pollution. For example, vessel preparation or maintenance would use vacuum sanders to capture dust as the work was being conducted. Volatile organic compounds (VOCs) are present in many solvents and paints used in the boating industry to help stabilize pigments and for other purposes. Paints and solvents tend to evaporate the most during and just after their application. High VOC evaporate more quickly as the material disperses into the atmosphere, whereas low VOC evaporate more slowly and with less dispersion. Any work on vessels that involves the use of hull de-fouling agents or painting would use low-VOC, rather than high VOC, solvents and paints. This would help minimize potential dispersion at the source and help abate potential detection or recognition of odor. A full list of required BMPs during operations of the site is provided in the description of the preferred alternative at Section 3.3.1 of this document. All users of the facility would be required to agree to implement and adhere to these BMPs.

Landscaping would be installed around the project site's perimeter and along the grassy swales before operations at the facility would begin as described in earlier sections of this document. The landscaping would be maintained and would create a wind break and help create turbulence to prevailing wind patterns. Turbulence results in quicker and more favorable dispersion of air-borne particles, dirt, dust, odor and fumes. A windbreak also reduces the potential for dust, odor or debris to

become airborne. Thus the landscaping proposed would help abate the generation of airborne materials, odors, fumes or air contaminants and would increase the dispersion and dilution of those materials that become airborne. Landscaping as a wind break is a reliable mechanism to avoid, minimize and mitigate potential effects on air quality at neighboring and downwind properties and users.

Based on the above analysis, the ongoing operation of the facility is not anticipated to adversely impact air quality.

4.10 NOISE CONTROL & ABATEMENT

4.10.1 Existing Conditions

Noise can be detected from short-term, acute actions of disturbance and longer-term increases in background nuisance noise levels. Ambient noise levels are derived primarily from passing traffic, and to a lesser extent, port and harbor operations and activities. The site is in an urbanized area and most noise in the vicinity is from vehicle traffic along Kahului Beach Road. The project is located across from the commercial harbor and is not adjacent to residential uses. Typical activities at Kahului Commercial Harbor generate high ambient noise levels 24 hours a day, seven days a week, but most harbor operations occur during the day. Sources of noise include large truck movements, heavy equipment operations, ship loading and unloading using cranes, lifts, and other mechanical equipment, and ship and tugboat engines. Noise levels in the harbor and its urban environment average 60 to 65 decibels (dBA; A-weighting is applied to instrument-measured sound levels in an effort to account for the relative loudness perceived by the human ear) and are predominately attributable to vehicular traffic. Heavy trucks, for example, can generate noise ranging up to 90 dBA (HDOT, 2007).

The West Breakwater is subject to strong, turbulent trade winds throughout most of the year. Windy conditions help to dissipate noise. Buffers such as landscaping and physical impediments, such as parked trailered vessels, can abate noise impacts both by increasing air turbulence which dissipates noise and serves as a baffle which muffles noise.

The closest receptor is the Hale Kiawe clubhouse located to the east of the project site. This receptor audience is located within an enclosed building that would tend to block or mute any noise ingress.

Users of the small boat harbor would also be a receptor audience, but they are likely to be staging their vessels and thus creating noise associated with harbor use, such as the sound of trucks reversing / backing-up and the associated warning sound alarms that are on some models.

The HDOH regulates noise levels based on land use and zoning districts as noted in Table 4-2. Class A lands zoned residential, conservation, preservation, public space, open space, or similar type. Class B lands are zoned for multi-family dwellings, apartment, business, commercial, hotel, resort, or similar. Class C includes lands zoned for agriculture, industrial, or similar types.

Table 4-2.Maximum permissible sound levels in decibels

Zoning District	Daytime (7a.m.to10 p.m.)	Nighttime (10p.m.to7a.m.)
Class A	55	45
Class B	60	50
Class C	70	70

The HDOH authorizes noise generating activities by regulating through the issuance ofthe following types of permits:

1. Community Noise Control Permit for Construction (HRS 342F and HAR 11-46)
   a. Power equipment operations that occur other than 9:30 am – 5:00 pm, Monday through Friday.
2. Community Noise Permit for Stationary Source
   a. Operations that exceed 55 decibels from 7 am to 10 pm at the property line (daytime).
   b. Operations that exceed 45 decibels from 10 pm to 7 am at the property line (nighttime).
3. Community Noise Control Variance
   a. Construction or operations that occur other than 9:30 am – 5:00 pm, Monday through Friday.
   b. Weekend or evening work or operations.
   c. Construction or operations that exceed noise limits.

Noise levels cannot exceed the thresholds identified above in Table 4-2 by morethan10percentofthetime within any twenty-minute period, except by permit or variance. Impulsive noise is limited to ten decibels above the maximum permissible sound levels. Impulsive noise includes items such as hammering, pile driving, and explosions according to HDOH regulations. From a regulatory perspective, the region of influence for noise impacts is the property line of parcels adjacent to the project site, and includes any sensitive noise receptors such as schools, day care centers, residential areas or hospitals. The West Breakwater harbor area is approximately a half-mile from existing residential areas.

4.10.2 Potential Impacts and Mitigation Measures

During construction, minor, short-term noise impacts may be generated from trucks and grading equipment. However, these effects would be temporary and cease upon completion of the facility's construction. Furthermore, given the site's flat topography, grading and site preparation work is anticipated to be minimal. It is not anticipated that construction noise would exceed HDOH standards, although a community noise permit would be obtained, where applicable.

During operations, minor, short-term related noise impacts such as the sound sanders and repair equipment operating at the site would create intermittent, short-term impacts. However, these impacts would be transient, intermittent and temporary in nature and would cease with the completion of the activity. Additionally, the size and arrangement of the concrete maintenance pads would limit the number of vessels that could be repaired simultaneously, thereby inhibiting the amount of ongoing equipment noise that could be generated. No heavy industrial activity that produces acute long-term noise, such as ship building or large crane operations, are proposed at the site.

Landscape plantings and vessels parked on trailers at the project site would help baffle and muffle the noise generated from vessel inspections or repairs and would contribute to increasing air turbulence which disperses noise by creating surface roughness. To minimize disruptions to the public and neighbors, vessel repairs would be limited to normal business hours. Vessel repairs during the evening, Sundays and holidays would be avoided to the extent practicable. The combined use of operation BMPs, vessels parked on site, and landscaping buffers would reduce the likelihood that noise would exceeds HDOH standards, although a community noise permit would be obtained, where applicable.

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CHAPTER 5
COASTAL HAZARDS

5.1 NATURAL HAZARDS

5.1.1 Existing Conditions

Maui's shores are subject to a wide variety of coastal hazards including storm surge, high surf, flood inundation with wave action, stream and subsurface rise in floodwaters, and chronic and episodic erosion of shorelines. Severe events such as hurricanes and tsunamis generated both locally from volcanic activity and those generated from overseas can alter the shoreline dramatically and cause considerable damage to buildings and loss of life(Pogue and Collum, 2006). Maui's shoreline is dynamic and can change rapidly in response to these natural forces, necessitating an analysis of the projects exposure to these hazards and prudent measures to avoid, mitigate and minimize their potential impact.

The area between the west Maui Mountains and central Maui with its rise to Haleakala, forms a large, natural embayment between Kahului and Waiehu / Wihee. Centered in the midst of the embayment is the Kahului Harbor which is bordered by the Western Breakwater (where the project is proposed) and the Eastern Breakwater where the bulk of Maui's inter-island sea transport and industrial activities are located. The massive breakwaters that form the harbor's outer edge were constructed by the USACE to provide a protected embayment. The breakwaters are made up of revetments with large armor stone rock and highly durable concrete tetra pod 'jacks' along the outer edge of the western break water. The USACE retains a 1.5 acre portion of the tip of the Western Breakwater for ongoing maintenance activities and material staging.

This portion of Maui's north shore coastline is exposed to several hazards as illustrated in Figure 5-1.This section of the north shore is dominated by strong prevailing trade winds and high waves. Annual wave heights can reach 20feet during the winter and the coastline is exposed to hurricanes approaching from the east, resulting in a moderately high hazard ranking in the Atlas. Sea-level rise is ranked a moderately high hazard with a predicted rise of approximately 2.4 mm (0.09 inches) per year.

Coastal and beach erosion is a serious threat to the low-lying and mostly unconsolidated shorelines along the north shore due to its exposure to persistent high wave energy throughout the year. Erosion is ranked high along the entire Wailuku coastline according to the natural hazards Atlas (Fletcher et al., 2002). However, the project site itself is bounded by man-made revetments and breakwaters which inhibit erosion and fix the shoreline's position. Accordingly, erosion is not a threat at the project site.

An additional, ubiquitous hazard in Hawaii is earthquakes. These typically result from magmatic migration underground and are common on the Big Island of Hawaii along the east rift zone. On Maui, Haleakala is a dormant volcano that is believed to have erupted last in the 1700s. Haleakala is considered dormant, rather than extinct, and thus represents a potential hazard to Maui residents. The entire island of Maui is designated as seismic hazard zone 2, on a scale of 0 to 4.

5.1.2 Potential Impacts and Mitigation Measures

The project site is located well inland of coastal erosion zones but is subject to high winds. The West Breakwater is surrounded by rock revetments to protect the project site and surrounding area from high waves. Within the West Breakwater, the project site is relatively protected from the non-ubiquitous hazards described above and as such no specific mitigation is proposed.

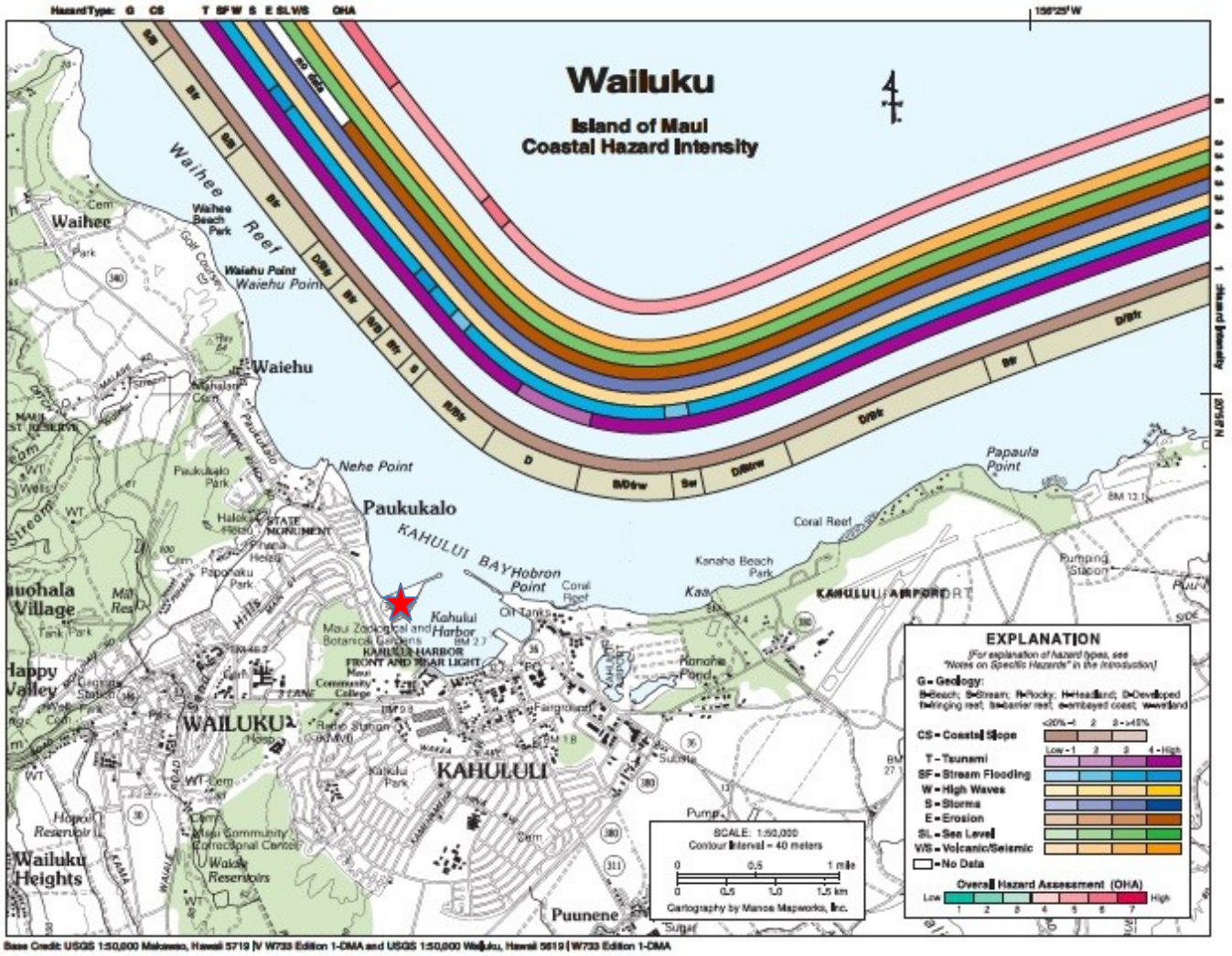


Figure 5-1: Coastal hazard risks in the vicinity of the subject property.

Source: Wailuku Map, Atlas of Natural Hazards in the Hawaii Coastal Zone (Fletcher et al., 2002)

5.2 FLOODING

5.2.1 Existing Conditions

The U.S. FEMA Flood Insurance Rate Map (FIRM) Community Panels #150003 0384E and 0392E are applicable to the subject parcel. The FIRM panels include imagery from May 2005 and parcel data from July 2013. The FIRM was effective September 25, 2009 and indexed September 19, 2012. The FIRM designates the subject parcel and project area as being within the VE flood hazard zone (Figure 5-2). Table 5-1indicates the site elevation is 8 feet asl. and the base flood elevation is 18 feet asl. The site is in the VE zone, an area subject to coastal flooding with wave action and velocity hazard.

5.2.2 Potential Impacts and Mitigation Measures

State lands within the Conservation District are not subject to County zoning pursuant to HRS 205-5. Thus, the requirements of MCC 19.62 are not applicable to the subject parcel or proposed action. However, the Applicant has purposely avoided proposing buildings or walls for the project given respect for the intent of the County's flood hazard regulations. In addition, the site survey completed by a licensed surveyor indicates that the project site is nearly flat with an elevation of 8 feet above sea level across the project site. Should a structure be proposed in the future, an elevation certificate would be obtained and compliance with flood hazard guidelines would be sought, such as being designed to withstand hydrostatic forces or inundation and have appropriate anchoring to resist floatation.

As a precautionary measure, metal tie downs would be installed in the main concrete pad to help anchor vessels stored at the site. This would prevent displacement or uncontrolled floatation from flood waters should they inundate the site. In consideration of the aforementioned, no adverse impacts or negative effects are anticipated.

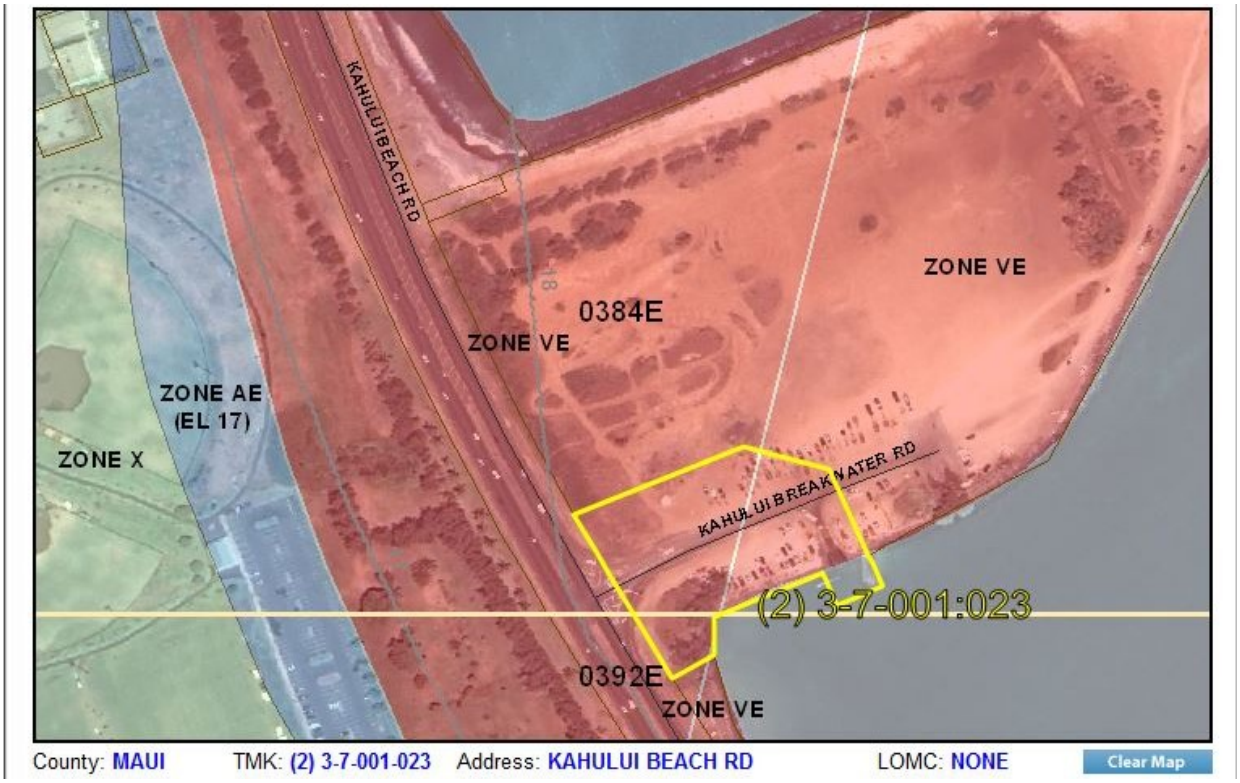


Figure 5-2: Flood hazard zones on the subject property.

Source: http://gis.hawaiinfip.org/FHAT/report/FHAT_Report.pdf

5.3 HURRICANES

5.3.1 Existing Conditions

Huricane Hiki in 1950 was the first hurricane officially recorded in the State of Hawaii. Since then, a number of hurricanes have travelled through Hawaii's waters (Figure 5-3). Hurricane's lwa (1982) and lniki (1992) have destroyed numerous buildings in Kauai. More recently, Hurricanes Flossie (2013) and Iselle (2014) caused considerable damage to homes and buildings, primarily on the Big Island in the Pahoa region. Nonetheless, coastal geologists and scientists anticipate an increase in the frequency and power of coastal storms and hurricanes that enter Hawaiian waters due to various factors including climate change, sea level rise, and warming oceans. Hurricanes also bring high winds that can displace loose materials or debris, which in turn can become flying hazards that damage buildings and stationary objects.

The project site is protected by man-made breakwaters that are designed to protect the harbor from coastal hazards. At its closest point, the site is over 350 feet inland harbor's waters. Overall, the project site is less vulnerable to hurricane induced storm surge or flooding than the tip or western edge of the Western Breakwater.

Figure 5-3: History of hurricane tracks in Hawaiian waters.

5.3.2 Potential Impacts and Mitigation Measures

As a precautionary measure, metal tie downs would be installed in the main concrete pad to help anchor vessels stored at the site. This would prevent displacement or uncontrolled floatation or submergence of vessels from hurricane induced storm surge. The provision of anchors in the concrete pad would also help reduce the potential for vessels to overturn or be displaced or damaged during strong wind events.

5.4 TSUNAMI

5.4.1 Existing Conditions

Tsunamis can result due to geologic events that occur distant from the area. A tsunami (Japanese for "harbor waves") is a series of ocean waves produced by a sudden rise or fall in the earth's crust, most commonly caused by an earthquake or underwater landslide. In the open ocean tsunami waves cannot be seen or felt by ships or airplanes because the un-breaking waves are actually hundreds of miles wide with a height of only a few feet. But as the waves approach the coast their height increases dramatically and can be very destructive when they reach the shore (Coastal Services Center, 2010).

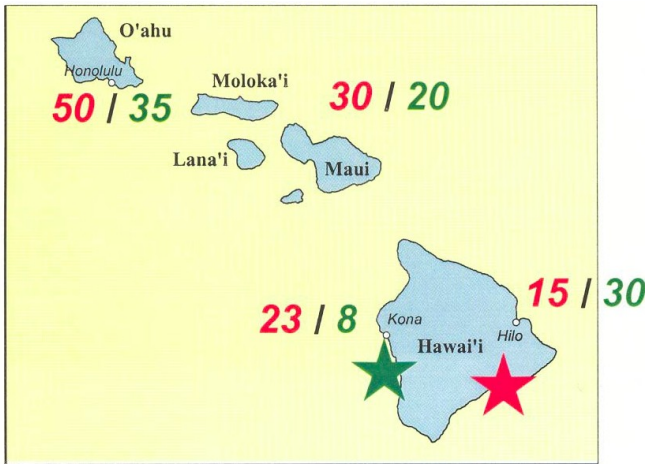
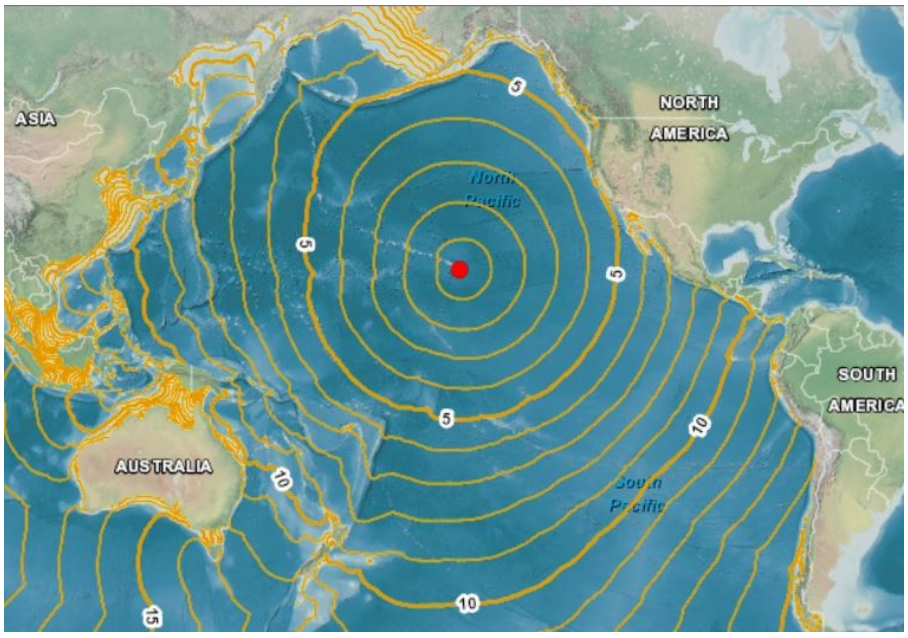


Figure 5-4: Tsunami travel times in minutes.

The Hawaiian Islands are vulnerable to localized and Pacific-wide tsunamis. Localized tsunamis can result from landslides or subterranean activity of the Kilauea volcano on the Island of Hawaii. Distant earthquakes, volcanism or landslides in places like Chile, Alaska, and Japan can also generate a tsunami. The first wave of a locally-generated tsunami would reach Maui shores in less than 30 minutes, whereas Pacific Rim perturbations take several hours to reach Hawaii's shores providing some time for notification and evacuation (Figures 5-4 and 5-5).



On March 11, 2011 a 9.0 magnitude earthquake off the Japanese coast of Tohoku resulted in a tsunami that killed more than 15 thousand people in Japan and triggered evacuations in Hawaii and Maui. Fortunately, damage was minimal and there was no loss of life in Hawaii. In 1960, an earthquake in Chile produced a tsunami that killed 61 and injured 282 people, primarily in Hilo. On April 1, 1946, a Pacific-wide tsunami was caused by a magnitude 7.3 earthquake near Unimak Island, Alaska.

Figure 5-5: Tsunami travel times in hours.

The first waves from the 1946 earthquake arrived in Hawaii in less than 5 hours and caused extensive damage. Wave heights across the Islands reached an estimated maximum of 55 feet, 36 feet and 33 feet on Hawai'i, Oahu, and Maui, respectively. Waves also reached a half a mile inland in some locations.

A total of 159 people were killed as a result of the tsunami in Hawai'i, of which 96 were in Hilo where the city`s entire waterfront was destroyed. As a result of these dangers, the Hawaii State Emergency Alert System was established and is used to notify the public of a possible approaching tsunami, including a system of sirens in vulnerable coastal areas.

For this portion of Maui's north shore, the tsunami hazard is ranked high for low areas along the coastline (Fletcher et al., 2002). Tsunami hazard at the Kahului Harbor is reduce and ranked moderately high due to the mitigating effects of a significantly wide fringing reef directly offshore and the man-made breakwaters that protect the harbor and reduce wave energy and inundation

The subject parcel, project site, and Kahului Beach Road are within the tsunami inundation zone (Figure 5-6). While there were no significant impacts to the site from the March 11, 2011 tsunami event, observers of the event indicted that the harbor filled with water like a commode and drained nearly to its bottom several times in a row. In contrast, the Maalaea Harbor experienced damage to vessels and some mooring within the harbor from the March 2011 event (Figure 5-7).

5.4.2 Potential Impacts and Mitigation Measures

Tsunami inundation heights are difficult to predict with accuracy. In the event that a tsunami breached the breakwater, its waters would likely carry floatables inland and across Kahului Beach Road. There is a wide (25 feet plus) grassy swale on the inland (mauka) side of the roadway. The swale is bordered by a 6 to 10 feet high berm that rises to Ke'opuolani Park and its playing fields, parking lots and recreational areas. Given this landform, most debris and materials would probably be lodged against this berm and within the grassy swale, as opposed to within the roadway, depending on the height and force of the tsunami. As a precautionary measure, metal tie downs would be installed in the main concrete pad to help anchor vessels stored at the site. This would prevent their displacement in the event the West Breakwater is inundated by a tsunami.

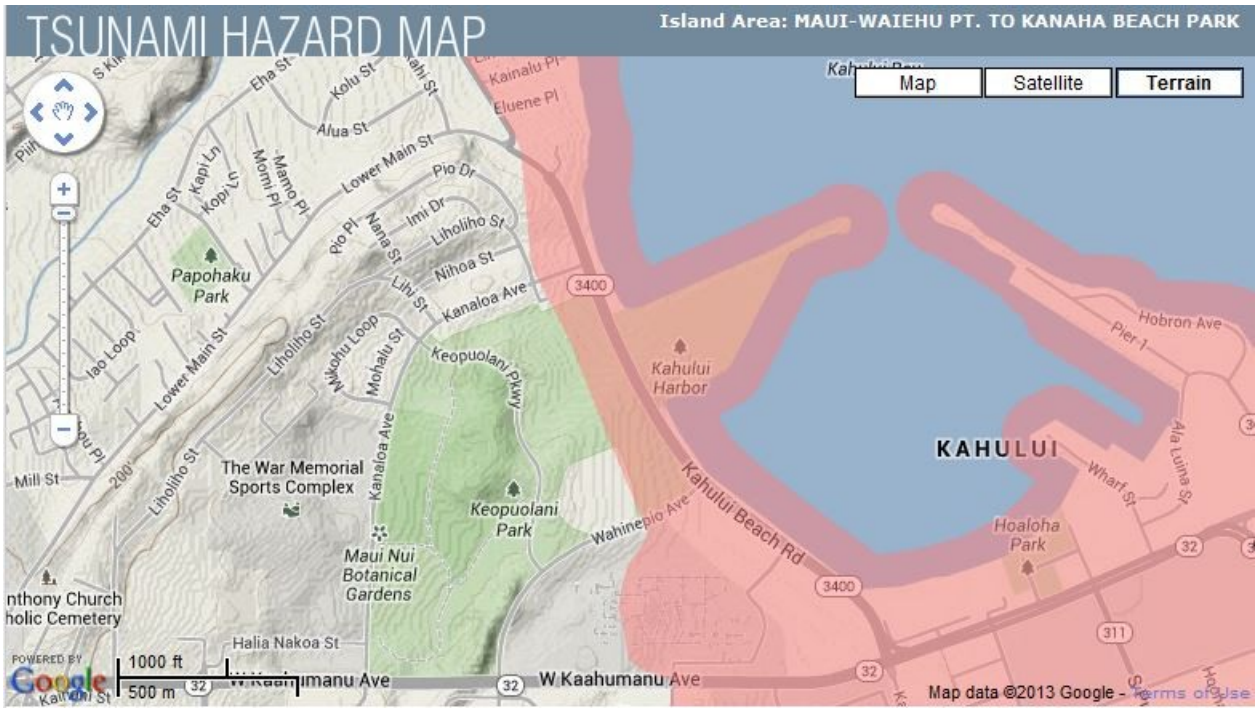


Figure 5-6: Tsunami inundation area shaded in red.

Source: Coastal Services Center, http://tsunami.csc.noaa.gov

Figure 5-7: Maalaea Harbor during the March 11, 2011 tsunami event.

Source: Sanford Hill / Pacific Disaster Center

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CHAPTER 6
SHORELINE SETBACKS

6.1 STATE CERTIFIED SHORELINE

The seaward property boundary follows along the rock revetment that forms the eastern edge of the Western Breakwater. According to State law, when the shoreline is fixed by a man-made structure that has received government approvals, a new shoreline certification is not required. The state-certified shoreline is normally valid for 12 consecutive months with several exceptions. Where the shoreline is established by artificial structures, such as the revetment along a parcel's seaward edge, a new shoreline certification is not required.

HRS 205A-42(b) of the Coastal Zone Management Act states:

> "… provided that no determination of a shoreline shall be valid for a period longer than twelve months, except where the shoreline is fixed by artificial structures that have been approved by appropriate government agencies and for which engineering drawings exist to locate the interface between the shoreline and the structure."

Several surveys exist from the various Executive Orders that precisely locate the interface between land and water. In addition, the site survey accurately locates the proximity of the project site to the top of the revetment, property line, and shoreline. As a consequence, a new shoreline certification is not required and the shoreline setback area can be calculated in a straightforward fashion.

6.2 SHORELINE SETBACKS

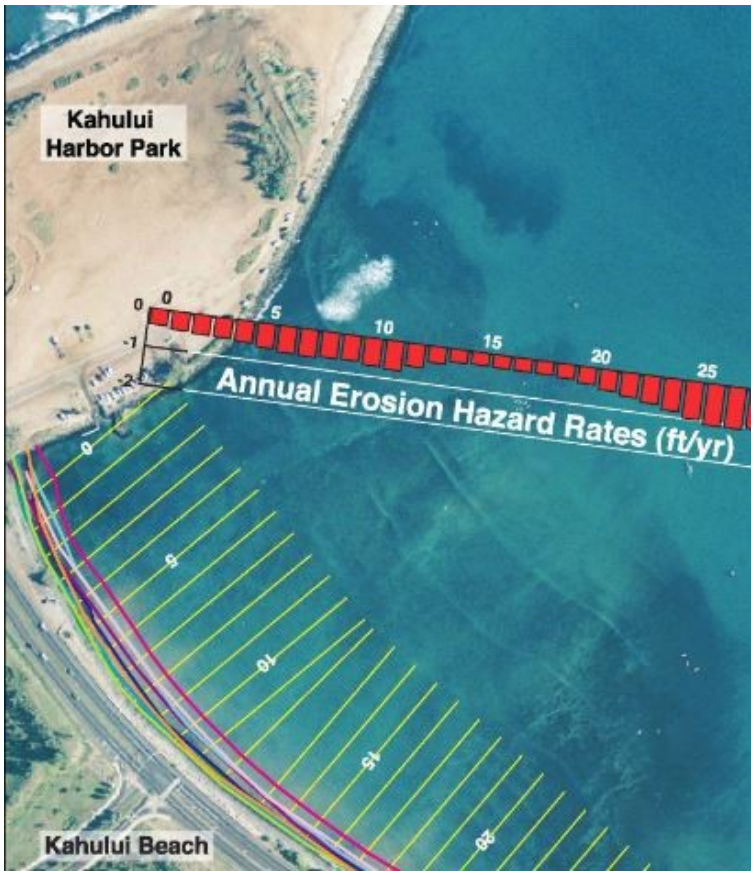
The subject property is bounded by legally conforming stone revetments. The western revetment was constructed prior to 1960 and the eastern revetment prior to 1987 (Figure 6-1). During the interim, material dredged from the harbor was used as fill for the west harbor spit, which has now formed approximately 23 acres. Of the 23 acres, 3 acres at the tip of the spit are dedicated to the USACE and State Department of Transportation as a staging, storage and maintenance area. A 20-acre section was given to Maui County and later reallocated to DLNR.

Figure 6-1: Hardened shoreline of the West Breakwater, 1987.

The remaining 6.1 acres of the Western Breakwater is adjacent to Kahului Beach Road. The makai side of the harbor was dedicated by Executive Order to DOBOR for public purposes, specifically to create a boat ramp and parking for trailered vessels. The Executive Orders (4882 & 4883) contain surveys that provide evidence that the revetments legally permitted and the shoreline has a fixed location.

HRS 171-6, Powers of the DLNR, was amended in July 2011. The amendment exempts DOBOR from requirements to obtain an SMA permit approved by Maui County. However, an analysis of the project location in relation to the shoreline setback area is prudent.

A shoreline approval can be issued for projects valued at less than $125,000 that do not interfere with beach processes, public access or public views, and that do not fix the shoreline's location or alter its grade. However, a Shoreline Variance would be required for other uses in the shoreline setback area. HRS 205A-43.5 (a)(4) allows for the requisite public hearing to be waived for minor additions and alterations of legal boating, maritime, or watersports recretation facilities that have minimal interference or effect on natural shoreline processes. In the event that construction of buildings or major grading or paving is proposed within the shoreline setback area, a shoreline approval or variance could be required.



Maui County has two setback calculations for oceanfront building construction:
- an erosion rate-based setback, and
- an average lot based setback.

The first method of calculating the setback is based on site-specific erosion rates calculated at 66 feet intervals along natural shorelines. The rate of erosion is based on previous shoreline positions.

As shown in Figure 6-2, Kahului Beach has experienced consistent erosion in the past as illustrated by the red bar graph histogram (Fletcher etal, 2003).

However, there are no transects and no established annual erosion hazard rate (AEHR) for the boat ramp and harbor park area. This is due to the presence of a lawfully constructed revetments that hardens the shoreline and fixes its position.

Accordingly, the erosion rate is zero as defined in 12-203 of Maui's shoreline rules.

Figure 6-2: Maui Shoreline Atlas excerpt for Kahului Bay.

6.2.1 Erosion rate setback

The County setback calculation is 50 years X AEHR (0.0) + 25 feet buffer= 25 feet shoreline setback.The County shoreline setback area extends 25 feet inland from the revetment based on the AEHR method.

DLNR OCCL also has an erosion rate-based setback calcultion that applies to construction on Conservation-designated lands. The setback is calculated in the same manner as the County's AEHR method but with more conservative setback criteria. The setback is calculated as 70 years X AEHR (0.0) + 40 feet buffer= 40 feet shoreline setback.The shoreline setback area extends 40 feet inland from the revetment based on the State AEHR method.State Law HRS 205A-48 states that in the event state or county shoreline setback requirements conflict, the more restrictive requirements shall apply

6.2.2 Lot depth setback

The County also has a lot-depth based setback. The second method of calculating the setback in Maui County is based on the parcel configuration and size. Lot depth is calculated adding the left and right property boundaries to a center line distance to the shoreline.

The project site is 453 feet long (mauka to makai) and 140 feet wide but the overall parcel on which the project occurs is much larger. For lots with an average depth of 100 to 160 feet (i.e., 140 feet for the project site), the shoreline setback is 40 feet pursuant to 12-203-6 (a)(ii)(b) of the Shoreline Rules for the Maui Planning Commission. For lots greater than 160 feet in depth, the setback is 25% of the lot's depth up to a maximum of 150 feet (12-203-6(a)(ii)(c)).

Figure 6-3 indicates that for the overall parcel, the right property line is 393.30 feet deep and the left property line is 415.11 feet deep (313.28 + 75.37 + 29.46 feet). This results in an average lot depth for the DOBOR parcel of approximately 409 feet. Pursuant to 12-203-6, the corresponding setback calcuation is 25% of the lots average depth (409 feet x 0.25) or approximately 102 feet.The County setback calculation could be 40 feet for the project site and 150 feet for the parcel. In either case, the maximum County shoreline setback would be 150 feet inland of the revetment.

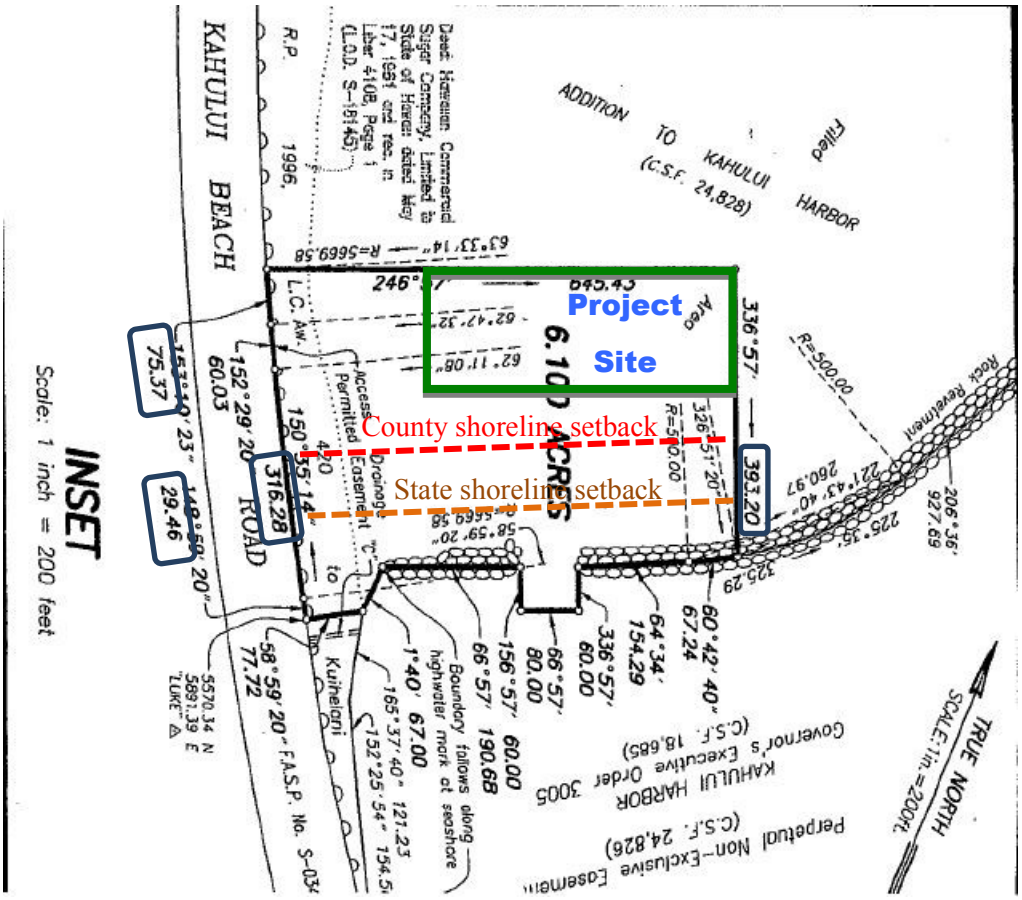


Figure 6-3: Lot Dimensions and approximate State and County shoreline setback lines.

6.2.3 Potential Impacts and Mitigation Measures

The project site's northwestern corner is 393.20 feet inland of the revetment(Figure 1-6). The project site is 140 feet wide and its most makai or seaward extent is 253.20 feet inland of the revetment. The

maximum shoreline setback is 150 feet by County standards and 40 feet by the State standards. Therefore, the project is located more than 100 feet inland of the maximum shoreline setback area. Accordingly, a shoreline setback variance or approval is not required since the proposed action is outside both the State and County shoreline setback areas.

6.3 SHORELINE ACCESS

6.3.1 Existing Conditions

Lateral access, or access along the shoreline, is a guaranteed public right for the public in Hawaii. When access is blocked, the government can require that the impediment be removed, whether it is man-made or man-induced. Fishing from the near shore revetment is common, although no customary or traditional practices are known to occur on the Western Breakwater. Shoreline access is provided by DOBOR to the public, recreational boaters using the boat ramp and floating pier, and to the Seniors Club along the far eastern edge of the breakwater. There are no impediments to the site, such as fencing or walls that would obstruct access to the shoreline. The very nature of the site is meant to create safe access for a variety of water craft (kayaks, paddle boards, surfboards, outrigger canoes, outboard motor boats, and trailered vessels) with access to the sea.

On the project's eastern side, a paved roadway and turning area is present between the project site and the revetment that borders the waters of the harbor. The roadway facilitates ease of access to the harbor, shoreline and its amenities and the proposed use would not impose or hinder this access.

On the project's western side, a wide undeveloped vacant open area rises above the project site on minimally vegetated fill. The area is bounded to the west by a rock revetment that forms the edge of the breakwater. This western portion of the breakwater is accessible by four-wheel drive vehicles and on foot. The area is frequently used by fishers and their family's since the revetment provides a platform for casting into the ocean. The project would not inhibit, deter or intrude on the continued use of this fishing area as the project site is located substantially inland and below the earthen fill mound that exists between the project site and western rock revetment of the breakwater.

On the project's northern eastern side, a metal gate and unimproved access road extends to the tip of the breakwater. Access to this area is regulated by the DLNR and is for use of the State Department of Transportation and USACE. The project and proposed use of the site would not inhibit, deter or obstruct access to the tip of the breakwater. The access gate and unimproved roadway are not located and do not abut the proposed project site location. This access point is located to the northeast of the project site.

A Shoreline Access Report was prepared by OceanIT for Maui County (OceanIT,2005). The report inventoried shoreline access points and made specific recommendations for improving beach and shoreline access. The Kahului Boat Ramp and Harbor Park is identified as access point #19 &#20 and is designated for swimming, water access and boat access.

6.3.2 Potential Impacts and Mitigation Measures

The project site is located 253 feet inland of the rock revetment and boat ramp. The location would not inhibit, deter, diminish or hinder lateral access along the shoreline. Access to the shoreline would not be hindered or inhibited by the proposed use of the site. No further mitigation is proposed and no adverse impacts are anticipated.

CHAPTER 7
PUBLIC SERVICES &INFRASTRUCTURE

7.1 EDUCATION, MEDICAL, FIRE AND POLICE SERVICES

7.1.1 Existing Conditions

The State Department of Education public school system serves the Wailuku-Kahului region. Public facilities in Kahului include Lihikai, Kahului, and Pomaikai Elementary Schools, Maui Waena Intermediate School, and Maui High School. Other existing facilities in the area include Waiheʻe Elementary School, ʻĪao Intermediate School, and Baldwin High School. University of Hawaii-Maui College serves the community and is located in Kahului. There are also a variety of private schools that serve the region.

Emergency and regular medical services are provided by Maui Memorial Medical Center located approximately 1.5 miles southeast. The facility is the closest major medical facility to the proposed project site and the only major hospital on the Island. However, other medical facilities in close proximity to the subject property include Kaiser Permanente and the Maui Medical Group in Wailuku.

Fire department services are provided by the Maui Fire Department's Kahului Station located in Wailuku town approximately 1.7 miles southwest from the proposed project site.

Police protection for the Wailuku-Kahului region is provided by the Maui Police Department headquartered at the Wailuku Station approximately 1 mile southwest from the proposed project site.

7.1.2 Potential Impacts and Mitigation Measures

Given existing capacity, there would be no adverse impact to educational, medical, fire or police services. No specific mitigation measures are proposed and no adverse impacts are anticipated.

7.2 SOLID & CONSTRUCTION WASTE

7.2.1 Existing Conditions

Garbage and solid waste collection serves are provided by Maui County's Department of Environmental Management, Solid Waste Division. The County maintains an island-wide system of solid waste collection and disposal. Private solid waste collections and disposal services are also available in the area for commercial and institutional needs. There are two landfills, one public and one private, within several miles of the facility. The County operates the Central Maui Landfill and its Refuse & Recycling Center at Puʻunēnē. The privately operated Maui Demolition & Construction Landfill is located at North Kihei Road at Honoapiilani Highway in Maalaea. The facility is open Monday through Friday from 7:00 am to 4:00 pm and Saturday from 7:00 am to 11:30 pm. The facility is closed on Sundays. The private facility accepts construction waste and waste from demolition activities.

Presently, Aloha Waste Systems Inc. provides one dumpster at the end of the access drive in the small boat harbor for general use. The dumpster is located between the gated DLNR access road to the end of the breakwater and the Senior Center's Hale Kiawe. The dumpster is serviced on a regular, routine basis.

Generators of solid waste are required to ensure that their wastes are properly delivered to a permitted solid waste management facility.

7.2.2 Potential Impacts and Mitigation Measures

Given the amount and type of waste streams generated by the facility, a commercial solid waste hauler would be retained for disposing of any construction waste, although this is anticipated to be minimal since no building construction is proposed. For facility operations, a commercial waste service would be retained, using dumpsters or other collection means, to properly dispose of any solid waste generated. A

recycling and reuse program would be implemented and source separation of waste materials would be provided onsite to help minimize waste generation or mixing to the extent feasible and at the direction of the commercial waste hauler. The amount and type of waste generated from the project's construction and facility operations would not exceed or adversely affect landfill or solid waste handling capacity. No adverse impacts are anticipated.

7.3 POTABLE WATER

7.3.1 Existing Conditions

The Maui County's Department of Water Supply provides potable water service to the area via 12 inch or larger lines along, or adjacent to, Kahului Beach Road. Water is supplied to the boat wash down areas at the end of the DOBOR facility's access drive and next to the eastern revetment. There is sufficient supplies of water and capacity of the water line to support expanded services or irrigation needs at the site.

7.3.2 Potential Impacts and Mitigation Measures

Extending water services to the project site would necessitate trenching to support water use primarily for irrigation needs. Water use at the site is not anticipated to exceed present capacity or require upgrades to the existing water line provided to the small boat harbor. Water to the site would be sub-metered and is anticipated to connect with the existing water line access box adjacent to the boat ramp and fishermen's check-in station. Trenching would involve minimal ground disturbance, however BMPs would be implemented during any ground alteration in compliance with County and State standards and requirements. No additional mitigation measures are proposed and no adverse impacts are anticipated.

7.4 WASTEWATER TREATMENT

7.4.1 Existing Conditions

The County's Kahului wastewater treatment plant is located less than two miles away and along the shoreline to the northeast of the site and beyond the commercial harbor. The County has centralized sewer service provided via a force main that runs along the makai side of Kahului Beach Road. Wastewater collected in the Kahului area is conveyed to the Kahului Wastewater Pump Station, which is located one mile from the proposed project site. Wastewater collected from the pump station is transported to the Wailuku-Kahului Wastewater Reclamation Facility. The wastewater treatment plant has sufficient capacity to accommodate existing and planned uses on the West Breakwater including DOBOR's planned public comfort stations.

Presently there are no publicly available comfort facilities in the near vicinity. The nearest restrooms are at Hale Kiawe, which has limited capacity to treat wastewater, the Maui Arts and Cultural Center, and Ke'opuolani Regional Park. The latter two have centralized wastewater treatment and public restrooms but are located a considerable distance from the DOBOR Small Boat Harbor and across a busy highway. Currently, a porta-pottie is installed and maintained at the site during vessel maintenance activities for large commercial vessels and on an as-needed basis. The portable comfort facilities are paid for by users of the site who have been granted permission for vessel maintenance by the Kahului Harbor Master.

7.4.2 Potential Impacts and Mitigation Measures

There are no underground sewer lines at the proposed project site. No extension of centralized sewer lines are proposed, nor is an individual subsurface wastewater system. Installation of new sewer lines and/or a lateral would require considerable excavation, trenching, and substantial expense. Actual use of the facility is not anticipated to generate substantial amounts of wastewater. As a requirement of the facility's use, privately paid portable comfort facilities would be used, installed and serviced when vessel maintenance activities occur. These uses would be temporary, intermittent and short-term in nature and do

not impose on County wastewater services. As such, no adverse impacts on public wastewater infrastructure are anticipated.

7.5 STORMWATER AND SITE DRAINAGE

7.5.1 Existing Conditions

The Iao Valley, one of the wettest places in Hawaii, empties from the heavily channelized Iao Stream into coastal waters to the far west of the harbor. Heavy rains in the valley can bring mud, sediment, debris and large boulders and rocks into nearshore waters, especially near Waihee. River flooding occasionally occurs in nearby Wailuku and Kahului Streams that drain into the ocean to the west of the breakwater and project site. Historically, several seeps were located along the eastern edge of the Western Breakwater. These seeps bring freshwater to mix with seawater creating favorable conditions for certain species of fish and marine life. Nearby drainage consists mainly of surface runoff from the Kahului Beach roadway, which flows into the ocean or nearby vegetation.

In regards to the project site, a Preliminary Drainage Report was prepared by Otomo Engineering, Inc in March 2014 (Appendix A). According to the *Soil Survey of Islands of Kauai, Oahu, Maui, Molokai, and Lanai, State of Hawaii* (NRCS, 1972), the soils within the subject parcel are classified as Makena loam, stony complex. Makena loam is characterized as having moderately rapid permeability, slow to medium runoff, and a slight to moderate erosion hazard. Runoff from the project site currently ponds in low-lying areas or flows into the ocean. It is estimated that the existing runoff from a 50-year, 1-hour storm is 3.34 cfs., corresponding to a runoff volume of 1,001 cubic feet for the West Breakwater site.

7.5.2 Potential Impacts and Mitigation Measures

The majority of the project site will remain pervious and given its flat topography, no change in the present drainage pattern is anticipated. However, two concrete pads would be constructed to serve as inspection and maintenance areas for trailered vessels. The amount of impervious surface area created by the two adjacent concrete pads would be 1,470 sf and 12,032 sf., totaling 13,502 sf of impervious surface area. Post-development, the site would consist of 0.97 acres of undeveloped area, 0.32 acres of impervious area, and 0.16 acres of landscaped area. Rainfall from a 1-hour, 50-year storm would produce 2.5 inches of stormwater or 3.89 cfs. of runoff from the site. This is 0.55 cfs. more than the site's current 3.34 cfs. from a 50 year, 1-hour storm. The corresponding increase in runoff volume would be 1,168 cubic feet – 1,001 cubic feet = 167 cubic feet according to the drainage report (See appendices).

Runoff from the concrete pad, whether it be from rainstorms or the use of potable water, would be intercepted by grated catch basins to filter contaminants out of the water using absorbents and other best practices. Catch basin filter inserts will be installed on all grated inlet catch basins to reduce the total suspended solids loading. The filtered water would then gravity flow to an onsite subsurface drainage system, which will be located under the main concrete pad. The subsurface drainage system will consist of a perforated drain line embedded in crushed rock, which will be wrapped with a layer of filter fabric. After flowing through the grate / filter, surface runoff entering the perforated pipe will be allowed to infiltrate into the ground. The total onsite retention system will have a total storage volume of approximately 357 cubic feet, which will accommodate more than double the increase in surface runoff, estimated to be 167 cubic feet, generated from a 50-year, 1-hour storm event. The proposed drainage plan meets and exceeds the requirements of the "Rules for the Design of Storm Drainage Facilities in the County of Maui. The stormwater drainage system is intentionally over built to provide a precautionary measure for climate change and other potential influences on stormwater generation.

In addition, a small and a large vegetated retention area would be installed between the concrete pads and the pad and unpaved parking area. Landscape plantings along the perimeter of the project site and on the edge of the retention areas would increase capture and treatment of any excess stormwater from the project site. The use of vegetation would improve water quality and enhance treatment at the site in

comparison to the present absence of any stormwater capture and treatment mechanisms. Both vegetated retention areas would be connected to the subsurface drainage capture and treatment system.

With the implementation of the aforementioned mitigation measures, no adverse impacts on water quality, drainage patterns, or stormwater generation are anticipated.

7.6 ELECTRICAL AND TELECOMMUNICATIONS

7.6.1 Existing Conditions

Cable, telephone, and electrical services are provided to the area by overhead lines along Kahului Beach Road. The Maui Electric Company (MECO) is responsible for providing electricity to the West Breakwater. From the roadway, electricity is transmitted underground given the potential for vessel masts to become entangled in overhead electrical lines. Electrical service terminates at the vessel wash down bays. An electrical service access box is located past the boat ramp and fishermen's check station adjacent to the paved harbor access road.

7.6.2 Potential Impacts and Mitigation Measures

No cable, internet, television or telecommunications equipment or services are proposed at the project site so there would be no impact to these services.

Electrical services would be necessary for key card gate security operations and to run the irrigation pump for landscaping. Maui Electric Company services would be sub-metered and extended underground to the project site and secure parking area at the Applicant's expense. Trenching of the site to connect with electrical services and install underground transmission lines would require minimal site disturbance and ground alterations, however BMPs would be implemented during all ground alteration. The present transmission lines have sufficient capacity to accommodate the proposed facility's needs and there would be no adverse impacts to electrical supplies or generation.

No mitigation measures are proposed beyond those mentioned above and no adverse impacts are anticipated.

7.7 LIGHTING

7.7.1 Existing Conditions

The commercial harbor has regular night-lighting to facilitate operations. Opposite the commercial harbor, the West Breakwater is mostly absent of lights. Presently, there are unshielded lights on steel poles at the boat ramp and trailer parking area fronting the Hale Kiawe at the end of the property. There are also four large down-shielded lights on two separate high poles located on either side of the boat ramp to facilitate evening or early morning vessel / trailer operations at the small boat harbor facility. Kahului Beach Road is also illuminated with street lights on both sides of the roadway.

HRS 205A-71 discourages the use of artificial lights that illuminate the shoreline or ocean waters, except for public safety reasons or purposes. The use of bright lighting can cause a visual nuisance, particularly late at night or during pre-dawn hours. Inappropriate lighting can adversely impact birds and marine life, especially certain avifauna such as Shearwaters that are susceptible to confusion or disorientation by bright, unshielded lights. For this reason, lighting should be down-shielded and designed to minimize glare. Lighting should also meet police guidelines for crime prevention through environmental design.

7.7.2 Potential Impacts and Mitigation Measures

The proposed action does not include any permanently mounted lighting. From time to time, portable lights could be used during specific operations at the facility, but these would be low-standing, down-shielded lights run and only used intermittently. Accordingly, this use would be temporary, short-term in duration and used on an as-needed basis. No lighting would be used to illuminate the shoreline and ocean waters in compliance with HRS 205A-71. All exterior lighting would be shielded and downward directed

to minimize light trespass. No artificial light from floodlights, up-lights, or spotlights would be used during construction activities as all construction is anticipated to occur during daylight hours. Protected avian species that could be adversely affected by bright lights are not known to inhabit the West Breakwater and the project site exhibits no preferred habitat for these species. Consequently, no adverse impacts are anticipated.

7.8 SITE SECURITY

7.8.1 Existing Conditions

Large boulders that have been placed along the western perimeter of the property to delineate the DOBOR parcel. The boulders mark the western extent of the project site. DLNR placed the boulders to prevent unconstrained vehicle access up and over the mounds of dredge spoil between the small boat harbor and the western revetment of the overall breakwater. The physical barrier reduces erosion of the soils and creation of airborne dust from vehicles and helps maintain security of the West Breakwater. Two unimproved gated roads or trails offer access to different parts of the breakwater. The first is located to the southwest of the project site and offers controlled access from Kahului Beach Road to the western revetment of the breakwater. The second controlled access is located seaward of the project site and near the end of the boat harbor access drive. DLNR controls entry to both unpaved access roads through use of a bright yellow, steel, locked swinging gate.

7.8.2 Potential Impacts and Mitigation Measures

Chain link fencing would be used around the perimeter of the project site to secure the area and break the wind. The vinyl-coated chain link fencing would have a longer lifespan given the saltwater environment and would not corrode as quickly as regular steel or aluminum fencing. The fencing would also help create air turbulence to dissipate and diminish air pollution and dust, as well as capture debris and prevent it from becoming airborne. The fence is anticipated to be less than 7 feet in height.

In addition, landscape plantings would be established along the exterior perimeter fence. A Naupaka and Hau hedge would be used to form an attractive security barrier along the outer edge fence. Both species are drought tolerant and climate-adapted and require minimal maintenance once established with drip irrigation. Together, the Hau and Naupaka shrubs would serve as an attractive windbreak, provide visual screening, and serve as an extra level of security for the parking and vessel inspection and maintenance facility. With the implementation of the landscape planting plan, no adverse impacts are anticipated and security is anticipated to be enhanced.

A key card access gate is proposed to afford convenient access to the vessel parking area at a time and choosing of the vessel owner. Key cards would be available for purchase by the boating public at a nominal fee estimated to range from $100 to $130 per month, however no rates or length of rental period have been determined as of yet. The fees collected are intended to defray the cost of constructing the facility and would be determined in consultation with DOBOR. The costs and dangers avoided by the Applicant having to transit their vessels and crew to neighboring islands for required US Coast Guard Inspections is the primary incentive for the proposed project. Purchasers of key cards would be required to agree to use best management practices to protect water and air resources and to avoid and minimize nuisance and enhance safety when using the facility. A contingency plan would also be developed prior to facility operations in the unlikely event the key card reader failed, for example during a major power interruption.

7.9 TRAFFIC AND TRANSPORTATION

7.9.1 Existing Conditions

Kahului Beach Road runs parallel to Kahului bay between Ka‘ahumanu Avenue and Waiehu Beach Road. Kanaloa Avenue and Wahinepio Avenue intersect Kahului Beach Road. The roadway connects Kahului with lower Wailuku and Waiehu. Kahului Beach Road provides access to the Western Breakwater by way

of dedicated turning lanes into the small boat harbor facility. A 2-lane wide asphalt drive leads from Kahului Beach Road to various amenities at the small boat harbor, terminating at the property line. On its seaward side, the access drive passes an ice vendor, picnic tables, boat ramp, fishermen's check station, and ends at a paved turning area and three paved vessel wash down stalls. A concrete pad located in the middle of the drive next to the boat ramp accommodates heavy vehicles and sufficient access and turning radius for boats, trucks and trailers.

A large, open, unsecured, vacant area to the landward side and adjacent to the access drive is flat and undeveloped consisting of crushed coral fill, clay and dirt. Consequently, dust can readily become airborne particulates when cars and trucks cross the site, due to the lack of suitable surfaces (crushed gravel or pavement) designed to accommodate the weight of large vehicles, trailers and boats. Mud can also be tracked onto Kahului Beach Road during periods of heavy rain and stormy weather.

Maui County has developed a bikeway and greenway plan that incorporates access to the Western Breakwater. The plan would encourage multi-modal transit by constructing bicycle lanes and pedestrian walkways that connect Kahului Beach Road, Hana Highway, and other roadways and public spaces including the small boat harbor. The existing facility drive is wide and the site open so as to provide adequate pedestrian walking, biking, and circulation.

An unimproved dirt road leads from the subject parcel boundary near the eastern corner of the proposed project site to the end of the breakwater. The access road accommodates maintenance of the breakwater and access is controlled by DLNR through the use of a large, metal gate. The project site does not extend in front of the access road and thus would not inhibit or hinder its continued use. A second unimproved dirt road leads from Kahului Beach Road out and seaward to the western side of the breakwater. The area is frequently accessed by 4-wheel drive trucks with high clearance. Several concrete barriers have been laid along the berm of the roadway to prevent access at the far southwestern end of the breakwater.

7.9.2 Potential Impacts and Mitigation Measures

The proposed action would have no affect on existing access to other undeveloped portions of the West Breakwater, Access to and from the boat ramp and the ability to turn trailered vessels would also not be affected by the proposed action as the project site is located 253 feet inland of the rock revetment and boat ramp. The location would not inhibit, deter, diminish or hinder vehicle turning movements, the ability to back down the boat ramp with a trailer to retrieve a vessel, or turn a trailer vessel around. The existing ingress and egress routes to West Breakwater, parking areas and boat dock facilities would not be adversely affected or changed as a result of the proposal given its location. As stated earlier in this document, users of the facility would have to comply with certain rules and standards of operation. These best practices would limit regular maintenance activities of large catamarans and vessels using the large concrete pad during fishing tournaments and canoe regatta events to reduce potential traffic congestion or impacts on parking availability. Additionally, the two gate configuration would afford pass through and easier ingress, egress and turning by vehicles pulling trailered boats at the DOBOR harbor, especially during busy periods such as race events. For this reason, work on large vessels would be scheduled to avoid these events and both gates to the main parking area would remain open to facilitate ease in turning movements during high traffic events to the extent practicable.

The proposed action would provide a secure parking site for trailered vessels reducing the need to transit Kahului Beach Road with boats on trailers. This would have a favorable impact on traffic both within the harbor and on the public roadway. At least 20 boaters could safely store trailered boats at the site and use the small boat harbor without bringing their vessel by trailer to the harbor, thereby diminishing the number of trailered vessels using local roadways and eliminating their effect on roadways and traffic in the vicinity. Within the secure parking area, the current porous ground portions of the site and gate access area would be improved with crushed compacted gravel. This would reduce dust and airborne pollution, and prevent mud and debris from being tracked onto roadways or the boat ramp when vessels are transited to and from the water. With the improvements proposed and the reduced number of trips boaters

would have to take with their trailered vessels on Kahului Beach Road, no adverse impacts are anticipated.

7.10 PARKING

7.10.1 Existing Conditions

While parking is random, most trailers and trucks park near the boat ramp along what would be the makai side of the proposed project site. Although some individual vehicles can be seen parking against the boulders that line the mauka perimeter of the site, there is amble parking at other locations within the harbor facility for these displaced vehicles. Based on routine observations over the past year and antidotal evidence, the number of trucks, trailers and vehicles shown in the figure is representative of non-holiday weekend use of the overall parking area. Use of the parking facilities at the Small Boat Harbor varies, particularly between weekdays and weekends, and use increases considerably during holidays and during events such as canoe races or fishing tournaments. The DOBOR facility can become quite busy during these high use periods.

Presently, there is no secure parking at the site available to the public and some boaters may have to leave their truck and trailer unattended, putting their valuables at risk of damage or theft. For those that use the harbor at night or early in the morning, such as fishermen who motor to offshore fish aggregating devices near Hana, the extra concern for the safety of their truck, trailer and equipment may be burdensome or discourage night use of the harbor facility.

7.10.2 Potential Impacts and Mitigation Measures

Figure 7-1 illustrates the project footprint superimposed on the property's existing conditions. Approximately 18 vessel trailer trucks parking are shown in the figure. The project may alter parking habits and orientation; however the project would not remove or encroach on areas presently used for parking tow vehicles and trailers. Although some parking may be displaced, the project would tend to create a more organized, rather than random, parking configuration outside and adjacent to the project site. A considerable benefit would be an increase in the number of secure trailered parking stalls available to the public. Whereas there is no secure parking at the site presently, this project would create a convenient option for users of the Small Boat Harbor who wants to minimize potential damage or theft of their parked trailers and vehicles.

As stated in the facility operation rules (Chapter 3.3), regular maintenance activities of large catamarans and vessels using the large concrete pad would be prohibited during fishing tournaments and canoe regatta events to reduce potential traffic congestion or impacts on parking availability. The two gate configuration would afford pass through and easier ingress, egress and turning by vehicles pulling trailered boats, especially during busy periods such as race events. For this reason, work on large vessels would be scheduled to avoid these events and both gates to the main parking area would remain open to facilitate ease in turning movements during high traffic events to the extent practicable.

Additionally, the project would afford users an option to leave their trailered vessels onsite rather than hauling their vessels to an offsite location which would increase the amount of time an owner could spend boating rather than staging and preparing for boat-based ocean recreation. The project is anticipated to have considerable favorable effect on parking and transportation of vessels and vehicles. The project would expand the recreational opportunities afforded to users of the Small Boat Harbor. The project is not anticipated to diminish the capacity to accommodate public parking needs or the ability to provide sufficient free space for unpaid parking. As such, no adverse impacts on parking are anticipated.

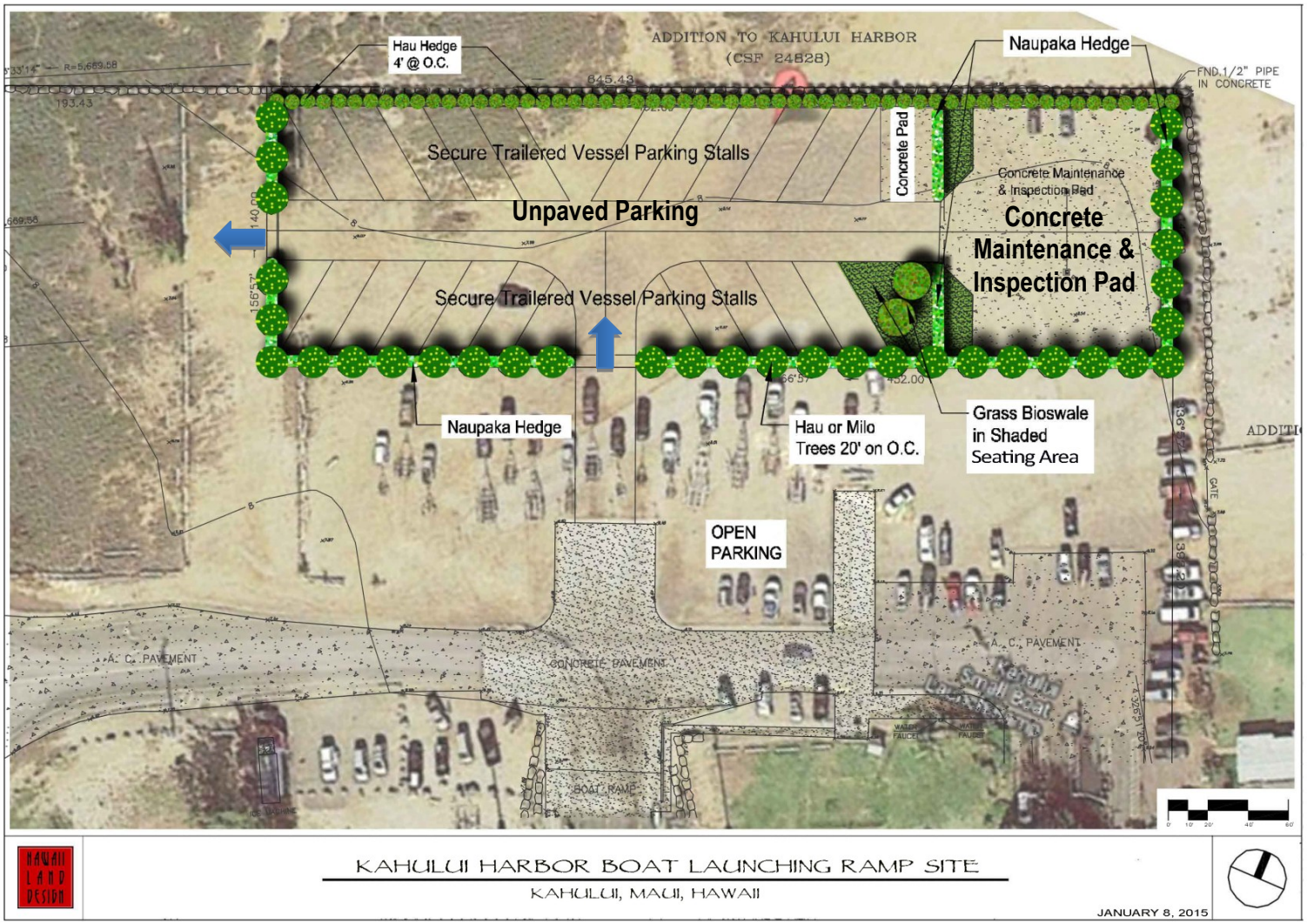


Figure 7-1: Existing uses overlaid with the parking area, pads, swales and entry gates (arrows).

CHAPTER 8
SOCIAL & ECONOMIC CONSIDERATIONS

8.1 POPULATION, EMPLOYMENT AND SOCIO-ECONOMIC IMPLICATIONS

8.1.1 Existing Conditions

Maui County has experienced substantial population growth over the past two decades, including growth in the Hana region. Island-wide, the population grew 28% from ~100,000 to ~128,000 between 1990 and 2000 and to 156,764 by 2011 according to census data (Maui County Data Book, 2012). A U.S. Census report put Maui County's estimated population at 160,195 for 2013, up 3 percent from 2010 (HDOT, 2014). Wailuku had a population of 20,729 people and Kahului had a population of 26,328 according to the 2010 census data.

Median household income adjusted for inflation was $65,558, up about 6 percent from 2011 and 2012; and 44 percent of property owners and 38 percent of renters put 35 percent or more of their family incomes to mortgages and rent respectively (US Department of Commerce, 2013). However, 5.4 percent of Maui County families were below the poverty line. Average family size in 2013 was 3.53 individuals, and more people were divorced that married in Maui.

Among those who identified themselves as one race, whites were the highest portion of the population at 34 percent with 53,262 people and Asian with 44,592 people. The third largest ethnic group were persons of mixed race at 36,385, followed by Native Hawaiian and Pacific Islanders with 16,102 people based on 2010 census data. The median age of residents was 40.3 years and there were slightly more men (50.9 percent) than women (49.1 percent) according to the aforementioned study (American Community Survey, 2013).

Economically, three quarters of the 82,975-member workforce 16 years and older were employed in the private sector and 17 percent of the workforce or 11,928 jobs were in government and 9 percent were self-employed in 2013 (Maui County Data Book, 2012 and HDOT 2014). There was a slight increase in the percentage of government workers and a slight decline in the percentage of private sector workers compared to 2012. The largest sectors of employment were in arts, entertainment and recreation, and accommodation and food services at 21.4 percent (18,069 jobs); educational services and health care and social assistance at 17.8 percent (12,616 jobs); and followed by retail trade, 11.8 percent and agriculture. There were 1,156 farms located in Maui County in 2007 covering approximately 225,568 acres, of which 54,557 were crops including 34,500 acres of sugarcane. The average farm size was 195 acres and the median farm size is 5 acres.

The average monthly cost for a homeowner with a mortgage was $2,261, whereas the average monthly rent was $1,292. The median value of housing in the county in 2010 was $614,600 and is increasing. In addition, nearly 10% of the resident population reported having a disability (9.5%)(HDOT 2014).

8.1.2 Potential Impacts and Mitigation Measures

The proposed action would have no impact on population growth. In the short-term, the proposed construction activities would have positive economic effects such as supporting workers and local purchases of materials.

In the long-term, the project would encourage small boater safety by providing a convenient and economical means to conduct vessel repairs and safety inspections. Providing a location for these services on Maui, as opposed to the neighboring islands of Oahu and the Island of Hawaii, would help keep expenditures for these services in the local community, which is beneficial. No adverse impacts to the economy of Maui or Lahaina are anticipated.

8.2 ARCHAEOLOGICAL AND CULTURAL RESOURCES

8.2.1 Existing Conditions

Prior to 1960, the subject parcel did not exist and was under water. The eastern side of the breakwater consisted of a long, man-made, rock revetment that was constructed to create the harbor and minimize wave exposure to its users. According to the County's 1961 Land Zoning Map No. 3, the project site was entirely submerged. The West Breakwater was created from the materials dredged from the harbor between 1960 and 1987. The site is comprised of reclaimed filled land made up of coral fragments, bottom sediments and dredge spoils. These materials have been heavily disturbed during the harbor dredging process.

In 2010, Scientific Consultant Services, Inc. conducted an archaeological survey along 1700 feet of the harbor's inner shoreline adjacent to Kahului Beach Road (HDOT, 2014). They also conducted a cultural impact assessment of the area. The State Historic Preservation Division (SHPD) concluded that further testing of the bay's inner shoreline was not necessary for HDOT's proposed protection of the Kahului Beach Road. An inventory survey conducted for that project identified eight archaeological studies around the perimeter of Kahului Bay and earlier research indicates nearly two dozen archaeological studies have been completed around the vicinity of the harbor (HDOT 2007, 2014). The studies of these sites identified cultural deposits of remnants of the old Kahului Railroad Bed, historic refuse, as well as early pre-contact artifacts, midden, and scattered human remains. However, none of these sites were on the subject parcel or within close proximity to the project site, namely because it was underwater in the past. As such, the likelihood of encountering historic artifacts or burials is very low at the project site.

Historically, several seeps were located along the western corner of the bay. These seeps bring freshwater to mix with seawater creating favorable conditions for certain species of fish. The existing floating boat dock, rock revetment and shoreline next to Kahului Beach Road is used by fishermen to catch ʻopae (shrimp), ʻamaʻama (mullet, *Mugil cephalus*) and ulua (Carangidae spp.). The shoreline area between the West Breakwater to the Maui Beach Hotel is used intermittently throughout the year to fish for papio (Carangidae spp.) and to gather limu (HDOT, 2014). Diving and spear-fishing for octopus (tako or heʻe) takes place within the harbor when conditions offer clear water and good visibility (McGerty and Spear 2001 in HDOT, 2014). The Hanapaʻa Fishing Tournament is held in West Maui during the summer (July) and boater's use the West Breakwater small boat harbor ramp to launch and transit to West Maui.

During the winter season, surfing, standup paddling and jet-skiing occur regularly on the western side of the bay inside the harbor. Canoe club paddling for practice and competition are common within the harbor. Hawaiian Canoe Club has a canoe hale and storage facility along the sandy shoreline on the eastern side of the bay near the commercial harbor. Canoe and paddle races, such as the Maliko Gulch run use the West Breakwater small boat harbor ramp to stage chase boats and launch motorized vessel support for these races.

8.2.2 Potential Impacts and Mitigation Measures

The project site is on filled land that was submerged prior to the 1960s. The ground is made up of dredge spoil and fills material from past dredging operations in the Kahului Harbor. Given that the area was historically submerged, there would be minimal traditional and customary native Hawaiian practices that occur on or within the proposed project area. Presently, there are many cultural and recreational activities that occur in and around the Kahului Harbor. However, the proposed project would not adversely affect cultural resources or hinder customary or traditional shoreline access, gathering rights, or the exercise of native Hawaiian rights, or any ethnic group, related to gathering, access or other customary activities. The availability of safe secure parking for boats, trailers, and trucks would help contribute to the various activities at the harbor. Should cultural artifacts or remnants be encountered during ground altering activities, all work would cease and the SHPD contacted immediately. No adverse impacts are anticipated.

8.3 VISUAL RESOURCES

8.3.1 Existing Conditions

Kahului Beach fronts the harbor and ocean offering views of the island, ocean, and mountains. At high points on the road, there are distinctive views of Kahului Harbor and ocean. The Scenic and Historical Resources section of the Maui County General Plan 2030 and the Technical Supplement No. 8: *Identifying and Managing the Scenic Resources in Hawaii's Coastal Zone*, did not identify the roadway's visual resources as critical for protection (Figure 8-1). However, the study recommends that a landscape plan be developed for the harbor that beautifies the area and is sensitive to the seaward view potential. The MIP also discourages development on Conservation designated lands that disrupts scenic landscapes.

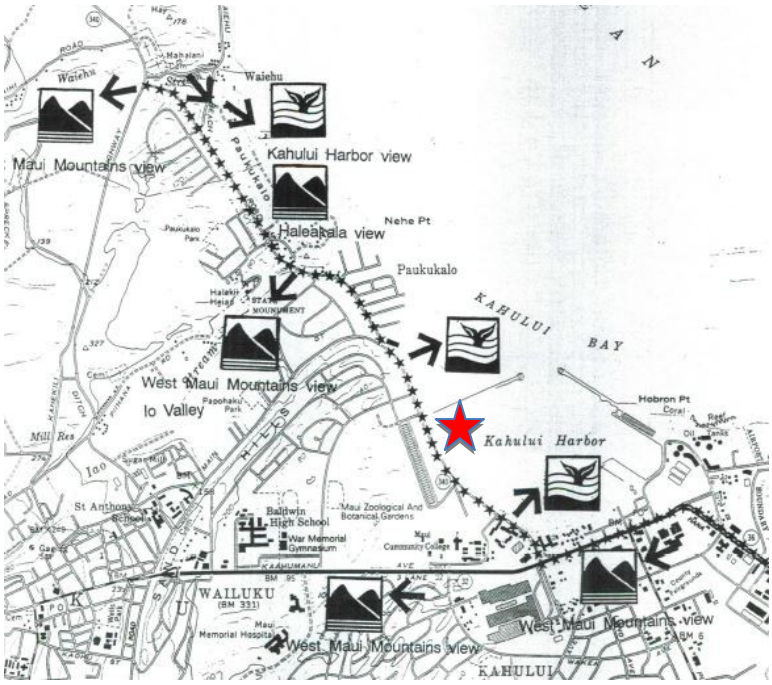


Figure 8-1: Scenic views identified from Kahului Beach Road.

Views from inside the harbor to the project site are hindered by the rise in topography, the boat ramp, and the rock revetment along the water's edge. Views across the harbor from the roadway or the shoreline near the commercial harbor are expansive and the project's visual footprint is minimal in its context. Large trailered vessels located at the project site would only be partially visible from across bay.

Views of the harbor, mountains, and ocean can also be experienced from several upland locations such as Ke'opuolani Regional Park. The Park is located across and uphill from Kahului Beach Road and has several soccer and playing fields along its hillside. However, views of the project site and trailered vessels are mostly obstructed by a line of ironwood trees along Kahului Beach Road and topography. For example, a large trailered vessel parked at the project site is not readily apparent in Figures 8-2 to 8-8 that were taken from the surrounding neighborhood, Ke'opuolani park playing fields and playground, and Kahului Beach Road. As shown in Figure 8-9, a large trailered vessel at the proposed project site has minimal imprint within the landscape of the small boat harbor and its surrounding scenery.

8.3.2 Potential Impacts and Mitigation Measures

Landscaping with Hau and Naupaka shrubs would provide an attractive visual screening of the project site and would improve the scenery in an otherwise devoid, barren, vacant spot on the West Breakwater. A large trailered vessel is unlikely to be acutely visible in the background of the overall harbor, either from within the harbor due to topography, or from sandy shorelines opposite the West Breakwater given the wide expanse and small view print of any vessel parked at the site. Furthermore, vessels parked at the site are commonplace given the parcels use as a small boat harbor and thus any trailered vessels would not be out of character for this environment. Identified scenic views would not be obstructed or substantially altered due to the presence of trailered vessels and use of the project site. Given its small footprint, large trailered vessels at the project site do not appear to disrupt the views or scenery from surrounding and upland uses and locations. No adverse impacts to visual resources are anticipated.

Figure 8-2: View from the residential neighborhood along Liholiho Street above the harbor.

Figure 8-3: View from the soccer field bleachers at Ke'opuolani Regional Park.

Figure 8-4: View from the Ke'opuolani Regional Park lower parking area.

Figure 8-5: Makai view from the Ke'opuolani Regional Park play ground.

Figure 8-6: Treeline and berm along the makai edge of the Ke'opuolani Regional Park playground.

Figure 8-7: View from Kahului Beach Road.

Figure 8-8: View of the shoreline along Kahului Beach Road

Figure 8-9: View from the small boat harbor access drive.

8.4 RECREATIONAL RESOURCES

8.4.1 Existing Conditions

One hundred years ago, the shore of the harbor was a sandy beach used as a canoe landing site and the shallow reef in the harbor was popular for surfing. Since that time two breakwaters were constructed to protect the harbor with a 600-foot wide entrance channel between them and only a small portion of the original sandy beach remains, primarily on the east side of the harbor. There are many recreation activities that occur within the harbor and its immediate surroundings. Common recreational activities include outrigger canoe paddling, kayak and one-person outrigger canoe paddling, surfing, body boarding, stand up paddling, surf skis, jet-skiing, boating, pole fishing, spear fishing, seaweed limu gathering, and swimming, among others.

Outrigger canoeing and racing is a major year-round activity with many events taking place in the harbor. Two canoe clubs practice in the harbor's waters, the Hawaiian Canoe Club and Na Kai Ewalu. Laeula o Kai, a canoe club based in Kanahā Beach Park north of the harbor, also practices in the harbor on occasion. Organized practice for children and adults begin March and the summer regatta season begins in June. Practices and races continue with the long-distance paddling season beginning in August and finished with the October Molokaʻi-to-Oʻahu races. High school paddling begins in November after the Molokaʻi races and ends in February. The Maui County Hawaiian Canoe Association schedules regatta events and the sport attracts a wide age range of participants. Canoe hales, storage and support buildings are located along the sandy shore of the eastern side of the harbor adjacent to Hoaloha Beach Park. Canoe practices and races occur throughout the year and practices benefit from the more quiescent waters and protection from large ocean swell afforded by the harbor and its breakwaters.

Swimming occurs primarily at Hoaloha Beach on the east side of the Harbor. Due to the murky and sometimes polluted water conditions, the beach is not considered a favored swimming area by many, but is easily accessible from Hoaloha Park and the adjacent canoe club has outdoor showers making it an attractive location. Some swimming, primarily by children from the neighborhoods near the harbor or with family outings also occurs off the floating dock at the small boat harbor launch ramp on the West Breakwater.

Surfing in and around the harbor is a recreational pastime spanning a hundred years or more. The surf sites within the harbor are best during large north swells with no wind or a light kona wind that blows offshore in the harbor. Surfers and the spectators that watch them typically park on the West Breakwater near the small boat harbor launch ramp. There a few smaller surfing and body boarding sites located off the beach fronting Hoaloha Beach

The type of surfing depending on the size of the waves, but may include body boarding, long board, short board surfing, stand-up board using paddles, surf ski, single outrigger canoe surfing, kayak surfing, and wave-ski surfing. Kite surfing and wind surfing are popular north of the harbor at Kanaha Beach Park but does not occur in the harbor or along the outside of the breakwaters.

The primary surfing sites in the harbor are defined by the edge of the turning basin and include, from west to east:

Jetties - on the edge of the reef between the West Breakwater and the channel from the boat-launch ramp to the turning basin used primarily for body boarding during large surf conditions.

Old Mans - located on the edge of the reef on the east side of the channel from the boat-launch ramp to the turning basin. The take-off spot is just inside a buoy that marks the edge of the turning basin for ships and the site is good for long boards.

Buoys, Middle Lefts or Harbor Lights – is located on the edge of the reef offshore from the Harbor Lights condominium complex.

Charthouse - located off shore of Hoaloha Beach near Pier 2.

Ledges - located outside of the harbor on the west side of the West Breakwater. The site is best during the winter months with overhead-sized waves.

Fishing is both a subsistence, cultural, inter-generational and recreational activity common at the harbor. Shoreline fishing areas along the beach within the harbor and from the rock revetments along the edge the West Breakwater is commonplace. However, in the past, there have been user conflicts between akule fishers, pole fishers, and other fishers in the harbor. For safety reasons, net fishing is prohibited within the turning basin and no fishing is allowed within the security zone around the commercial portion of the harbor (Piers 1 and 2).

Schooling fish such asakule (big-eyed scad, *Selar crumenophthalmus*) often come into the harbor. In addition, halalū (juvenile akule), pāpiʻoor juvenileulua (giant trevalley, *Caranx ignobilis*), mullet (ʻamaʻama, *Mugil cephalus*), and nehu (anchovy, *Encrasicholina purpurea*) can be found in the harbor's waters. Nehu can be netted as bait fish for aku fishing (skipjack tuna, *Katsuwonus pelamis*) and Pāpiʻo are found around the schools, where they feed on the nehu. With Harbor Master permission, commercial fishers may use surround nets in the harbor basin to catch large schools of akule when they come into the harbor. When halalū come in the harbor, usually on the east side around Piers 1 and 2, they can be caught only with a hook and line and no lay nets can be used.

When water clarity is good, spear diving for octopus (tako or heʻe, *Octopus cyanea*) and reef fish occurs on the shallow reef in the harbor. However, the corner of the reef near the intersection of Kaʻahumanu Avenue and Kahului Beach Road accumulates floatable debris and is often avoided due to impaired water quality. Night diving occurs on the reef in the harbor and along the interlocking tetra pods that form the outer end of the West Breakwater.

Throw-net fishing for various schooling fish occurs mainly off Hoaloha Beach and the pocket beaches fronting the Maui Beach Hotel. Some fishing for ʻoama (juvenile goatfish, *Mulloides flavolineatus*) occurs in the harbor, primarily by the DLNR small boat harbor launch ramp, where they congregate on a small sandbar.

The DLNR regulates fishing and gathering in the harbor. A fishing check-in station next to the small boat harbor ramp has maps and posts a DLNR published pamphlet describing limits in three areas of the harbor.

Area 1 - located from the shore between Piers 1 and 2 to a line from the base of Pier 2 to the southernmost corner of the building on Pier 1.

Area 2 - located from the shore between Pier 2 and the extension of Puʻunēnē Avenue to a line from the northwestern corner of Pier 2 to the intersection of the shore and the Puʻunēnē Avenue extension.

Area 3 - located at the small boat harbor launch ramp on the West Breakwater. The area is located west of a line that follows the inner edge of the west breakwater to the shore at Kahului Beach Road. Fresh water springs are found in this corner of the harbor, and mullet congregate there to feed on seaweed. Signs are posted on the shore.

Gathering seaweed, or limu, for sustenance and recreation has occurred for many years along the shoreline and on the shallow reef near Kahului Beach Road inside the harbor. The fresh water seeps that mix with salt water create favorable habitat for limu. At one time, there was abundance of limu, but given anthropogenic influences and other factors the abundance and presence of limu has declined. A more recent phenomena is aquarium collecting. Some salt water aquarium owners gather sand for their aquariums from the ocean bottom on the east side of the harbor believing the sand has an abundance of nutrients and that it is good for the marine life in their aquariums.

The Maui Ocean Center has a scientific collection permit to gather fish, coral, and other marine life. The harbor is a nursery for hammerhead sharks (manokihikihi; *Sphyrna lewini*) and pups are collected using a hook and line, primarily from shore at Hoaloha Beach. Collection of fish, such as to‘ao, or black tail snappers (*Lutjanus fulvus*) occurs where the reef drops off into the turning basin near the red buoys. The Center also has permission to collect feather-duster worms and sponges by hand on the reef. Recent efforts to ban or regulate the aquarium trade bring to light the complexity of the activity as it is recreation for some, a commercial enterprise for others, and serves educational purposes for certain sectors.

The County of Maui under the administration of Mayor Alan Arakawa gave the Senior Boaters Club, permission to build a clubhouse and landscape a small area along the West Breakwater. The Hale Kiawe is located at the end of the access drive for the DOBOR small boat harbor launching ramp and just beyond the trailered vessel wash down areas. The Club moved into the present site on June 30, 2006. Previously, they had been on state land closer to the boat-launch ramp for approximately 25 years. The club is comprised of about 70 retirees most of whom are over age 60. Hale Kiawe club members fish in the harbor for species such as pāpi‘o and ulua. Fishing is primarily from the boulder revetment, adjacent to their club house.

8.4.2 Potential Impacts and Mitigation Measures

The proposed action would not deter or diminish the range of recreational activities that occur within the harbor or along its shores. The project site is located well-inland of the harbor’s shores and would not adversely affect recreational activities that use the harbor or the West Breakwater. The proposed secure parking area would be beneficial to boat owners in terms of gaining quick and convenient access to their vessel for ocean recreation activities. Chase and support boats for outrigger canoe races would also benefit by having a secure location to park their boats, trailers and trucks, as well as an impervious surface area to inspect and repair their boats, if needed. Both the U.S. Coast Guard and rescue operations would benefit by having a dedicated, secure location on the north shore of Maui for staging, inspection, haul-out, and maintenance purposes. The larger of the grassy swale areas would accommodate a vegetated area fringed by Naupaka and would be allocated to a future, traditional, open air, pole hale pavilion in the event that the boating community wanted to create a shaded gathering area.

The proposed action is intended to help support the diversity of small boat ocean recreation activities and their needs to operate safely, efficiently and stage quickly. The proposed action is not anticipated to diminish recreational resources or adversely affect recreation in the harbor or on the West Breakwater. No additional mitigation is proposed.

CHAPTER 9
RELATIONSHIP TO LAND USE PLANS & POLICIES

9.1 OVERVIEW

The following subsections review the property's present land use entitlements and directives for land use provided by the state, county, and community. Consistency determinations in each subsection are equivalent to an "Evaluation of Impacts and Mitigation".

9.2 HAWAII STATE PLAN

The Hawaii State Plan is codified as HRS Chapter 226 and sets out broad goals and objectives for land use, development and conservation strategies in Hawaii. For example, Section 226-11(b)states that to achieve land-based, shoreline and marine resources objectives, it is the policy of this State to:

(3) Take into account the physical attributes of areas when planning and designing activities and facilities.

(9) Promote increased accessibility and prudent use of inland and shoreline areas for public recreational, educational, and scientific purposes.

Additionally, Section226-19provides direction in the context of the socio-cultural advancements in leisure activities as follows:

(a) To achieve the housing objectives, it shall be the policy of this State to:

(2) Enhance the enjoyment of recreational experiences through safety and security measures, educational opportunities, and improved facility design and maintenance.

Relative to transportation, Section 226-17 states:

(b) To achieve the transportation objectives, it shall be the policy of this State to:

(2) Coordinate state, county, federal, and private transportation activities and programs toward the achievement of statewide objectives.

(4) Provide for improved accessibility to shipping, docking, and storage facilities.

(6) Encourage transportation systems that serve to accommodate present and future development needs of communities.

(8) Increase the capacities of airport and harbor systems and support facilities to effectively accommodate transshipment and storage needs.

9.2.1 Consistency

The design of the parking, maintenance and vessel storage facility would enhance ocean access for small boat users. The facility would enable small boaters to park their vessel onsite rather than have to haul the vessel to a private location further away. The improvements would offer far greater convenience for boaters to maintain their vessels and increase the capacity of the DOBOR harbor facility to support recreational boating needs in close proximity to the DOBOR boat ramp. The proposed action would provide improved accessibility for docking and storage, as well as improving access for the present and future members of the boating community. For these reasons, as well as others described in this document, the proposed action is consistent with the objectives of the broad goals, objectives and policies of HRS Chapter 226, the Hawaii State Plan.

9.3 HAWAII STATE FUNCTIONAL PLANS

Part II of the Hawaii State Plan (HRS 226) establishes a statewide planning system to coordinate and guide all major state and county activities and to implement the overall theme, goals, objectives, policies, and priority guidelines. The system implements the state plan through the development of functional plans and county general plans. Functional plans set forth the policies, statewide guidelines, and priorities within a specific field of activity, when such activity or program is proposed, administered, or funded by any agency of the state. Functional plans are approved by the governor and serve as guidelines for funding and implementation by state and county agencies (HRS § 226-57).Part III of the law establishes priority guidelines in seven key topical areas including; economic growth, population growth, crime and criminal justice, affordable housing, education, sustainability, and climate change adaptation. Although primarily intended to guide government actions, relevant excerpts from two of the topical areas are described below.

> HRS §226-108: Sustainability. Priority guidelines and principles to promote sustainability shall include:
>
> > (2) Encouraging planning that respects and promotes living within the natural resources and limits of the State;
> >
> > Emphasizing that everyone, including individuals, families, communities, businesses, and government, has the responsibility for achieving a sustainable Hawaii.
>
> HRS §226-109: Climate change adaptation priority guidelines. Priority guidelines to prepare the State to address the impacts of climate change,
>
> > (6) Explore adaptation strategies that moderate harm or exploit beneficial opportunities in response to actual or expected climate change impacts to the natural and built environments;
> >
> > (10) Encourage planning and management of the natural and built environments that effectively integrate climate change policy.

9.3.1 Consistency

According to various documents and presentations from the University of Hawaii, School of Ocean and Earth Science over the past few years, sea level has risen 9 inches over the past century in Maui, Hawaii (Fletcher et al., 2002, 2003). The rate of sea level is predicted to grow exponentially over the next hundred years. As a result, storm water drainages will have less head pressure and may not drain properly if they are too close to the water table elevation. In addition, rain events are predicted to become more severe overall and volumes of rainfall are expected to increase. To be sensitive to these potential changes, the proposed subsurface drainage system for the project has been designed to accommodate extra volumes of rainfall and storm runoff from the concrete pads and to discharge these into a subsurface catchment and retention system that is well above the water table.

In addition, the plants selected for landscaping the exterior of the parking areas perimeter fence and grassy swales would be climate-adapted, drought tolerant species. This will enable the plants to survive with minimal irrigation support.

By incorporating resiliency to climate change in the project's design, such as landscape plantings and drainage systems, the facility is less likely to be adversely effected by climate change and/or sea level rise. Accordingly, the proposed action conforms to the broad guidelines and intent of the State's functional plan.

9.4 STATE LAND USE

State Land Use designations are set forth in HRS Chapter 205. Hawaii's lands are categorized into four land use districts: Urban, Agriculture, Rural, and Conservation. The project is located entirely within the Conservation District (Figures 9-1 and 9-2). Pursuant to HRS 20505, County zoning and community plan designations don't apply to Conservation lands, however County-approved ministerial approvals such as electrical permits are usually a requirement of Conservation District Use Permits.

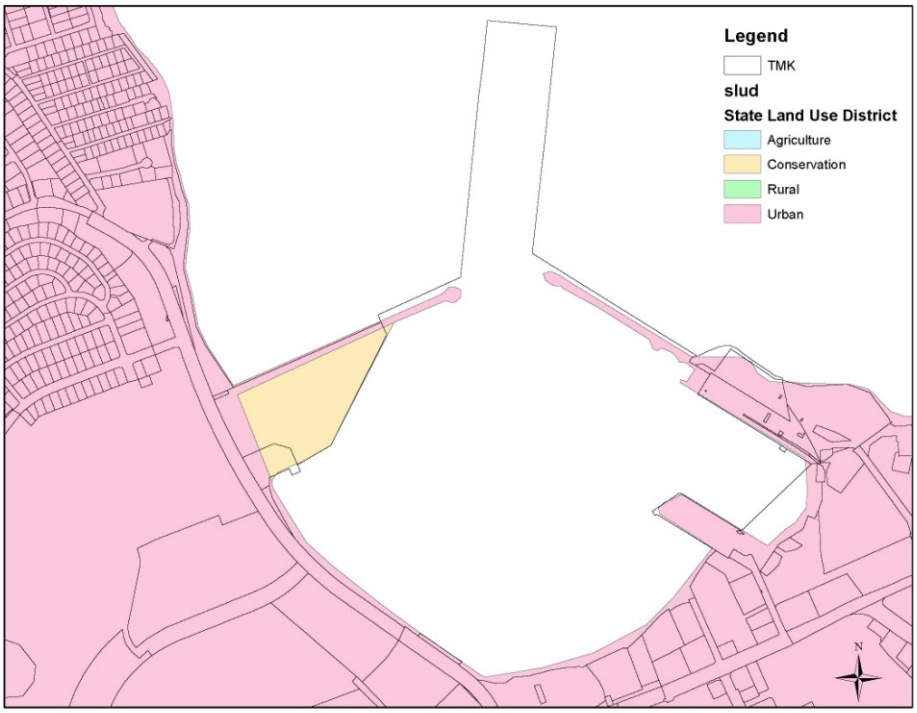


Figure 9-1: The State Land Use map designates the parcel as Conservation.

9.5 CONSERVATION DISTRICT SUBZONES

Within the Conservation District, HRS Chapter 183C empowers the Board of Land and Natural Resources (BLNR) to establish categories of uses or activities on conservation lands, and restrictions, requirements, and conditions consistent with the standards for use of conservation lands. Accordingly, conservation lands are categorized into five (5) subzones and regulated pursuant to HAR Section 13-5 of the DLNR.

These subzones range from permissive to very restrictive, depending on the ecological and public trust resources being conserved. Subzone categories include Protective, Limited, Resource, General and Special. HAR 13-5-22 through 25 identifies allowable uses within each subzone. Uses that are permissible in a more restrictive subzone are allowed in each of the subsequent less restrictive subzones. Thus, identified uses in the Protective subzone are allowable uses in the Limited, Resource and General subzones. Additionally, each subzone has four different types of approvals, each with its own specific process. These range from public decision making to simple site plan approvals. Types of approvals include: a Board approval which is held during a public hearing, Board approved management plan, Department (administrative) permit, administrative approval of a site plan, and no administrative or Board approval requirements.

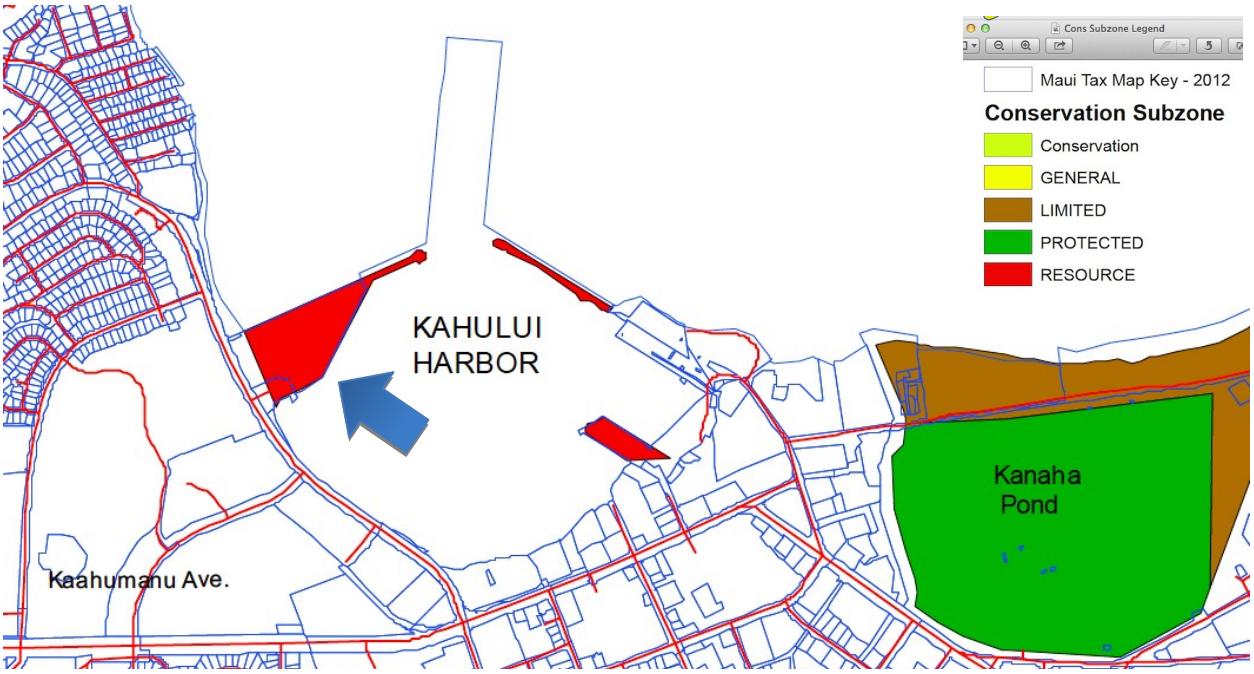


Figure 9-2: Conservation Subzones at the subject property.

9.5.1 Resource Subzone

The subject area is located entirely within the Conservation District Resource subzone (Figure 9-2). The purpose of the Resource subzone (HAR 13-5-13) is to protect and manage lands that are:

- potential future parkland and lands presently used for parks,
- suitable for timber operations,
- suitable for outdoor recreational uses such as hunting, fishing, hiking, camping and picnicking,
- offshore islands, except for those in more restrictive subzones, or
- marine waters.

9.5.2 Identified Uses

Activities allowed in the Resource subzone include those listed in the Protected and Limited subzones. HAR Section 13-5-22 identifies Public Purpose Uses (P-6)(D-1) approved by the Board as a permissible use within the Protected and Resource subzones.

P-6 PUBLIC PURPOSE USES

(D-1) Land uses undertaken in support of a public service by an agency of the county, state, or federal government, or by an independent non-government entity. Examples of public purpose uses include but are not limited to public roads, marinas, harbors, airports, trails, public water works and other utilities, energy generation from renewable sources, communication systems, watershed and conservation projects, flood or erosion control projects, recreational facilities, and community centers intended to benefit the public in accordance with public policy and the purpose of the conservation district.

Additionally, there are several other identified uses in HAR Section 13-5-22 that would permit the proposed action. For example, (P-8)(D-1 and C-1) Existing Structures and Land Uses and (P-13)(C-1 and B-2) Land and Resource Management. Section 13-5-23 (L-2) identifies Landscaping as a permissible use in the Limited and Resource subzones. Uses identified with a D-1 require Board approval, C-1 uses require a Department approval, and B-1 requires a site plan approval

9.5.3 Consistency

The proposed action is consistent with the uses identified within the Protected, Limited and Resource subzones described above. More specifically, the proposed action is being undertaken by an independent non-government entity in support of DOBORs efforts to promote ocean and recreational boating and would benefit the public in accordance with the public policy that established the site and the purpose of the small boat harbor. As such, the proposed action is consistent with a public purpose use as described HAR 13-5-22 (P-6)(D-1).

The parcel is dedicated to DOBOR as a small boat harbor facility and is an existing boat ramp recreation site with various supporting amenities. The proposed improvements would occur on a 1.453 acre portion of the 6.1 acre DOBOR facility, or approximately 24% of the property. Within the 1.453 acre (63,293 square feet) project site, the installation of two concrete pads for vessel maintenance and inspections would alter approximately 14,000 square feet, or 22% of the area. As a result, the proposed improvements would be considered “moderate”, as defined in HAR 13-5-2, because they alter more than 10%, but less than 50%, of the DOBOR facility and/or project site.

Landscaping would be installed within a six (6) foot buffer along the outside of the 452 foot long, 140 foot wide, perimeter chain link fence. This would equate to an area of 7,104 square feet in landscape plantings and is consistent with identified uses in the limited subzone, as L-2 (C-1), and less restrictive resource subzone. Additionally, rows of Naupaka would be planted between the concrete pads and grassy swales, and the swales and unpaved parking area, adding approximately 600 square feet, for a total of approximately 7,700 square feet.

The proposed action is a permissible and consistent with uses identified for the Conservation District Resource subzone. A Conservation District Use Permit would also be obtained and no further mitigation measures are proposed.

9.6 COUNTYWIDE POLICY PLAN AND GENERAL PLAN

The Countywide Policy Plan (CPP)for Maui acts as an over-arching values statement and provides a policy framework for the Maui Island Plan and individual Community Plans. The CPP was adopted by ordinance 3732 on March 24, 2010 and sets forth guidance for the County’s growth to year 2030.. The CPP provides broad goals, objectives, policies, and implementing actions that portray the desired direction of the County's future over a twenty-year period. The CPP is the outgrowth of, and includes the elements of the earlier General Plans of 1980 and 1990.

The CPP includes:

1. A vision statement and core values for the County to the year 2030,
2. An explanation of the plan-making process,
3. A description and background information regarding Maui County today,
4. Identification of guiding principles, and
5. A list of countywide goals, objectives, policies, and implementing actions related to core themes.

There are two sections of the CPP that are particularly relevant to the proposed action. First, Section IV of the CPP, pages 64, provides several county-wide goals, objectives, policies, and actions including:
G. Improve Parks and Public Facilities

Goal: A full range of island-appropriate public facilities and recreational opportunities will be provided to improve the quality of life for residents and visitors.

Objective:
1. Expand access to recreational opportunities and community facilities to meet the present and future needs of residents of all ages and physical abilities.

Policies:
Implementing Actions:

a) Protect, enhance, and expand access to public shoreline and mountain resources.
h) Expand affordable access to recreational opportunities that support the local lifestyle.

Second, Section IV of the CPP, pages 66-69, provides several county-wide goals, objectives, policies, and actions. Among these are:

H. Diversify Transportation Options

Goal: Maui County will have an efficient, economical, and environmentally sensitive means of moving people and goods.

Objective:
4. Improve opportunities for affordable, efficient, safe, and reliable ocean transportation.

Policies:

a) Support programs and regulations that reduce the disposal of maritime waste and prevent spills into the ocean.
b) Encourage the upgrading of harbors to resist damage from natural hazards and disasters.
c) Encourage the State to study the use of existing harbors and set priorities for future use.
d) Explore all options to protect the traditional recreational uses of harbors, and mitigate harbor-upgrade impacts to recreational uses where feasible.
e) Encourage the upgrading of harbors and the separation of cargo and bulk materials from passenger and recreational uses.
f) Encourage the State to provide for improved capacity at shipping, docking, and storage facilities.
g) Encourage the State to provide adequate parking facilities and transit connections within and around harbor areas.
h) Encourage the redevelopment and revitalization of harbors while preserving historic and cultural assets in harbor districts.
i) Encourage the State to provide adequate facilities for small-boat operations, including small-boat launch ramps, according to community needs.
j) Support the maintenance and cleanliness of harbor facilities.
k) Support the redevelopment of harbors as pedestrian-oriented gathering places.

9.6.1 Consistency

The proposed action includes publicly available impervious surface areas with attendant treatment systems to help capture and treat potential pollution, spills and runoff that could otherwise enter the ocean during vessel repair and maintenance activities. The proposed action enhances access to the ocean and the island's coastal and shoreline resources by providing a convenient means for boaters to quickly prepare and launch their vessel. While out to sea, boaters would have the ability to park their towing vehicle in a secure location. This would reduce and alleviate concern over theft, break-ins and vandalism while the vehicle was left unattended during boating recreational activities. The added security would tend to reduce the vessel owner's worry and could improve their boating experience. The proposed action would add to the range of amenities and services offered at the small boat harbor and would help expand the ease of access, both in terms of location and timing, to boating recreational activities for the community. Overall, the project contributes to the revitalization of the West Breakwater. The proposed action agglomerates similar harbor uses by redeveloping existing vacant space rather than constructing new facilities elsewhere along an undeveloped portion of Maui's coastline. Enhancing exiting facilities is more

effective and convenient for the boating public than having such services located in disparate and uncoordinated locations. Based on the above, the proposed action is consistent with the CPP.

9.7 MAUI ISLAND PLAN

The Maui Island Plan (MIP; Maui County, 2012) was adopted on 12/28/2012 and provides direction for future growth, the economy, and social and environmental decisions on the island through 2030. The MIP establishes a vision, founded on core values that break down into goals, objectives, policies, and actions. The MIP looks comprehensively at many factors that influence the physical, social, and economic development of the island. The MIP establishes a Directed Growth Strategy, which identifies areas appropriate for future urbanization and revitalization. The MIP also identifies and addresses key environmental, housing, and economic development issues relevant to Maui's current and future generations.

Key highlights of the Plan include:

- Adoption of a Directed Growth Plan. Growth areas are established where future growth is desired. This will make development more predictable, including County service and infrastructure providers and will help reduce development costs, provide more affordable housing, and lower taxes to the public.
- Protection of Maui's Small Towns and Rural Character. Outside of growth areas development will be limited to preserve our agricultural lands and open space. This will "keep the country - country".
- Affordable Housing. Maui will have safe, decent, appropriate, and affordable housing for all residents developed in a way that contributes to strong neighborhoods and a thriving island community.
- Protection of Watersheds and Coastal Resources. Watershed and coastal zone management will be integrated to protect those areas of the island that contain critical marine resources, including coral reefs.
- Economic diversification. Promote emerging industries such as high technology, renewable energy, niche tourism, local agriculture, health care, entertainment, and education.
- Integration of Land Use and Infrastructure Planning. Implement a framework to ensure that infrastructure and land use planning functions are integrated, so that infrastructure can be provided more effectively and efficiently.

There are three principal aspects of the MIP that are appropriate to consider in context of the proposed action. These relate to directing growth, parks and ocean transport. First, the project is located within the urban growth boundary of the MIP and is therefore consistent with reducing sprawl and agglomerating similar coastal dependent facilities together. Second, although the Western Breakwater is State land, it has previously been considered for Park development. Third, the subject parcel is an integral component to Maui's harbor infrastructure.

9.7.1 Urban Growth Boundaries

Focusing growth in areas that already have or are planned to have infrastructure will provide for less costly services, reduced commuting, protect community character, and preserve agriculture, open space, and cultural and natural resources. The MIP includes goals, policies, programs and actions, which are based on an assessment of current and future needs and available resources. The MIP is intended to be the principal tool for decision makers to evaluate public and private projects and their impacts on land use, the economy, environment, infrastructure, and cultural resources. The project site is within the urban growth boundary (Figure 9-3).

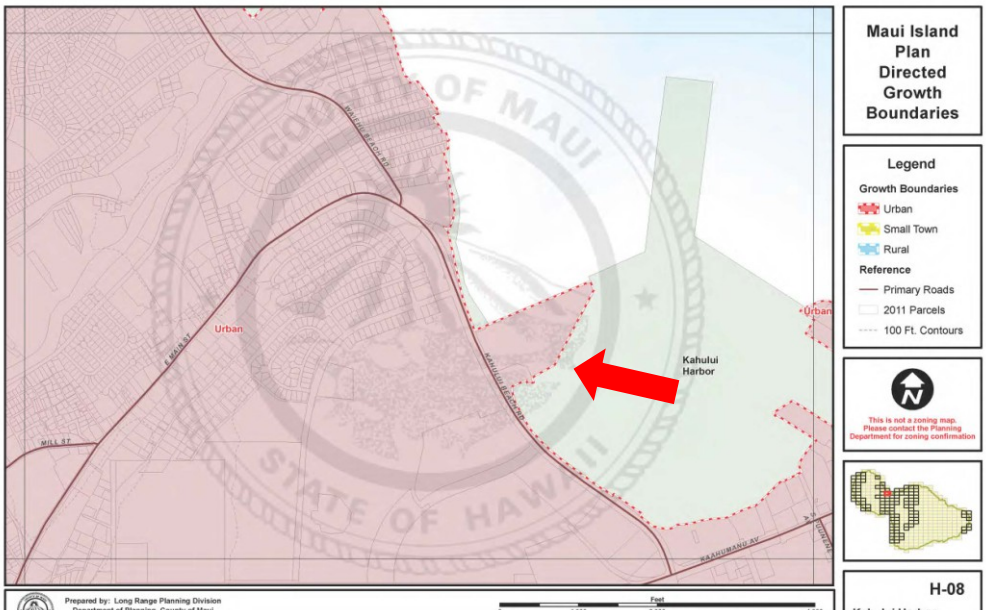


Figure 9-3: The MIP designates the area to be within the urban growth boundary.

9.7.2 Parks

Within the MIP, the Wailuku-Kahului region contains more parks per capita than any other community plan area on the island of Maui. Since many of the community's parks provide region-wide facilities, they are used by residents of other communities. The community plan area has approximately 186 acres of sub-regional park land and 377 acres of regional parks. Based on current de facto population, the area is deficient in sub- regional park lands by approximately 477 acres. Future projections to 2030 indicate that this deficit will increase to 541 acres.

Mayor Arakawa also has plans to expand Keʻopuolani Regional Park considerably, which is located across Kahului Beach Road from the DOBOR small boat harbor. The Park is the largest park in Maui with 110 acres that include seven playing fields, a pool, a gym, skate park, and amphitheater. According to the MIP, the scarcity and cost of suitable parkland necessitate that appropriate park sites be identified early in the planning process to allow sufficient time to acquire sites with favorable topography, access to infrastructure, and locations that could serve the dual purpose of meeting a community's recreational needs while serving as visual relief and open space between and within communities.

The West Breakwater was given to the County in years past, however the County returned the area to DLNR due to constraints and challenges in developing the area for public purpose uses.

Implementing Actions

6.6.1 Action 2. Identify community partners for the maintenance and ownership of community park facilities.

6.6.2.j Support public-private partnerships to implement the acquisition and development of parks when consistent with the General Plan.

6.6.2.k Support a coordinated program to improve, operate, and maintain joint-use facilities and grounds.

6.6.3-Action 1 Amend development regulations to ensure the construction of adequate parking with pathways near shoreline access points

9.7.3 Consistency

The project is not in a park and community plan designations do not apply to Conservation District lands owned and regulated by the State. Nonetheless, the project site, DOBOR parcel, and surrounding area are used by the public for outdoor and recreational activities. Keopuolani Regional Park is located across the four-lane Kahului Beach Road and access between the two areas is predominantly by car. Foot traffic between the two is constrained by the high volume and speed of motorists using the roadway.

The project reflects the benefits of a public-private partnership in that it implements several aspects of the DOBOR Master Plan for the area with no cost to the State. Furthermore, the proposed action would improve the operations of the DOBOR facility by providing secure parking for boaters. Boating safety would be enhanced by having an area dedicated to boat maintenance and inspections with attendant impervious surface work pad and drainage capture and treatment systems. Moreover, the proposed action actualizes the MIPs recommendations to construct adequate parking near shoreline access points, such as the harbor boat ramp. As such, the project is consistent with the MIP.

9.7.4 Harbors

Harbor areas can provide a great atmosphere for outdoor recreation and entertainment activities. Creating gathering areas for recreation and entertainment near harbor districts has proven to be a successful economic development tool for many port cities such as San Francisco and Seattle. The MIP recommends that the County should develop a master plan analyzing the potential for harbor front revitalization incorporating the potential for increased recreation and entertainment as one component of the plan.

Policies

6.11.1.b Work with public and private entities to provide adequate pier slips, utilities, repair facilities, and waste-disposal capabilities

Implementing Action

6.11.1-Action 1 Update/amend the Wailuku-Kahului Community Plan to accommodate planned harbor improvements and any compatible land uses considering seal level rise.

Goal

6.11 Maui will have harbors and airports that will efficiently, dependably, and safely facilitate the movement of passengers and cargo.

Objective

6.11.2 Establish more economically thriving and environmentally sensitive small boat harbors accommodating resident and business activity, including fishing, recreation, and tour boats.

Policies

6.11.2.a Provide for needed shore-side facilities and capabilities to support small boat harbor users (e.g. repair facilities, parking, cold storage, and mass-transit connections).

Implementing Actions

6.11.2-Action 1 Provide boat owners with adequate pier slips, utilities, repair facilities, waste-disposal capabilities, and yacht berthing/launch/recovery services.

6.11.2-Action 2 Develop plans and funding mechanisms to stimulate shore-side improvements to small boat harbors.

6.11.2-Action 3 Broaden cooperation with State, County, and private entities to regularly report progress on projects and implementing initiatives

9.7.5 Consistency

The project would provide publicly available parking stalls for trailered vessels. The project would substantially enhance the ability to repair and inspect boats used for recreational purposes. The proposed

action would create two concrete pads and install a storm water catchment and treatment system. This would prevent dust, debris, and spills of fluids from boat repair activities from entering nearshore waters, as opposed to the current situation where individuals may repair their boats on the highly pervious coral fill which can quickly migrate to harbor waters. The addition of landscape plantings will enhance visual relief at the harbor, will create a needed wind break for users of the facility, and will help stabilize any runoff from the site. The proposed action would implement the actions called for in the MIP by improving shoreline services for small craft boat operators and offers benefits to the public without cost as a result of the public-private partnership. The proposed action is clearly consistent with the implementing actions of the MIP and actualizes those preferred actions.

9.8 KAHULUI- WAILUKU COMMUNITY PLAN

There are nine Community Plan (CP) regions within Maui County and seven on the Island of Maui (Figure 9-4). Each CP establishes desired land use patterns, goals, objectives, policies, and implementing actions for the CP region. The CP guides functional areas, infrastructure development, public and quasi-public development patterns, and permissible uses within specific land use designations. Although CP designations are not applicable to State Conservation lands, they provide guidance in the context of community interests and an evaluation of the CP and its recommendations are appropriate.

The subject property is located within the Kahului-Wailuku CP (KWCP) region on lands designated as Park in the 2002 version of the KWCP (Figure 9-5). Parks are for lands developed for recreational use and include all public and private, active, and passive parks.

Parks differ from Open Space in that Open Space is intended to limit development based on physical, environmental or scenic constraints. The definition of Park in the CP is non-specific however zoning has four categories of parks ranging from small neighborhood to large regional parks, as well as golf courses.

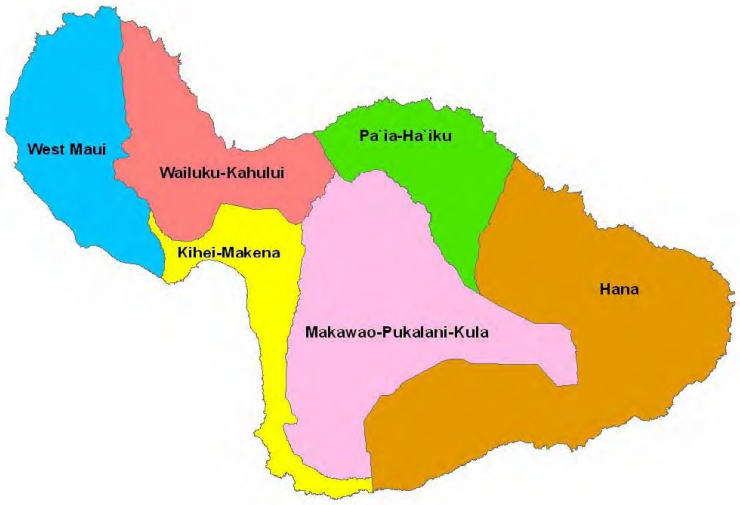


Figure 9-4: Community Plan regions on Maui.

The KWCP identifies the need for a recreational harbor in terms of additional slips or a new marina (see KWCP, B.1.a., page 5). Regarding economic activity, the KWCP encourages industrial growth through the expansion of existing industrial centers associated with the harbor (see C. Objective #3, page 12). In relation to recreation, the KWCP places a high priority on implementation of Keopuolani Park (mauka of the site) and enhancement of the Kahului Harbor shoreline (Objective #7, page 21) while maintaining existing recreational uses of the harbor for the canoe club. When development occurs, the KWCP recommends that alternative sites be provided for canoe club activities (Objective #12). The KWCP also notes the need to have a bikeway system that connects various urban and park areas, including a bike path along Kahului Beach Road that would provide access to the DOBOR property.

Under the Transportation section (page 35), objective #8 lists a variety of actions for the DOT harbor, but these are not directly related to the subject property.

Figure 9-5: The Kahului-Wailuku Community Plan designation.

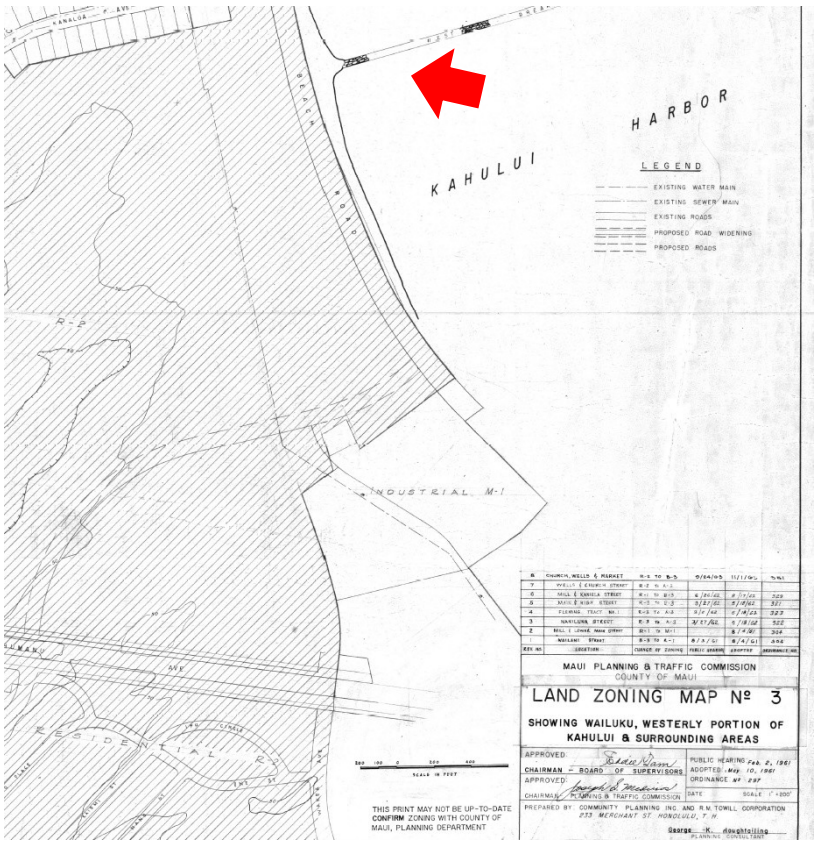
9.8.1 Consistency

The proposed use of the vacant harbor facility area to support secure trailer and truck parking is consistent with the KWCP guidance and recommendations. Providing a safe, secure parking area would encourage and not inhibit canoe paddling events and their support vessels. Paddling events often require the support of a chase boat for safety reasons and to provide immediate response when needed. Having a secure parking facility for tow trucks used for these chase boats would be advantageous to both the vessel owner and the event.

Encouraging growth of harbor-related activities, such as a dedicated location to conduct vessel maintenance and inspections, would also be in keeping with the economic goals of the KWCP. The project site's location inland of the existing boat ramp allows for other diverse uses, such as bicycle access and water sports activities that use the piers and amenities at the DOBOR facility. Based on the above, the proposed use is consistent with the KWCP. Furthermore, Executive Order #4282 expanded the site for DOBOR's use and Executive Order #4283 retracted the County's use of Kahului Harbor Park.

9.9 COUNTY ZONING

MCC Chapter 19.12 establishes zoning designations for real property under the County's jurisdiction. The overall purpose of zoning is to ensure that land uses are compatible and that the public's health, safety and welfare are protected. In 1958, Maui County designated all lands that did not have specific zoning designations as "Interim" zoned lands. Prior to 1960, the Kahului spit did not exist and the subject area was under water. According to the 1961 Land Zoning Map No. 3, the subject area was within the Kahului Harbor and not subject to County zoning (Figure 10-6). Furthermore, County zoning does not apply to State-designated Conservation Lands.



As illustrated in earlier portions of this document, the Kahului spit was created from the materials dredged from the harbor between 1960 and 1987. The site is comprised almost entirely of reclaimed fill land.

Filled or accreted land along the shoreline becomes property of the State as a public trust resource. Accordingly, County records indicate that TMK (2) 3-7-001:023 & 021 are "not zoned".

Unfortunately, the County's database system incorrectly lists the site as having split zoning of Interim and Residential (R-1). The errant listing is being revised by the County Planning Department and they have provided written confirmation that zoning does not apply to the project site or subject parcel.

Figure 9-6: Maui County Land Zoning Map, 1961.

The project site is located on the seaward side of the four lane Kahului Beach Road. The site is more than 500 feet away from the most makai extent of the Maui central park. The park's elevation (~20 feet asl) is also higher than the project site beginning behind an earthen berm and up a long hillside that hosts various sports fields. The Maui central park district is intended to provide for the planning and development of educational, recreational and cultural facilities in a setting of a regional park, with primary emphasis on providing facilities for use by the general public. There are no direct foot paths, bike ways or pedestrian crossings that connect the park to the project site and access between the two relies on vehicular access routes.

Although county zoning is not applicable to the site, more intensive boat activities are permitted in smaller sized and configured lots. For example, small boat building is a permitted use in the Light Industrial (M-1) zoning district. In contrast, ship works are only permitted in the Heavy Industrial (M-2) district (MCC 19.26.020 (24)) given the uses may be obnoxious or offensive by reason of emission of odor, dust, smoke, gas, noise, or vibration. For comparison, light industrial areas must be enclosed on at least three sides by a wall or fence at least six feet high (MCC 19.24.020A (25) and B) or contained within a roofed structure. Site development requires a minimum lot area of 7,500 square feet, minimum lot width of 65 feet, and front, side and rear yard setbacks of up to 10 feet each. In M-1, light manufacturing and processing allows for minor emissions of odors, fumes, noise, vibrations, or glare such as small craft assembly plants.

9.9.1 Consistency

Maui County confirms that zoning restrictions do not apply to the subject property. The proposed action includes a 7 feet high fence around the project site with landscape plantings along its perimeter. Although no assembly of water craft is proposed, the site's dimensions, setbacks and configuration are in

compliance and exceed those that would be required of a light industrial site. As such, the proposed action conforms to County public health and safety standards and thus is not inconsistent with County zoning and site development standards.

9.10 OCEAN RESOURCE MANAGEMENT PLAN

The first Ocean Resource Management Plan (ORMP) for Hawaii was completed in April 1985. Since that time the ORMP has been updated in 1991, 2006 and most recently in 2013 pursuant to HRS 205A-62. That ORMP set forth policies to guide the direction and coordination of state agencies responsible for the conservation of marine resources. Topics of concern include nearshore recreation, marine conservation and preservation, ocean waste disposal and accidental spills, beach erosion, fisheries, harbor development, coastal energy facilities, mariculture, and ocean energy resources.

DBEDT statistics show that visitor expenditures were $11.2 billion in 2010, which was approximately 17% of the state's Gross Domestic Product. In 2010, the State had nearly 7 million visitors of which 70% were from the U.S. mainland and 30% from overseas. (HDOT, 2014).Because the islands are surrounded by the Pacific Ocean, many of the recreational jobs are centered on ocean uses. These uses are diverse and include a variety of recreational uses such as kayak and stand up paddle rentals, fishing tours and whale watching. With visitor arrivals projected to rise, jobs in the recreation sector are important and have increased by nearly 2% year over year (DBEDT, 2013).All of these uses of ocean and coastal resources need to co-exist.

According to the ORMP, there is an opportunity to protect the public health, promote public recreation, respect traditional practices, advance food security, enhance tourist activity, and grow Hawaii's economy as a whole by investing now in effective ocean management and focusing on priority issues. Excerpts from the ORMP's priorities are listed below.

<u>Management Priority #4: Marine Resources</u>
Fisheries – Both commercial and non-commercial fishing contribute to Hawaii's food security.

- Hawaii has the highest per capita non- commercial fisheries catch in the nation at 1.4 million fishing trips for a total near 2.7 million fish in 2011.
- Commercial fishing contributes directly to food security as well as to jobs in ways such as through fish auction, fish dealers, and grocers. Commercial fishers include bottom fish and pelagic fisheries, deepwater coral and coral reef fisheries, and crustacean fishing. Charter fishers are included in this category.
- Recreational fishing is motivated by sport or pleasure. Fishermen often sell their catch through informal networks. Sport fishermen participate in several dozen fishing tournaments across the State of Hawai'i annually. A 2006 UH SOEST report estimates the economic impact of direct fishing tournament spending at $6.2 million annually, with non-tournament expenses such as airfare and hotel accounting for an additional $5.1 million annually (HDOT, 2014). Others fish for reasons beyond sport or pleasure, such as for subsistence, sustenance, and tradition.

<u>Example Actions to Accomplish the Ocean Economy Goals</u>

- Provide ongoing funding for the Ballast Water and Hull Fouling Prevention Program in DLNR Division of Boating and Ocean Recreation (DLNR-DOBOR).

<u>Management Priority #6: Ocean Economy</u>
Background

- Hawaii's economy is dependent on the health of the ocean. The marine-related industries of fishing, aquaculture, tourism, recreation, and shipping provide approximately 15% of Hawaii's civilian jobs. According to the National Ocean Economics Program, in 2010 Hawaii's ocean economy accounted for 100,215 jobs and over $3.1 billion in wages.

- According to UH College of Tropical Agriculture and Human Resources (UH CTAHR), Hawai'i residents eat more seafood per capita than the rest of the United States. In 2010, Hawai'i residents spent $330.68 per capita or 11.4% of their total food consumption at home and in restaurants (Loke, M et al., 2012).. This is over twice as much as the U.S. per capita of $143.68. Hawaii's aquaculture value of shellfish and finfish is $2,000,000 annually, and expected to increase.

Example Actions to Accomplish the Ocean Economy Goals (page 36, 7th dot point) states:

- Investment in small boat harbors, for example, a dry dock facility on Maui.

9.10.1 Consistency

The project is an investment in small boat harbor facilities that can be completed now as opposed to later. The project provides the benefits of a public-private partnership by using private funds to improve the overall small boat harbor facility and its amenities, as opposed to waiting for public funds to be allocated and expended on clearly needed infrastructure; namely, secure vessel parking. Providing secure parking for tow vehicles and vessels will benefit both fishing and recreational interests, such as canoe clubs during races. Having the ability to maintain and inspect vessels onsite in a controlled, environmentally sensitive manner would enhance the ongoing safe use of boats for ocean recreation, fishing, and tourism. The facility would contribute to preventative maintenance, such as hull fouling, and would actualize the priorities of the ORMP. Accordingly, the proposed action is consistent with the ORMP.

9.11 BEACH MANAGEMENT PLAN

The Beach Management Plan for the Island of Maui was incorporated by reference into the MIP (Maui County, 2012). By doing so, an analysis of the proposed actions consistency with the Beach Management Plan is appropriate for any land development proposal. The first edition of the Plan was in 1997 and had a number of prudent recommendations for conservation and preservation of Maui's beaches many of which have since been enacted. The second edition of the Plan was completed in 2008 and identifies thirteen (13) areas to improve effective management of Maui's beaches and shoreline resources. Unlike the first edition which mainly provided recommendations, the second edition offers specific strategies to avoid degradation of Maui's beach, sand, and shoreline resources (Norcross-Nu'u, Fletcher and Abbott, 2008).

Chief among these strategies is locating inland away from coastal hazards and specifically locating away from erosion prone areas. The plan also encourages placing similar coastal dependent uses together in the same location so as to allow undeveloped, natural shorelines to remain intact and undisturbed.

9.11.1 Consistency

The project site exhibits no sandy shoreline or beaches. Access to the shoreline is not constrained by the project's footprint or the activities proposed at the project site. The proposed action is located well-inland of the rock revetment that forms the perimeter of the Western Breakwater. The project site is not adjacent to, abutting, or influencing any sandy beaches or hindering shoreline access. Furthermore, the proposed action adheres to shoreline setbacks to minimize the potential for adverse impacts on coastal resources and shoreline access. As such, the proposed action is consistent with the 2008 Beach Management Plan.

9.12 KAHULUI COMMERCIAL HARBOR MASTER PLAN

The 2030 Master Plan and Draft EIS (HDOT, 2007) built off of other master plans in 2010 and 2025 to address deficiency, needs and projected growth and uses of the Kahului Commercial Harbor. The Draft EIS offered three alternatives:

Alternative A was to develop cruise and inter-island ferry facilities at the West Breakwater, expand Piers 1 and 2 for cargo operations and build new fuel facilities at Pier 3 and 4.

Alternative B was intended to develop cruise and inter-island facilities at Pier 1; expand cargo facilities at Piers 1 and 3, and at the West Breakwater.

No Action

The Draft EIS states that the DLNR operates a recreational boat-launch on the West Breakwater which is not included in the proposed 2030 plan (page 9). Section 1.2, Location of the Proposed Action, Physical Setting, denotes that the land area dedicated to DOBOR is for expansion of the existing recreational boat ramp and/or a future haul out facility (HDOT, 2007, page 49, lines 15-17). As such, the DLNR boating recreational facility was outside the scope of consideration for the 2030 Master Plan.

9.12.1 Consistency

The proposed improvements are consistent with the planned use of the site, land use designations, and the Executive Orders that established the sites intended use as a boating and ocean recreation facility. The use of the site for maritime-related services of a vessel haul out, boat and trailer storage, and vessel maintenance and inspections are in concert with DOBORs master plans for the site and property development. The use of the presently vacant, under-utilized site for secure vessel and trailer parking would enhance the DOBOR facility in terms of added security and convenience for boaters and the public. The project is in the same configuration, the same size, and in the same location as the DOBOR master plan for the small boat harbor and furthers the agency's goals, objectives and policies.

The proposed action does not conflict or interfere with the alternatives proposed in the Kahului Commercial Harbor 2030 Master Plan. The Master Plan separates the DOBOR parcel from its analysis and acknowledges the property's intended use as a recreational boating facility. The Master Plan also acknowledges the potential use of the site for vessel parking, maintenance and inspections (i.e., haul out). Accordingly, the proposed action is not inconsistent with the 2030 Master Plan for the Kahului Harbor.

9.13 COASTAL ZONE MANAGEMENT

The Hawaii Coastal Zone Management Act (CZMA), HRS 205A, was enacted to protect public trust resources and to encourage the construction of buildings out of harm's way. The CZMA regulates ten categories of coastal resources and provides objectives and policies to be considered when evaluating a proposed action. Among these are criteria for implementing shoreline setbacks, protecting view planes, and conserving marine resources. The SMA extends inland from the shoreline at least 300 feet or to the nearest state roadway. The entire West Breakwater and the project site are within the County SMA (Figure 9-7**)**.

Within the SMA, discretionary decision making is granted to each Island's Planning Commission by the State Office of Planning. However, there are several exceptions, such as harbors, given their importance to the State in general and the need to consolidate and agglomerate such coastal-dependent uses together. The Commission makes determinations on SMA Major Use Permits and Shoreline Setback Variances. For smaller actions, the Commission delegates decision making for minor developments and those actions that are unlikely to have adverse impacts on coastal resources to the Director of the Planning Department (Figure 9-8).The Director may conduct an assessment of a proposed action to determine if the action is "Development" and thus requires a permit, or is "Not Development" and is therefore exempt. An applicant may waive the assessment and apply directly for an SMA Use Permit. The Director may approve actions within the SMA that are not-development and therefore exempt regardless of their cost.

For "developments" that cost $500,000 or more within the SMA, the authority to grant approval is vested with the Commission through a public hearing and notification process. For actions less than $500,000, authority to issue an SMA Minor Permit is delegated to the Director. In Maui County, SMA permits may have reasonable conditions placed on the approval to ensure that adverse impacts to coastal resources are avoided, minimized or mitigated. In contrast, an SMA exemption cannot have conditions placed on the approval because the action is, in essence, not subject to the law and is exempt. The CZMA provides specific definitions and criteria to determine what is, and is not, "development" (HRS § 205A-22).

The entire West Breakwater and the project site are within the County SMA.

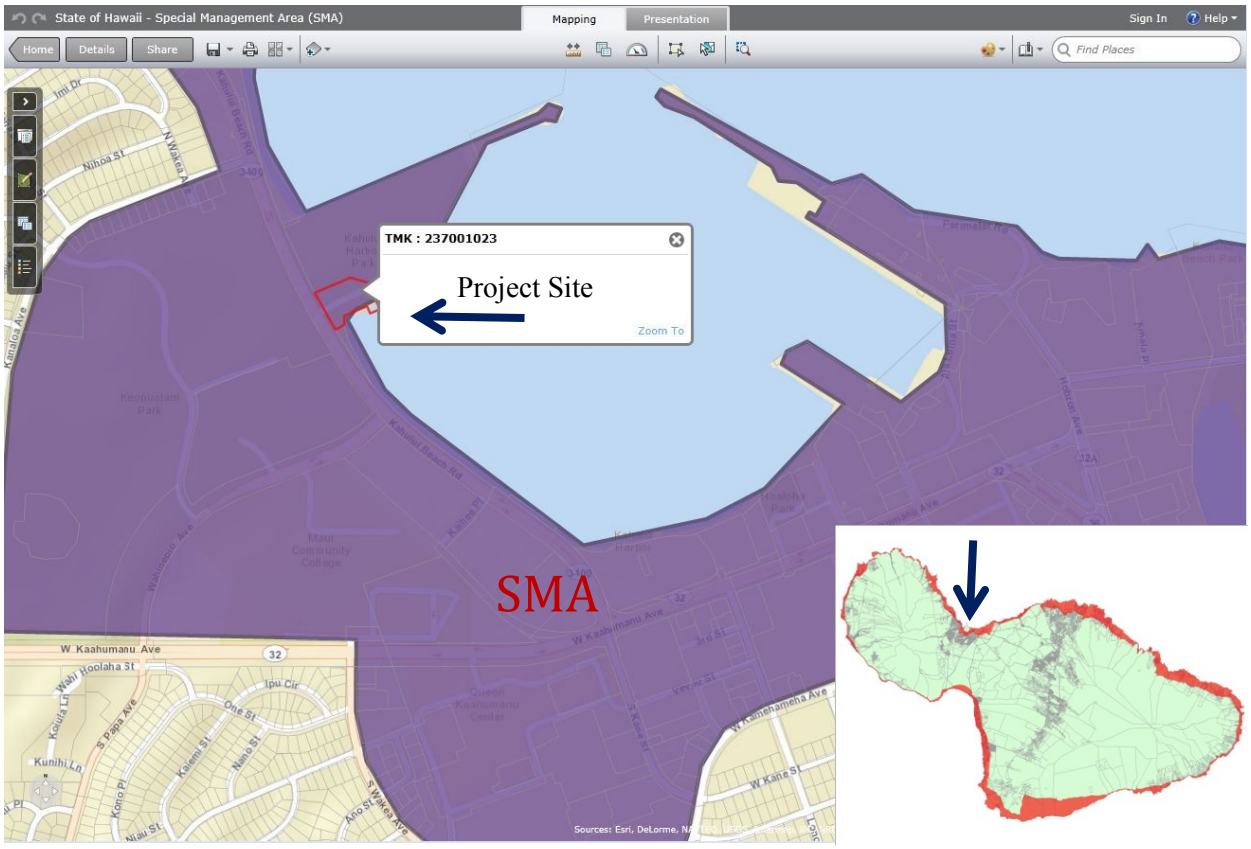


Figure 9-7: The Special Management Area of the Island of Maui.

The site is within the Special Management Area established by Maui County. However, pursuant to HRS 171-6(19) as amended on July 1, 2011, improvements to DOBOR facilities are not required to obtain a County SMA approval regardless of whether the action is initiated by a private entity or public agency.

> HRS §171-6 (19) Notwithstanding part II of chapter 205A to the contrary, plan, design, construct, operate, and maintain any lands or facilities under the jurisdiction of the division of boating and ocean recreation of the department without the need to obtain a special management area minor permit or special management area use permit;

In their October 2012 annual report to the federal Office of Coastal Resource Management, the State Office of Planning concurred that the amendment to exempt DOBOR facilities from SMA permitting is consistent with the Coastal Zone Management Program and thus consistent with Hawaii's state law. As stated in HRS 205A-2 (c) policies for (5) Economic Development, coastal dependent facilities such as harbors should be intentionally aggregated and concentrated together to afford greater protection of undeveloped natural areas. This helps to focus infrastructure development and facility improvements to areas already developed for harbor purposes, such as the Kahului harbor and the West Breakwater.

The Office of Planning notes in their federal report that DOBOR had this exemption while the division was with the Hawaii Department of Transportation pursuant to HRS Chapter 266-2, but lost the exemption when DOBOR was transferred to the DLNR. With the laws amendment in 2011, planning, designing, constructing, operating, and maintaining any lands or facilities under DOBOR's jurisdiction reinstitutes the agency's previously approved exemption from SMA permit requirements.

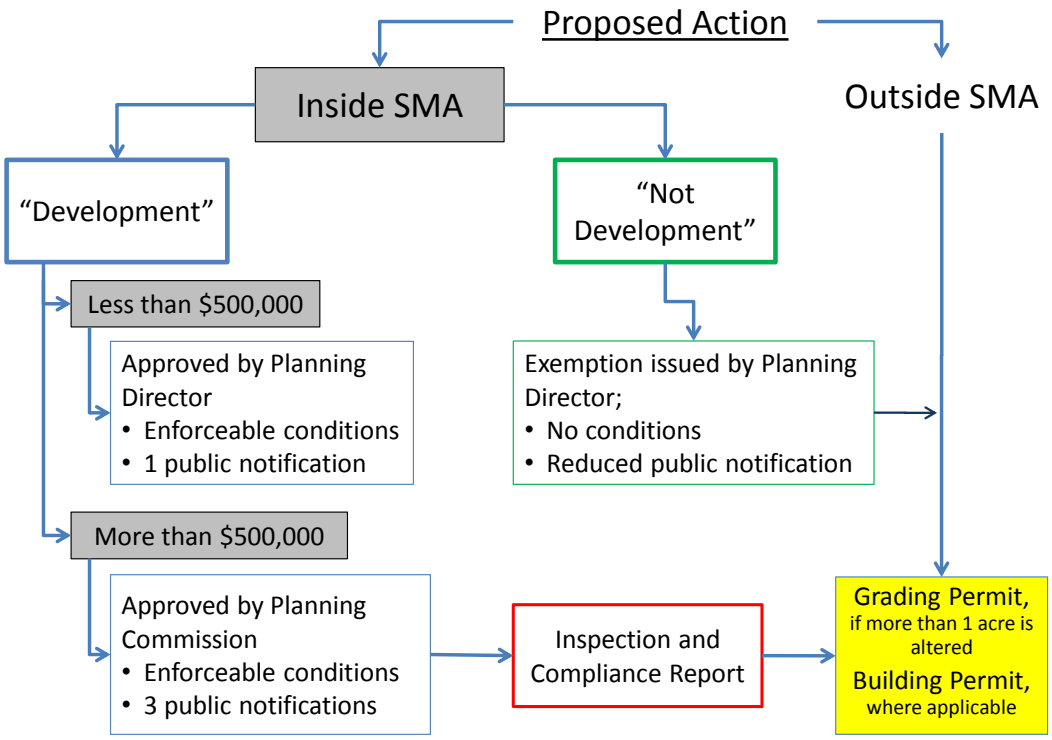


Figure 9-8: Special Management Area approval process.

Section 48 of state law references the exempt nature of harbors in the coastal zone management act, as follows:

> HRS §205A-48: Conflict of other laws. Nothing contained in this part shall be construed to diminish the jurisdiction of the state department of transportation over wharves, airports, docks, piers, or other commercial harbors, and any other maritime facilities constructed by the State; provided that such plans are submitted for the review and information of the officer of the respective agency charged with the administration of the county zoning laws, and found not to conflict with any county ordinances, zoning laws, and building codes.

Additionally, pursuant to HRS 205-2(c), the project furthers several key objectives and policies of the Hawaii Coastal Zone Management Act relative to recreation that are described below.

Recreational Resources

Objective: Provide coastal recreational opportunities accessible to the public.

Policies:

(A) Improve coordination and funding of coastal recreational planning and management; and

(B) Provide adequate, accessible, and diverse recreational opportunities in the coastal zone management area by:

(i) Protecting coastal resources uniquely suited for recreational activities that cannot be provided in other areas;

(ii) Requiring replacement of coastal resources having significant recreational value, including but not limited to surfing sites, fishponds, and sand beaches, when such

resources will be unavoidably damaged by development; or requiring reasonable monetary compensation to the state for recreation when replacement is not feasible or desirable;

(iii) Providing an adequate supply of shoreline parks and other recreational facilities suitable for public recreation;

(iv) Ensuring public recreational use of county, state, and federally owned or controlled shoreline lands and waters having recreational value consistent with public safety standards and conservation of natural resources, and

(v) Adopting water quality standards and regulating point and non-point sources of pollution to protect, and where feasible, restore the recreational value of coastal waters.

9.13.1 Consistency

The proposed action would enhance existing coastal recreational resources by providing a secure location to park trailers, vessels, and tow vehicles. In addition, providing an impervious surface designed for vessel inspection and maintenance with a stormwater catchment system would help ensure that potential dust, debris or contaminants that are generated are captured, treated and stabilized rather than free to percolate into the ground or runoff into nearshore waters. Nearshore water quality would be improved by having appropriately designed facilities for vessel maintenance activities. Additionally, the proposed action would not negate, minimize or constrict access to the shoreline.

Furthermore and in compliance with HRS 205A-41, the project site is located approximately 253 feet inland of the shoreline, which is outside of the coastal erosion zone and landward of the maximum shoreline setback area established by Maui County (i.e., 150 feet) and the DLNR OCCL. The County shoreline setback area extends a maximum of 150 feet inland from the shoreline based on the parcel's average depth. The State shoreline setback area is smaller than the County's setback area when the calculation is based on average lot depth. Both the County and State have erosion based setbacks, in addition to lot-depth setbacks. However there is no erosion at the parcel due to the existence of a rock revetment along the makai edge's of the parcel. As such, the shoreline is fixed by a legally permitted rock revetment as shown on surveys attached to the Executive Orders that established the site. The revetment fixes the shoreline's position and a new state certified shoreline survey is not required pursuant to HRS 205A-42(a). Furthermore, for setback calculation purposes, the erosion rate at the parcel is zero, as provided in both State and County shoreline rules. In either event, the project site is located well inland and outside of both the State and County shoreline setback restriction and thus conforms to the intent of these rules.

For actions having a federal nexus (i.e., federal funds, lands or permits), a CZM Consistency Determination is required. However, this project does not involve any public funds and therefore does not trigger the need for a CZM Consistency Determination.

The proposed action is consistent with the objectives and policies of the Hawaii CZMA (HRS 205A), Special Management Area Rules for the Maui Planning Commission (12-202), and the Maui Planning Commission Shoreline Setback Rules (12-203) as described in earlier chapters. The long-term use of the West Breakwater for harbor dependent facilities is consistent with federal, state and county laws and rules for prudent uses of the coastal zone and special management area.

CHAPTER 10
FINDINGS & CONCLUSIONS

10.1 OVERVIEW

The proposed action triggers compliance with HRS Chapter 343 regarding Environmental Review because it is a use of the state lands and occurs within a conservation district. The environmental law and its associated rules for implementation provide succinct significance criteria upon which to evaluate a proposed action. These significance criteria are described in Section 12 of the Administrative Rules, Title 11, Chapter 200, "Environmental Impact Statement Rules". The outcome of the evaluation is that the potential impact of the proposed action is anticipated to be "not significant", "less than significant", "mitigated to less than significant", or "significant". An analysis of the proposed action in relation to each of the criteria is provided below.

10.2 SIGNIFICANCE CRITERIA

1. No Irrevocable Commitment to Loss or Destruction of any Natural or Cultural Resource Would Occur as a Result of the Proposed Action

The proposed action does not involve an irrevocable commitment to loss or destruction of any natural or cultural resource. Mechanical ground altering at the site would involve the implementation of precautionary archaeological monitoring, an erosion control plan and the implementation of best management practices. Should artifacts or historic remnants be encountered, all work would stop and the SHPD contacted. The granting of the proposed action would not result in the loss or destruction of cultural or natural resources with the implementation of the aforementioned mitigation measures and BMPs. As such, adverse impacts from the proposed action are not significant.

2. The Proposed Action Would Not Curtail the Range of Beneficial Uses of the Environment

The proposed action does not curtail the beneficial uses of the environment. The outcome of the proposed action would allow continued ocean and boating recreation activity to occur on the property, while enhancing and supporting safe vessel operations and the functions associated with small boat harbor operations.

The proposed action would have a favorable effect on the marine environment by preventing the release of sediment and debris into ocean waters by capturing these potential contaminants on an impervious surface area and directing them to an appropriately sized and designed stormwater filtration and treatment system. The addition of vegetative plantings would benefit the current barren site by providing visual relief in the landscape. As such, adverse impacts from the proposed action are not significant.

3. The Proposed Action Does Not Conflict with the State's Long-term Environmental Policies or Goals or Guidelines as Expressed in Chapter 344, Hawai`i Revised Statutes

Opportunities for public input and discussion are being provided through the EA/CDUP process, in keeping with the State's environmental policies and guidelines. Furthermore, the proposed action does not conflict with the State's long-term goals, policies or guideline and does not conflict with long-term environmental policies, goals, and guidelines of the State of Hawaii.

Land use designations for the project site and parcel are State Land Use Conservation, Resource subzone The proposed action is a permissible identified use within the resource subzone pursuant to the DLNR OCCL land use regulations (HAR 13-5) for the conservation district. Additionally, the proposed use is in concert with other master plans and guidance documents for the property developed by the State. The proposed action conforms to its land use entitlement and does not conflict with the county or state's long term environmental policies or goals. As such, adverse impacts from the proposed action are not significant.

4. The Economic or Social Welfare of the Community or State Would Not be Substantially Affected

The economic or social welfare of the community or State would not be substantially affected. In the near-term, the outcome of the proposed action would provide employment in construction. In the long-term, the proposed action would allow for safer boating and ocean recreation activities by providing a location along Maui's northern coastline to obtain vessel inspections and to conduct maintenance to small water craft. The proposed action would benefit the economic welfare of the boating community by providing long-term trailered vessel parking thereby reducing the costs, in terms of time and fuel, to transit vessels to the harbor's boat ramp. The allocation of a site for trailered vessel parking would be beneficial to the general public by reducing the number of times vessels are towed on Maui's roadways and highways, thereby reducing potential roadway congestion and accidents with towed vehicles. Having ready access to a secure parking area adjacent to the boat harbor ramp would benefit the social welfare of the vessel owner by providing a convenient means of accessing and staging water craft for ocean use. As such, adverse impacts from the proposed action are not significant.

5. The Proposed Action Does Not Affect Public Health

Public health would not be adversely affected if the proposed action were approved. The implementation of BMPs during construction would minimize potential adverse effects on water quality and public health. The implementation and active use of BMPs operational requirements during facility construction and operations would minimize and reduce potential adverse effects to air quality and ambient noise levels. Landscape plantings and fencing along the sites perimeter and adjacent two grassy swales would serve as a wind break to help capture dust and debris and increase air turbulence to diffuse and disperse air borne particles which decreases their concentration in the air column and their potential effect on air quality and public health. Further, by implementing operational requirements during use of the site for vessel maintenance activities, the potential adverse impacts to public health would be minimized, mitigated and abated. For example, users of the large maintenance pad would be required to provide portable comfort facilities to avoid negative impacts. As such, adverse impacts from the proposed action are not significant.

6. No Substantial Secondary Impacts, Such as Population Changes or Effects on Public Facilities are Anticipated

The proposed action would not increase the potential for increased population or adverse effects on public facilities. Adverse substantial secondary impacts are not anticipated from the proposed action.

Population. The proposed action would not increase the number of people that can reside on the island or in the community. No substantive increase in population is expected. Schools, medical facilities, police, fire and emergency response in the area have sufficient capacity to accommodate the proposed use and the action would have no affect on these public services.

Water & Wastewater. The proposed action would not generate substantial quantities of wastewater or create a need for the installation of public wastewater collection lines or services. The action would have negligible effect on the nearby Kahului wastewater treatment facility's capacity. Portable comfort facilities would be provided during large vessel maintenance and inspection activities. Potable water is supplied to the property and these services would be extended via trenching and sub-metering primarily to accommodate irrigation of landscape plantings. Water use at the site is anticipated to be minimal and well within the capacity of the existing water meter and supplies afforded to the parcel.

Streets, Sidewalks, and Curbs. No sidewalks, curbs or gutters are proposed as these would create obstacles to the safe and free movement of vessels, trailers and tow vehicles. Furthermore, the proposed action would not trigger the need for sidewalks or curbs.

Drainage. Two impervious surface areas would be created by the proposed action. Water from rain and storms would be directed to a multiple inlet, sub-surface stormwater treatment and filtration system. The

site currently has no drainage system and its addition would help protect near-shore marine waters by capturing and stabilizing potential pollutants such as sediment, debris, and litter, and stormwater runoff. Landscape plantings along the project site's perimeter and vegetated swales would enhance the natural capture and attenuation of drainage from adjacent parking areas. There are no gulches, ditches, streams or gullies on the property that would be effected by the proposed action. The proposed action would not adversely affect the conveyance or natural attenuation of stormwater for the overall property, nor would it increase flooding.

Public Facilities. The proposed action could increase the use of the small boat harbor ramp by making it more convenient for boaters to launch their vessels and access the ocean. This is viewed as a favorable effect since the public facility was designed and intended to serve ocean and boating recreational interests. The project would increase security and long-term parking of trailered vessels, and their tow vehicles when boats are in use, but this would be considered favorable in light of the public facility's purpose. Operational requirements would be implemented during vessel maintenance and inspection activities to avoid, mitigate and minimize potential adverse impacts on nearby users of recreational and public park facilities. The proposed action is not anticipated to adversely affect public facilities, but rather is anticipated to enhance the use of the small boat harbor and to afford boaters greater security and safety by creating dedicated parking, maintenance and vessel inspection areas for the boating public.

Overall, the proposed action would not involve any negative secondary or adverse indirect impacts to public infrastructure, facilities, or services. As such, adverse impacts from the proposed action are not significant.

7. No Substantial Degradation of Environmental Quality is Anticipated

Although ground alteration is anticipated to be minimal, implementation of an erosion control plan and BMPs would ensure that nearshore water quality is protected during construction. The proposed action would prevent erosion and minimize the potential for environmental degradation, by actively capturing, treating and stabilizing water borne contaminants, such as sediment, debris and litter.

Air quality would be protected through the use of operational BMPs during vessel maintenance and inspection activities. The installation of a wind break, using vegetation and fencing, would reduce air flow and create air turbulence from the persistent trade winds at the site thereby reducing the concentrations of potential airborne contaminants through dispersion and diffusion in the air column to less than detectable levels.

As a result of the facilities design, location and orientation, combined with prevailing wind direction, speed and wind breaks, drainage system, and operational requirements, significant degradation of environmental quality would be avoided, minimized and mitigated. As such, adverse impacts from the proposed action are not significant.

8. The Proposed Action Does Not Involve a Commitment to Larger Actions, Nor Would Cumulative Impacts Result in Considerable Effects on the Environment

The proposed action applies to a small portion of a single parcel dedicated to serving the boating public. Should the action be approved, it would result in the dedication of the presently vacant area to accommodate secure parking for trailered vessels and tow vehicles available to the public for a nominal fee. Construction of two impervious areas (concrete pads) and an attendant sub-surface drainage system would dedicate a portion of the project site to vessel maintenance, inspection, and support of boating recreation activities. Minimal infrastructure improvements are required and sufficient infrastructure exists at the property to support and accommodate the proposed use.

Accordingly, the proposed action does not involve a commitment to larger actions or result in cumulative effects beyond those intended for the subject parcel, namely to serve as a small boat harbor. The action

would help ensure that the presently vacant, unimproved portion of the parcel is used for productive purposes related to safe boating operations for commercial and individual ocean recreation vessel owners.

The proposed action does not involve a commitment to larger actions, require additional public infrastructure improvements, or have adverse cumulative effects on the environment, and enables this portion of the property to physically support its intended purpose as a small boat harbor facility. As such, adverse impacts from the proposed action are not significant.

9. No Rare, Threatened or Endangered Species or Their Habitats Would be Adversely Affected by the Proposed Action

There are no rare, threatened or endangered flora and fauna on the subject parcel. There is minimal flora on the project site as it is relatively barren and comprised of dredged soils and coral fill. Rare and protected species such as whales and turtles can occasionally be observed transiting off shore, however no known haul-out, breeding or nesting areas are within the vicinity and no preferred habitat for these species exists at the project site or in proximity to the proposed action. Furthermore, there are no wetlands, intermittent or perennial streams, or critical habitat found on the property. The proposed action would have no affect on protected species or their habitat and its impact would be not significant.

10. Air Quality, Water Quality or Ambient Noise Levels Would Not be Detrimentally Affected by the Proposed Project

Air, ambient noise levels, and water quality is not anticipated to be adversely affected by the proposed action. A suite of BMPs and operational requirements would be fully implemented to ensure protection of water and air quality. Among them is the installation of physical barriers such as landscape plantings and fencing. The project site is configured so that potential sources of air-borne contaminants are located downwind of potential receptors at the harbor and the prevailing wind direction is towards Kahului Beach Road. The active work site within the project area is oriented to the prevailing winds to naturally diminish, diffuse and dilute the potential accumulation of contaminants or odors that could adverse affect air quality.

Similarly, elevated noise levels from use of the facility would be minimized through the implementation of standard BMPs and operational requirements, such as restricting the timing and intensity of equipment used. Where applicable, ministerial permits would be obtained and requisite mitigation measures implemented to reduce sound levels and minimize potential adverse effects to air and water quality.

In the long-term, the proposed action would have a favorable impact on water quality by preventing sediment, debris, litter, and particulates from entering nearshore waters by directing these potential pollutants to multiple filtered inlets of a sub-surface stormwater treatment system.

Although not anticipated given the project's size and characteristics, a Community Noise Permit and NPDES permit would be obtained during the ministerial permit process, where required. An erosion control plan would be implemented during ground alteration to construct the facility. Although the site is comprised of dredged fill, should archeological or cultural artifacts be encountered, all work would cease and the SHPD contacted immediately.

With the implementation of the aforementioned mitigation measures, the proposed action is not anticipated to adversely affect air or water quality or ambient noise levels. As such, adverse impacts from the proposed action are not significant.

11. The Proposed Project Would Not Affect Environmentally Sensitive Areas, Such as Flood Plains, Tsunami Zones, Erosion-prone Areas, Geologically Hazardous Lands, Estuaries, Fresh Waters or Coastal Waters

The proposed action, if authorized, would result in the construction of a two concrete pads, sub-surface drainage treatment system, erection of fencing, creation of two grassy swales and propagation of

landscape plantings along the perimeter. None of these activities would effect sensitive areas or increase risk of damage from flooding or tsunami inundation. The project site is located well inland of State and County shoreline setbacks and avoids coastal hazards by locating inland and outside of the shoreline setback area. The proposed action would have no adverse effect on estuaries, fresh or marine coastal waters, and if approved, would help improve protection of nearshore water quality by treating stormwater at the site.The proposed action is not anticipated to adversely effect environmentally sensitive areas or be effected by natural hazards. As such, adverse impacts from the proposed action are not significant.

12. The Proposed Action Would Not Substantially Affect Scenic Vistas and Viewplanes Identified in County or State Plans or Studies

Views from Kahului Beach Road fronting the property are typical of the harbor environment and ocean and would not change in character. The proposed action would not hinder, negate or intervene upon the existing sporadic views of the ocean or mountains from the public roadway.

Views of the project site from the lower playground in Ke'opuolani Regional Park, situated across Kahului Beach Road, are screened by a row of Ironwood trees atop an earthen berm that sets the park at a slightly higher elevation than the project site. Views from upland sites within Ke'opuolani Regional Park, such as the ball fields, would not be degraded because the project site is small and only partially visible within the wider view of the commercial harbor and its more industrial-type activities. Views from residential and apartment areas in the surrounding area would not be negatively impacted from the proposed action because the project site is either not within line-of-sight due to topography or is only visible within the wider view of the commercial harbor and ocean environment.

The project, if approved, would result in trailered vessels being parked at the site which is characteristic of the present, existing use of the small boat harbor. While the addition of more boats at the harbor facility could change the view, the massing of these vessels including commercial catamarans, is minimal in the wider landscape of views to and along the shoreline, ocean, and harbor. In consideration of the aforementioned, the proposed action would not substantially affect or detract from scenic vistas or public view planes. As such, adverse impacts from the proposed action are not significant.

13. The Proposed Action Would Not Require Substantial Energy Consumption

The property is currently serviced by centralized electric provided by Maui Electric Company. Electrical services would be extended to the project site from nearby junction boxes and would not involve overhead utility lines. Sub-metered and trenched electrical lines would power the irrigation system and key card gate access. However, these uses would not require substantial energy consumption. Sufficient capacity exists at the property to support the uses proposed and would not result in a substantial increase in energy consumption. As such, adverse impacts from the proposed action are not significant.

10.3 SUMMARY

Based on the foregoing findings, it is anticipated that the proposed action would not result in significant or substantial adverse impact on the environment, natural, coastal, or cultural resources, nor public infrastructure, recreation, or customary or traditional uses of the property. In light of the evaluation contained herein, the accepting authority for the proposed action may consider issuance of a Finding of No Significant Impact (FONSI) pursuant to HAR 11-200.

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CHAPTER 11
PERMITS, APPROVALS &CONSULTATIONS

11.1 REQUISITE DISCRETIONARY APPROVALS

A. A Finding of No Significant Impact by the Board of Land and Natural Resources

B. Approval of a Conservation District Use Permit by the Board of Land and Natural Resources

11.2 REQUISITE MINISTERIAL APPROVALS

Maui County Department of Public Works

- Grading permit
- Building permit, if applicable
- Electrical permit
- Plumbing permit

Maui County Planning Department

- Zoning and Flood Zone Confirmation.

  A Special Flood Hazard Area Development permit is not anticipated.

State Department of Land & Natural Resources

- Right of Entry Permit, if applicable
- Approval of a lease of State Land to the Applicant

11.3 CONSULTED PARTIES

11.3.1 Landowners

The Kahului West Breakwater is surrounded by water on three sides, one of which comprises the west side of the Kahului Harbor owned by the HDOT Harbors Division. The inland extent of the site is bordered by Kahului Beach Road which is owned by the HDOT Highways Division. The agency added separate turning lanes on Kahului Beach Road for improved ingress and egress by trailered vessels to DOBORs facility several years ago.

Areas immediately mauka of the highway are owned by Maui County. There are no private landowners immediately adjacent to the subject portion.

11.3.2 Government Agencies

State Department of Lands and Natural Resources, Division of Aquatic Resources (DAR).

State Department of Lands and Natural, Resources, Division of Boating and Ocean Recreation (DOBOR).

State Department of Lands and Natural, Resources, Office of Conservation and Coastal Lands (OCCL).

Maui County Department of Parks and Recreation.

Maui County, Department of Planning, Zoning and Enforcement Division.

Maui County, Department of Planning, Long Range Division.

Maui County, Department of Planning, Coastal Zone Management Program.

Maui County, Office of the Mayor.

Maui County University of Hawaii Sea Grant Extension Agent.

11.3.3 Private Entities

Community Marine Management Areas, Jay Carpio.

Gemini Charters.

Ka'anapali Sails, Inc.

Kai Kanani Sailing Charters.

Maui Nui Marine Resource Council, Robin Newbold.

Sierra Club, Lucienne DeNaie.

CHAPTER 12
REFERENCES

12.1 CITATIONS

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Coles, S.L, P.R. Reath, K. Longnecker, H. Bolick., and L.G. Eldridge. 2004. Assessment of Non-indigenous Marine Species in Harbors and on Nearby Coral Reefs on Kaua'i, Moloka'i, Maui, and Hawai'i. Bishop Museum Technical Report No 29a. Honolulu, Hawai'i.

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APPENDIX A.
PRELIMINARY DRAINAGE REPORT

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