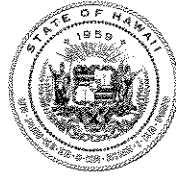


LINDA LINGLE
GOVERNOR
STATE OF HAWAII



STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS

P.O. BOX 1879
HONOLULU, HAWAII 96805

MICAH A. KANE
CHAIRMAN
HAWAIIAN HOMES COMMISSION

BEN HENDERSON
DEPUTY TO THE CHAIRMAN

KAULANA H. PARK
EXECUTIVE ASSISTANT

December 27, 2005

Ms. Genevieve Salmonson, Director
Office of Environmental Quality Control
235 South Beretania Street, Suite 702
Honolulu, Hawaii 96813

RECEIVED
DEC 28 P2:05
OFFICE OF ENVIRONMENTAL
QUALITY CONTROL

Dear Ms. Salmonson:

Subject: Finding of No Significant Impact (FONSI) for
Anahola Residence Lots, Unit 6, TMK 4-8-03: 03 (Portion),
19 (Portion), and 21 (Portions), Anahola, Kauai, Hawaii

The State of Hawaii, Department of Hawaiian Home Lands has reviewed the comments received during the 30-day public comment period which began on October 8, 2005. The Department of Hawaiian Home Lands has determined that this project will not have significant environmental effects and has issued a Finding of No Significant Impact (FONSI). Please publish this notice in the January 8, 2006 OEQC Environmental Notice.

We have enclosed the following items:

1. Two hard copies and one CD (PDF) of the Final Environmental Assessment/FONSI; and
2. Completed publication form (also to be emailed).

If you have any questions regarding the project, please call Mr. Kamuela Cobb-Adams of our staff at 586-3844.

Sincerely,


Micah A. Kane, Chairman
Hawaiian Homes Commission

ANAHOLA RESIDENCE LOTS | UNIT 6

FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

PREPARED FOR: DHHL

PREPARED BY:



DECEMBER 2005

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Appendix D	Cultural Assessment
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1.0 INTRODUCTION

This Environmental Assessment (EA) has been prepared in compliance with the environmental review requirements of 24 Code of Federal Regulations (CFR) 58, the environmental requirements of Chapter 343, *Hawaii Revised Statutes* (HRS), and the requirements of Administrative Rules, Title 11, Chapter 200 for the subdivision of approximately 71.3 acres of land into 181 single family residential lots.

1.1 PROJECT SUMMARY

The following summary describes the project location, existing entitlements, and proposed actions:

Project Name:	Anahola Residence Lots, Unit 6	
Location:	Anahola, Kaua'i, Hawai'i (Figure 1)	
Landowner:	State of Hawai'i, Department of Hawaiian Home Lands	
Applicant:	State of Hawai'i, Department of Hawaiian Home Lands	
Tax Map Key:	4-8-03: 19 (portion), 21 (portion), and 03 (portion) (Figure 2)	
Land Area:	Approximately 71.3 acres	
Existing Use:	Vacant land	
Proposed Use:	Single-family residential (Figure 3) School/Residential Expansion	
Land Use Designations:	State Land Use District:	Urban and Agricultural (Figure 4)
	Kaua'i General Plan:	Residential Community (Figure 5)
	County Zoning:	Agricultural, Open, and R-4 Residential (Figure 6)
	Special Management Area:	Outside (Figure 7)
Action Requested:	Compliance with the United States Department of Housing and Urban Development environmental review requirements Compliance with Chapter 343, <i>Hawaii Revised Statutes</i>	
Accepting Authority:	State of Hawai'i, Department of Hawaiian Home Lands	
Determination:	Finding of No Significant Impact (FONSI)	

1.2 PROPOSING AGENCY

In accordance with Section 343-5(b), HRS, whenever an agency proposes the use of State lands, that agency shall prepare an environmental assessment for such action at the earliest practicable time to determine whether an environmental impact statement shall be required.

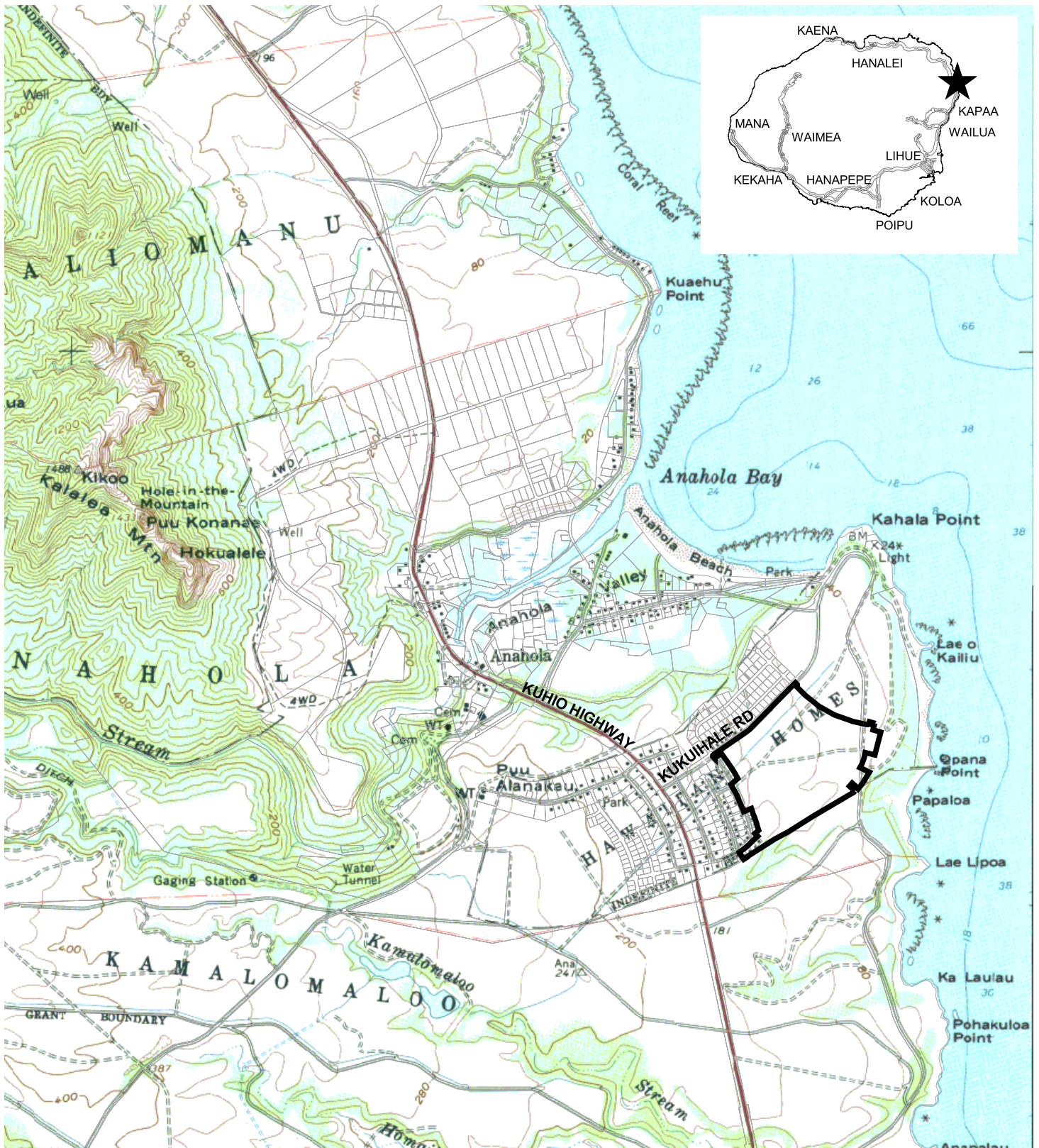
The State Department of Hawaiian Home Lands (DHHL) has contracted PBR Hawaii to prepare an environmental assessment in compliance with Chapter 343, HRS. The DHHL is the proposing agency for this project. The mailing address and primary contact person for the DHHL is listed below:

Mr. Kamuela Cobb-Adams
State of Hawai'i
Department of Hawaiian Home Lands
Land Development Division
P.O. Box 1879
Honolulu, Hawai'i 96805


1.3 OWNERSHIP AND MAJOR APPROVALS REQUIRED

The DHHL is the landowner of the subject property and the proposing agency. The DHHL is also acting as applicant for the applicable entitlements. Primary approval from the State will be acceptance of the environmental disclosure documents in accordance with Chapter 343, HRS.

This environmental assessment is also being prepared in compliance with 24 CFR 58 because the DHHL will be receiving funds from the Department of Housing and Urban Development through its Native American Housing Assistance and Self Determination Act (NAHASDA) Community Grants program.



LEGEND

 Project Site Boundary

Source:
U.S. Geological Survey (Anahola Quadrangle, 1995)

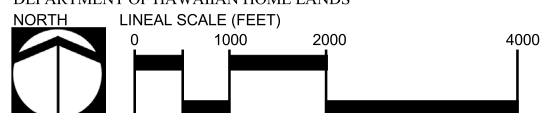
Disclaimer:
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general planning purposes only.

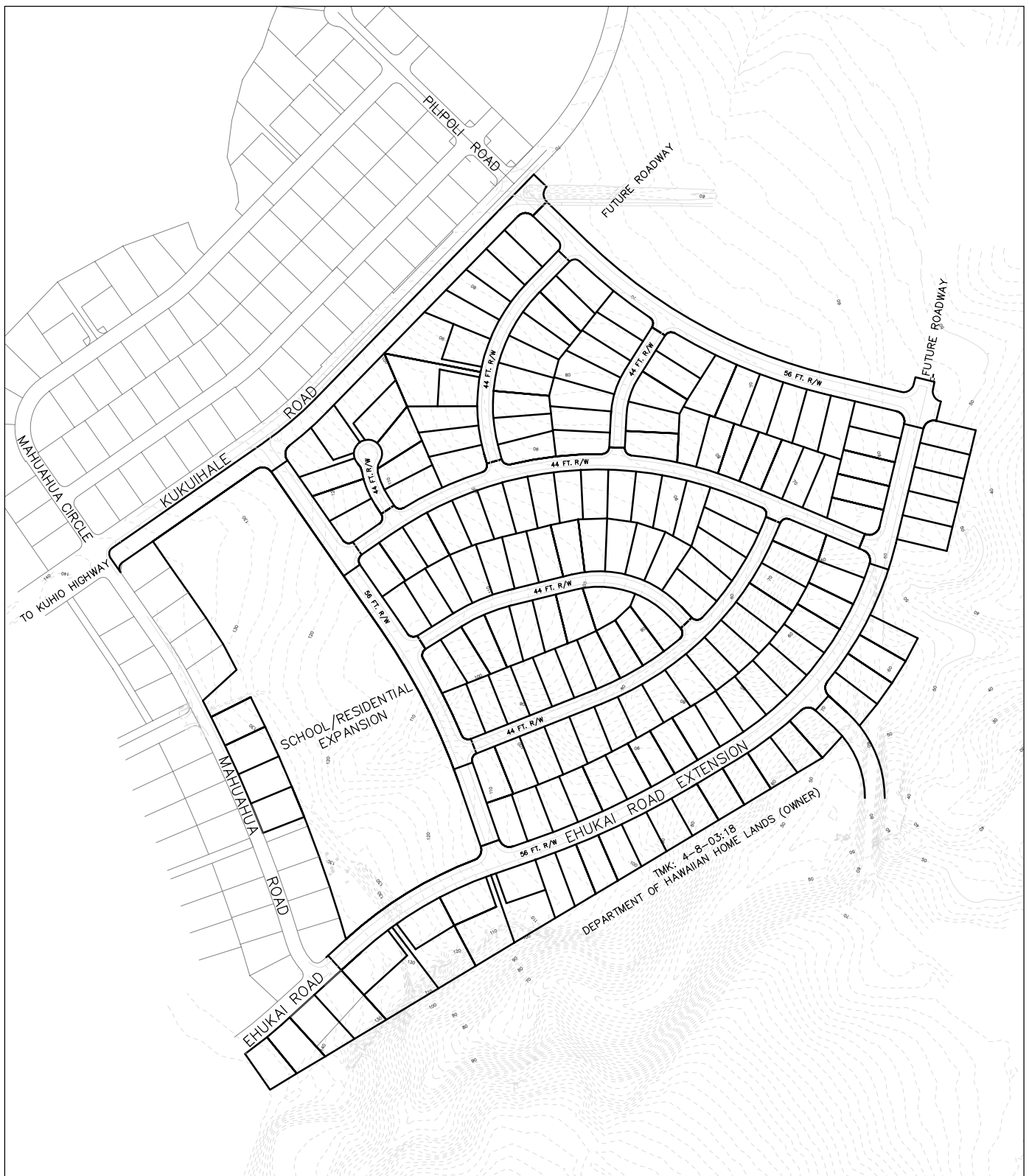
Figure 1
Location Map

Anahola Residence Lots, Unit 6

DEPARTMENT OF HAWAIIAN HOME LANDS

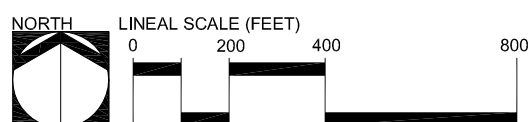
ISLAND OF KAUAI

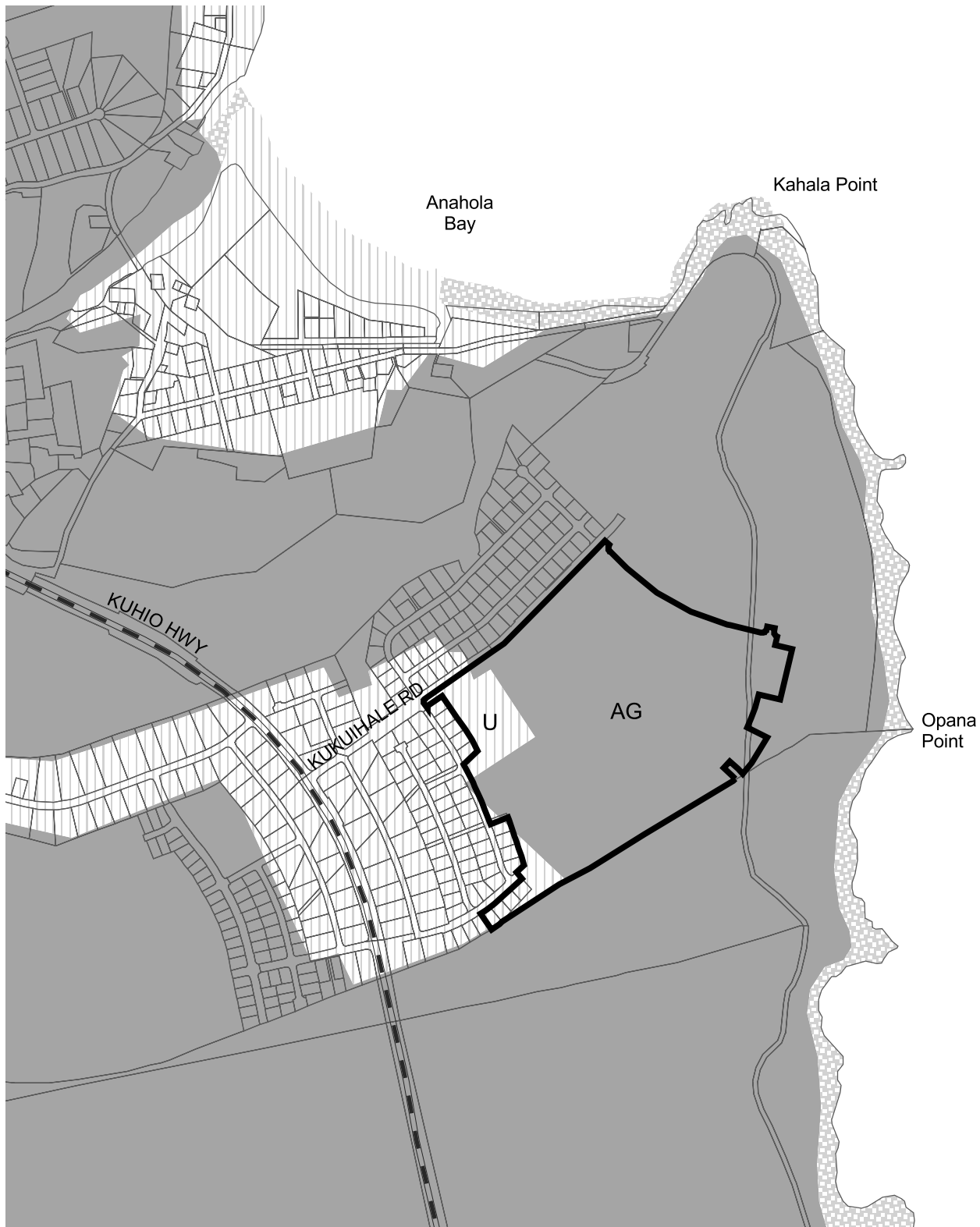




Source:
Akinaka & Associates, Ltd.

Figure 3
Conceptual Site Plan
Anahola Residence Lots, Unit 6





LEGEND

Land Uses

- Agricultural
- Conservation
- Urban

Project Site Boundary

Source: State Land Use Commission (2000)

Disclaimer:
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general planning purposes only.

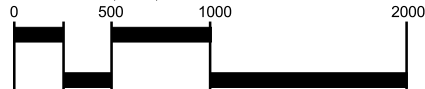
Figure 4
State Land Use Boundary Map
Anahola Residence Lots, Unit 6

DEPARTMENT OF HAWAIIAN HOME LANDS

ISLAND OF KAUAI

NORTH

LINEAL SCALE (FEET)





LEGEND

- Residential Community
- Agriculture
- Open
- Park
- Major Roads
- Minor Roads
- Project Site Boundary

Source: County of Kauai (2000)

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general planning purposes only.

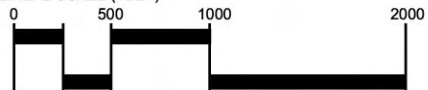
Figure 5 General Plan Anahola Residence Lots, Unit 6

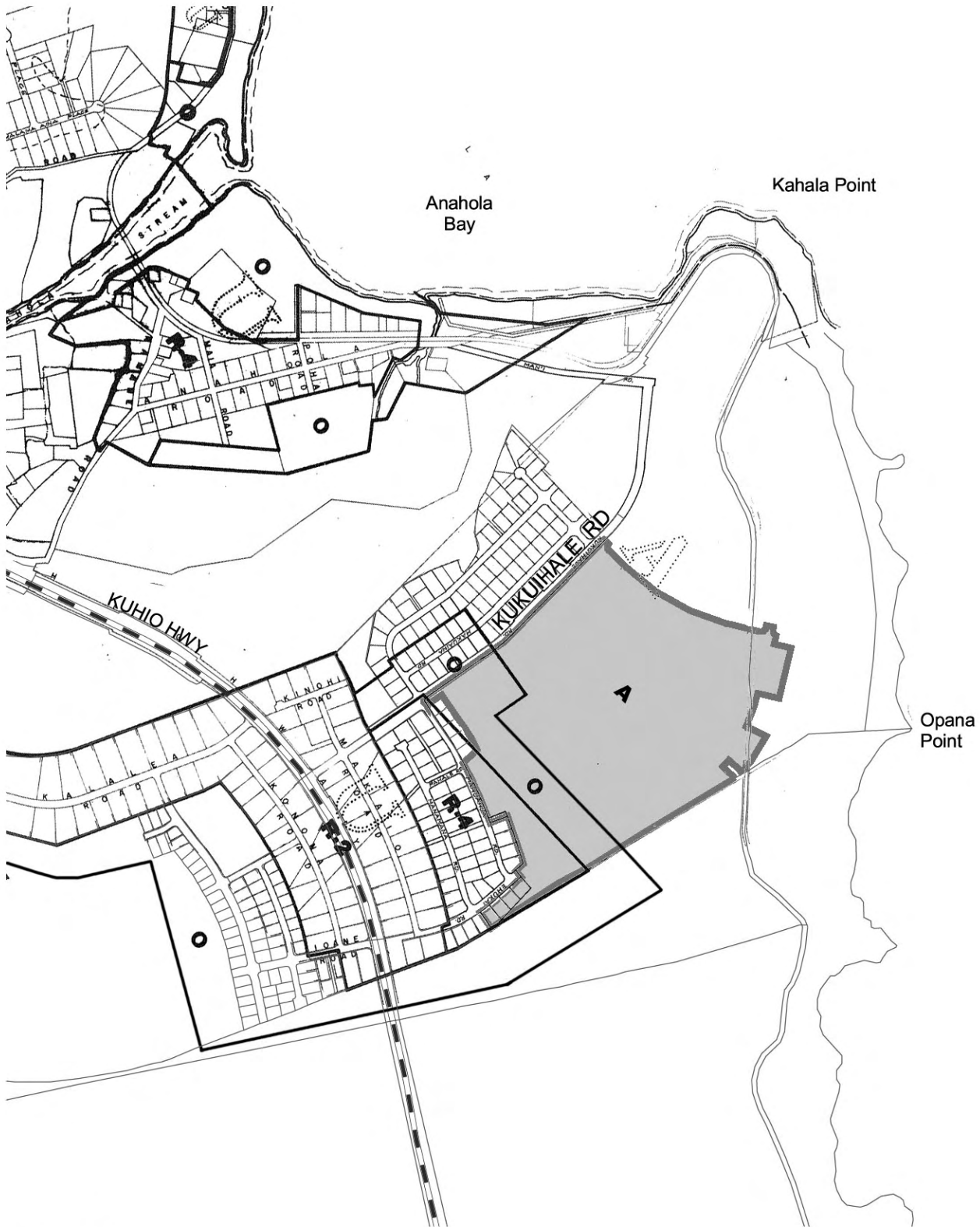
DEPARTMENT OF HAWAIIAN HOME LANDS

ISLAND OF KAUAI

NORTH

LINEAL SCALE (FEET)






LEGEND

Zoning Districts

A Agricultural

O Open

R-4 Residential (4 units/acre)

 Project Site Boundary

Source: County of Kauai (Map ZM-AN 600)

Disclaimer:
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Figure 6

Zoning Map

Anahola Residence Lots, Unit 6

DEPARTMENT OF HAWAIIAN HOME LANDS

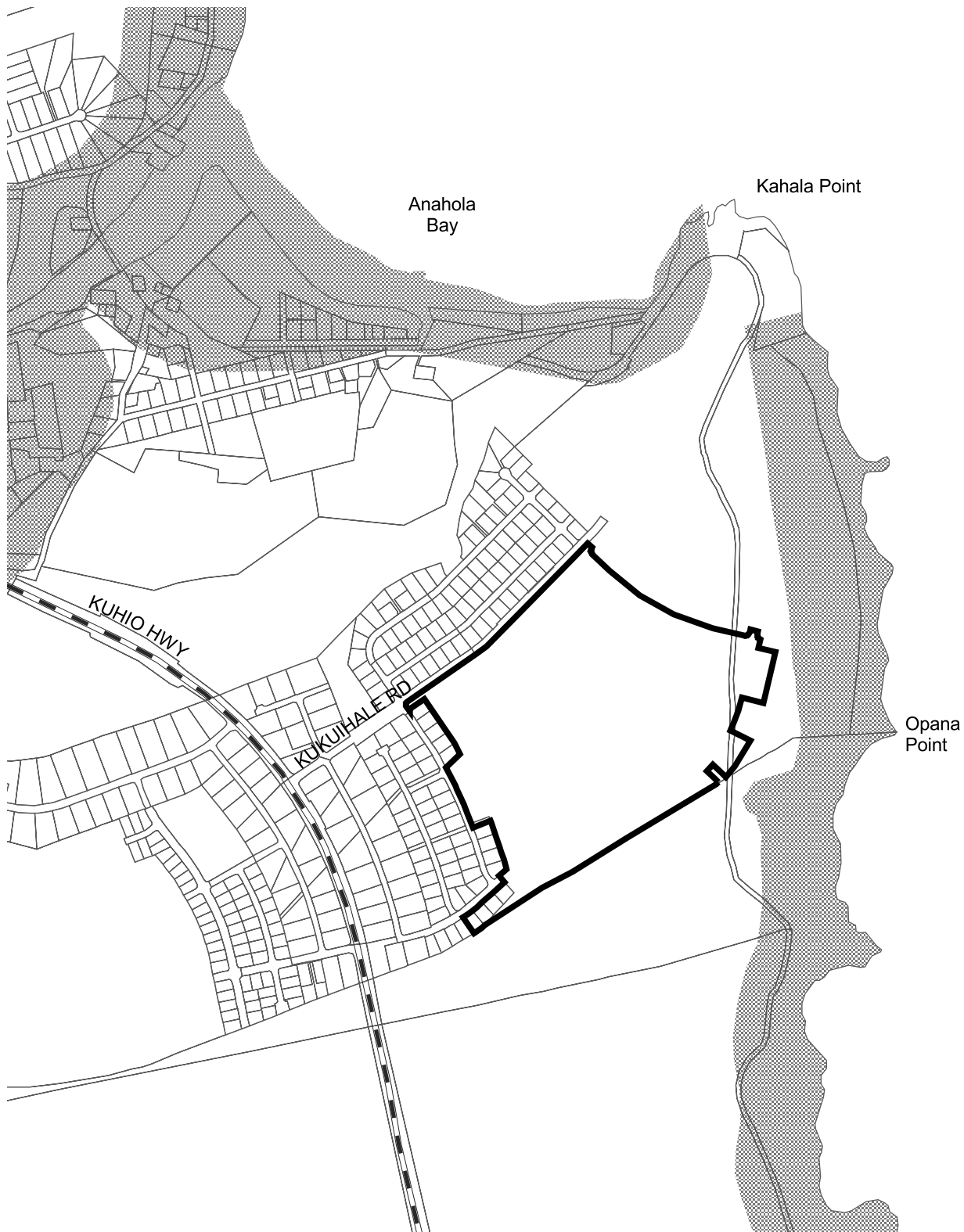
ISLAND OF KAUAI

NORTH





LINEAL SCALE (FEET)





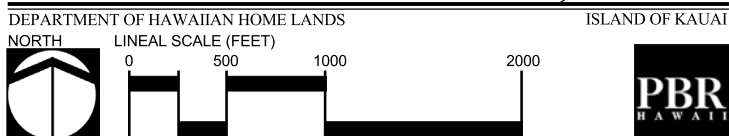
LEGEND

-  Special Management Area
-  Project Site Boundary

Source: County of Kauai

Disclaimer:
This graphic has been prepared for
general planning purposes only.

Figure 7
Special Management Area
Anahola Residence Lots, Unit 6



ANAHOLA RESIDENCE LOTS, UNIT 6
FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

Required Permits and Approvals

Permit/Approval	Responsible Agency
Chapter 343, HRS compliance	State of Hawai'i Department of Health – Office of Environmental Quality Control
National Pollutant Discharge Elimination System (NPDES) Permit	State of Hawai'i Department of Health
Building/Grading Permits Construction Plan Approval	County of Kaua'i Department of Public Works
Water Availability Construction Plan (Water) Approval	County of Kaua'i Department of Water
Variance to Allow Individual Waste Disposal System	State of Hawai'i Department of Health
Construction Plan (Electric) Approval	Kaua'i Island Utility Company, Sandwich Isles Communication, Inc.

1.4 LOCATION OF THE PROPERTY

The property is located in Anahola, in the Kawaihau district on the island of Kaua'i. The property is part of the DHHL Anahola/Kamalomalo'o tract, which includes 4,228 acres extending from the shoreline mauka to the Keālia Forest Reserve. This tract is the DHHL's second largest land holding on Kaua'i and is located approximately halfway between Hanalei and Līhu'e, just north of Kapa'a.

The project site is south of the town of Anahola, adjacent to an existing residential neighborhood (Figure 1). The property is approximately five miles north of Kapa'a. The project site is a 71.3-acre vacant parcel that was formerly used for sugar cultivation. Weeds, grasses, and shrubbery now cover the project site. It is surrounded by existing homestead neighborhoods to the north and west, and DHHL-owned land set aside for special uses to the south and east.

1.5 SURROUNDING LAND USES

The Kawaihau district extends from the Wailua River north to Moloa'a, including the Kapa'a-Wailua basin, Keālia, and Anahola. The Kapa'a-Wailua basin is home to a large portion of Kaua'i's population. The Kapa'a-Wailua corridor is characterized by small, locally owned businesses that meet the needs of both residents and visitors. Although the Kapa'a-Wailua corridor has grown as a tourist destination, it has retained its small-town character. The rest of the Kawaihau region remains primarily rural.

Anahola is the largest Hawaiian homestead community on Kaua'i. This project is the sixth increment of the DHHL Anahola Residence Lots. Existing DHHL subdivisions in Anahola include the following:

ANAHOLA RESIDENCE LOTS, UNIT 6
FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

- **Anahola Residence Lots, Unit 1:** residential lots located west of the project site and adjacent to (makai of) Kūhio Highway.
- **Anahola Residence Lots, Unit 2:** 58 residential lots located adjacent to and west of the project site.
- **Anahola Residence Lots, Unit 3:** 48 residential lots located adjacent to and northwest of the project site.
- **Anahola Residence Lots, Unit 4:** 90 residential lots located west of the project site and mauka of Kūhio Highway.
- **Anahola Residence Lots, Unit 5:** 39 residential lots located adjacent to and northwest of the project site.

These subdivisions and other private residences throughout Anahola have water transmission lines, drainage facilities, electrical and communication systems, and asphalt concrete roads without curbs or sidewalks.

1.6 BACKGROUND

The mission of the DHHL is to manage the Hawaiian Home Lands trust effectively and develop and deliver land to native Hawaiians.¹ The DHHL proposes to develop the Anahola Residence Lots, Unit 6 on an approximately 71.3-acre property in the Kawaihau district of Kauaʻi. The proposed action will be implemented under the provisions of the Hawaiian Homes Commission Act (HHCA), 1920, as amended. The HHCA authorizes the DHHL to lease to native Hawaiians the right to use and occupy Hawaiian home lands for agricultural, pastoral, and residential purposes, and to grant licenses to public utilities and others for various purposes. In accordance with the HHCA, Hawaiian home lands are not subject to zoning or other land use controls by the State or County.

The DHHL Anahola Residence Lots, Unit 6 involves the development of 181 lots for single-family residential use. Infrastructure requirements for the proposed project include construction or improvement of roads, drainage systems, water distribution lines, dry sewer lines, and power/communication lines.

¹ In this report, a lower case 'n' is used in the phrase 'native Hawaiian' when referring to Hawaiian Homes Commission Act beneficiaries, who by definition must have 50 percent Hawaiian ancestry in order to qualify. The upper case 'N' is used when more generally describing persons with any percentage of Hawaiian ancestry, as for Federal programs regarding health and education.

2.0 DESCRIPTION OF THE PROJECT

2.1 PROJECT GOALS AND OBJECTIVES

The project objective established by the DHHL is to provide a livable community for native Hawaiians, which would include the development of 181 single-family residences.

2.2 NEED FOR THE PROJECT

According to the *DHHL Applicant Survey, 2003* (SMS 2004), there has been a 57 percent increase in applicants for homesteads since 1995. Based on indicated preferences and focus groups, most applicants are looking to the DHHL to provide them with housing solutions. Of the three types of land awards (pastoral, agricultural, and residential), newer applicants have mostly applied for residential only or agricultural and residential land. Residential only applications have increased by 98 percent since 1995. On Kaua'i, beneficiaries indicated a preference for residential awards. Over 20 percent of beneficiaries ranked the Anahola tract as one of their top two choices. To meet this demand, the DHHL *Kaua'i Island Plan* (2004) identifies Anahola as one of three priority areas for residential development.

In 2003, approximately 63 percent of Kaua'i applicants were below the 80 percent median income guidelines established by the U.S. Department of Housing and Urban Development (HUD), making home ownership difficult to impossible. Anahola Residence Lots, Unit 6 will help meet the growing demand for residential land by providing much needed single-family turnkey homes for native Hawaiians. The project will also help to ease the statewide shortage of housing, as existing residences not on DHHL lands will become available to the general population once DHHL beneficiaries move to their homestead lots.

2.3 KEY ELEMENTS OF THE CONCEPTUAL PLAN

The Anahola Residence Lots, Unit 6 is proposed to be located on 71.3 acres of land in the makai portion of the DHHL's Anahola/Kamalomalo'o planning area. It will include 181 single-family residential lots with approximately 12 acres reserved for a potential school and/or residential expansion. In support of the development, infrastructure facilities to be expanded or improved include roads, drainage systems, water distribution lines, dry sewer lines, and power/communication transmission lines.² All infrastructure improvements will be designed and sized to accommodate the residential development in accordance with applicable standards of the County of Kaua'i, the State of Hawai'i, and public utility companies.

² For developments of 50 or more residential lots, the State Department of Health requires a wastewater treatment facility to service the subdivision. However, the DHHL has applied for a variance (Docket No. 05-VWW-34) to allow the use of individual waste disposal systems.

2.3.1 Site Development

The final layout and configuration of the proposed Anahola Residence Lots, Unit 6 will be refined through the planning, engineering, and design process to ensure that long-range use of the property will be consistent with surrounding land uses. Where appropriate, guidelines for sustainable building design, as outlined in the Office of Environmental Quality Control's "Guidelines for Sustainable Building Design in Hawai'i: A planner's checklist" (OEQC 1999), will be considered. Major land use elements of the conceptual plan (Figure 3) are described below.

Single-Family Residential

The majority of the 71.3-acre site will be allocated to single-family residential use and provide 181 lots ranging in size from 10,000 to 18,000 square feet.

School/Residential Expansion

Approximately 12 acres will be set aside for a school, if needed, or residential expansion.

2.4 INFRASTRUCTURE IMPROVEMENTS

Construction of the proposed Anahola Residence Lots, Unit 6 will begin with the development of necessary infrastructure facilities, after the construction plans are approved and the applicable grading permits are issued. DHHL developments and infrastructure are guided by master plans developed in the 1980s and updated as necessary.

On-site Improvements. Presently, there are no infrastructure facilities located on the proposed site. Roadways through the Anahola Residence Lots, Unit 2 provide the closest major transportation access. New on-site infrastructure will be required, including water transmission lines, internal roadways, drainage facilities, electrical and communication systems, and dry sewer lines. Infrastructure available in adjacent subdivisions will be extended to the site.

Off-site Improvements. The Anahola Residence Los, Unit 6 project will require water transmission lines and road improvements, including a left-turn storage lane on Kūhio Highway at Kukuihale Road. All improvements will be designed in accordance with the applicable standards of the County, State, and public utilities companies.

2.4.1 Water Supply and Distribution

The County of Kaua'i Department of Water (DOW) currently operates the Anahola water system, which includes two DHHL wells covered under prior agreements. The DHHL has a Water Credits Agreement (signed on November 13, 2002) with DOW. This agreement states that DOW shall allocate capacity, in the form of water meter issuance, equivalent to 400,000 gallons of potable water per day (gpd). According to this agreement, DOW shall not impose any time limitation on DHHL to use such allocation of potable water capacity from DOW's system.

At the time of the agreement, water capacity had already been allocated for 145 residential dwelling units in Anahola Residence Lots, Units 3, 4, and 5, for a total of 108,750 gpd, leaving a balance of 291,250 gpd, which is equivalent to approximately 388 water meters for residential dwelling units. According to the DOW's comment letter on the Draft EA, existing well source facilities are at capacity (Chapter 7.0). Additional facilities are being considered by the County.

2.4.2 Wastewater Collection and Transmission

The Anahola region is not currently serviced by a municipal wastewater treatment system. For developments of 50 or more residential lots, the State DOH requires a wastewater treatment facility to service the subdivision. However, the DHHL has applied for a variance (Docket No. 05-VWW-34) to allow the use of individual waste disposal systems. The DOH recently issued a draft Decision and Order granting the variance request. Additionally, in its comment letter on the Draft EA, the DOH Wastewater Branch stated that it is "pleased to see that dry sewer lines will be put in place for future connection to the County sewer service system" (Chapter 7.0).

2.4.3 Drainage Facilities

The Anahola region can be characterized as having both flat and gently rolling regions with some rugged cliffs rising above the coastal plain. It is located on the windward side of island and receives approximately 50 inches of rain per year in lowland areas.

Existing DHHL subdivisions include drainage facilities. Flood flows generated by mauka residential areas are either directed away from the project (northerly side) or collected in an existing ditch system (southerly side). The entire 71.3-acre site and surrounding area is designated Zone X (areas determined to be outside the 500 year flood plain) by the Flood Insurance Rate Map (Figure 8). The project will include improvements to the existing ditch system on the southerly side.

2.4.4 Transportation Improvements

The primary roadway serving the Kawaihau region is Kūhio Highway, a two-lane arterial highway. While travel on this highway can be congested in Kapa'a, the section of the highway in the project vicinity experiences relatively free-flowing circulation.

Primary access and egress will be via Kukuihale Road, which is an existing two-lane, two-direction roadway through the Anahola Residence Lots, Unit 2. Kukuihale Road leads to Anahola Beach Park and connects to Anahola Beach Road. The intersection of Kukuihale Road with Kūhio Highway is a stop-controlled T-intersection with no separate left turn lanes into or out of the project area. Secondary access and egress will be via an extension of Ehukai Road.

ANAHOLA RESIDENCE LOTS, UNIT 6
FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

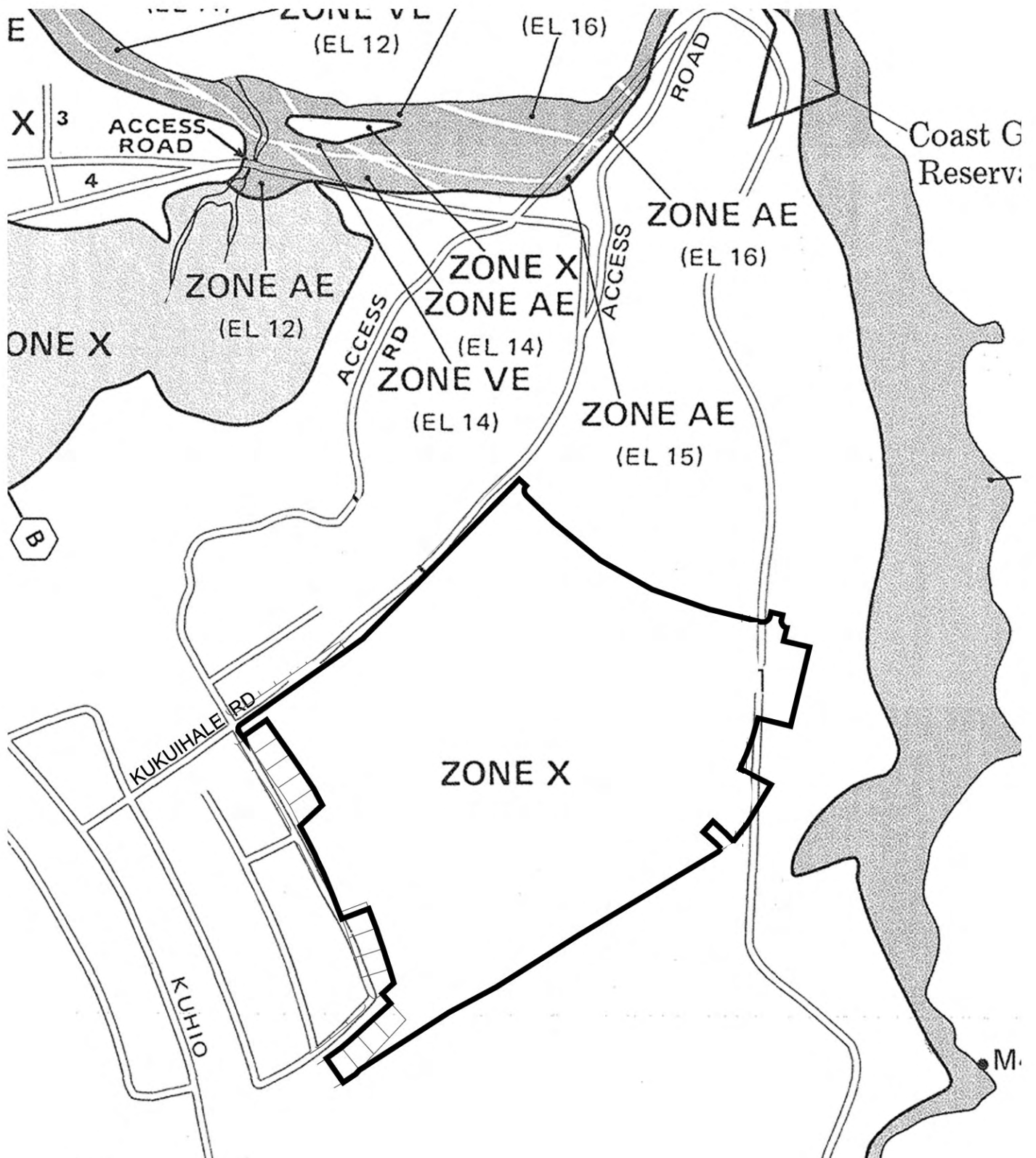
To provide safer ingress to the subdivision, highway widening and a left turn lane on Kūhio Highway at Kukuihale Road are included in this project. Improvements will be submitted to the State Department of Transportation for review and approval.

2.5 PHASING AND TIMING OF ACTION

Planning and engineering for the Anahola Residence Lots, Unit 6 is in process and will run through January 2006 (for Phase 1). Infrastructure will be constructed in three phases, beginning June 2006. House construction and occupancy will follow each phase of infrastructure development.

2.6 ORDER OF MAGNITUDE COSTS

The estimated infrastructure and site improvement cost for all three phases of the Anahola Residence Lots, Unit 6 project is \$20,280,000 in 2005 dollars.



3.0 RELATIONSHIP TO PLANS AND POLICIES

Relevant State of Hawai'i and County of Kaua'i land use plans, policies, and ordinances are described below.

3.1 CHAPTER 343, HAWAII REVISED STATUTES

This Environmental Assessment is prepared pursuant to Chapter 343, HRS and Section 11-200-4, HAR, which states that, "the governor, or an authorized representative, whenever an action proposes the use of state lands or the use of state funds, or, whenever a state agency proposes an action within section 11-200-6(b) shall be the final authority to accept an environmental impact statement."

The DHHL is the Accepting Authority for the *Anahola Residence Lots, Unit 6 Environmental Assessment*. The Draft EA was published in the Office of Environmental Quality Control (OEQC) *The Environmental Notice* on October 8, commencing a 30-day review period that ended on November 7. All comments and applicable responses are provided in Chapter 7.0.

3.1.1 Chapter 205, Hawaii Revised Statutes – State Land Use Law

The State Land Use Law (Chapter 205, HRS) establishes the Land Use Commission (LUC) and gives this body the authority to designate all lands in the State into one of four districts: Urban, Rural, Agricultural, or Conservation. The Anahola Residence Lots, Unit 6 subdivision is within the Urban and Agricultural Districts (Figure 4). The LUC confirmed this in its comment letter on the Draft EA (Chapter 7.0). In accordance with the HHCA, Hawaiian home lands are not subject to land use controls by the State or County.

3.1.2 Chapter 226 Hawaii Revised Statutes – Hawaii State Plan

The *Hawaii State Plan*:

- serves as a guide for the future long-range development of the State;
- identifies goals, objectives, policies, and priorities for the State;
- provides a basis for determining priorities and allocating limited resources, such as public funds, services, human resources, land, energy, water, and other resources; improves coordination of Federal, State, and County plans, policies, programs, projects, and regulatory activities; and
- establishes a system for plan formulation and program coordination to integrate all major State and County activities. Sections of the *Hawaii State Plan* applicable to the Anahola Residence Lots, Unit 6 project are discussed below.

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Section 226-4 State goals:

In order to guarantee, for present and future generations, those elements of choice and mobility that insure that individuals and groups may approach their desired levels of self-reliance and self-determination, it shall be the goal of the State to achieve:

- (1) A strong, viable economy, characterized by stability, diversity, and growth, that enables the fulfillment of the needs and expectations of Hawaii's present and future generations.*
- (2) A desired physical environment, characterized by beauty, cleanliness, quiet, stable natural systems, and uniqueness, that enhances the mental and physical well-being of the people.*
- (3) Physical, social, and economic well-being, for individuals and families in Hawaii, that nourishes a sense of community responsibility, of caring, and of participation in community life.*

Discussion: The proposed Anahola Residence Lots, Unit 6 will help present and future generations of native Hawaiians reach their desired level of self-reliance by providing home ownership opportunities. The project will also benefit the State by easing the shortage of housing, as beneficiaries in the open market move onto homestead lots. The economy will also be supported through this project, which will provide construction-related employment opportunities.

Section 226-5 Objective and policies for population:

- (a) It shall be the objective in planning for the State's population to guide population growth to be consistent with the achievement of physical, economic, and social objectives contained in this chapter.*
- (b) To achieve the population objective, it shall be the policy of this State to:*
 - (1) Manage population growth statewide in a manner that provides increased opportunities for Hawaii's people to pursue their physical, social, and economic aspirations while recognizing the unique needs of each county.*
 - (3) Promote increased opportunities for Hawaii's people to pursue their socio-economic aspirations throughout the islands.*
 - (7) Plan the development and availability of land and water resources in a coordinated manner so as to provide for the desired levels of growth in each geographic area.*

Discussion: The Anahola Residence Lots, Unit 6 project is consistent with these objectives and policies by helping to satisfy the housing demand of a growing population and providing native Hawaiians with affordable housing. Socio-economic opportunities for Hawai'i's people will be offered through the project, which will provide new home ownership opportunities.

Section 226-9 Objective and policies for the economy – federal expenditures:

- (a) Planning for the State's economy with regard to federal expenditures shall be directed towards achievement of the objective of a stable federal investment base as an integral component of Hawaii's economy.*
- (b) To achieve the federal expenditures objective, it shall be the policy of this State to:*
 - (3) Promote the development of federally supported activities in Hawaii that respect state-wide economic concerns, are sensitive to community needs, and minimize adverse impacts on Hawaii's environment.*

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Discussion: The Anahola Residence Lots, Unit 6 project will receive Federal funding from the U.S. Department of Housing and Urban Development (HUD). This EA has been prepared to address potential impacts to the physical, social, and economic environment.

Section 226-10 Objective and policies for the economy – potential growth activities:

- (a) *Planning for the State's economy with regard to potential growth activities shall be directed towards achievement of the objective of development and expansion of potential growth activities that serve to increase and diversify Hawaii's economic base.*
- (b) *To achieve the potential growth activity objective, it shall be the policy of this State to:*
 - (10) *Encourage the development and implementation of joint federal and state initiatives to attract federal programs and projects that will support Hawaii's social, economic, physical, and environmental objectives.*

Discussion: This project will receive Federal and State funding to provide native Hawaiians with enhanced socio-economic opportunities through home ownership in a livable community.

Section 226-11 Objectives and policies for the physical environment – land-based, shoreline, and marine resources:

- (a) *Planning for the State's physical environment with regard to land-based, shoreline, and marine resources shall be directed towards achievement of the following objectives.*
 - (2) *Effective protection of Hawaii's unique and fragile environmental resources.*
- (b) *To achieve the land-based, shoreline, and marine resources objectives, it shall be the policy of this State to:*
 - (1) *Exercise an overall conservation ethic in the use of Hawaii's natural resources.*
 - (2) *Ensure compatibility between land-based and water-based activities and natural resources and ecological systems.*
 - (3) *Take into account the physical attributes of areas when planning and designing activities and facilities.*
 - (4) *Manage natural resources and environs to encourage their beneficial and multiple use without generating costly or irreparable environmental damage.*
 - (6) *Encourage the protection of rare or endangered plant and animal species and habitats native to Hawaii.*
 - (8) *Pursue compatible relationships among activities, facilities, and natural resources.*
 - (9) *Promote increased accessibility and prudent use of inland and shoreline areas for public recreational, educational, and scientific purposes.*

Discussion: This EA identifies the physical, archaeological, and cultural attributes of the proposed Anahola Residence Lots, Unit 6 site. Potential impacts on features such as slope, soil, streams and drainage, flora, and fauna resulting from the project have been identified throughout this EA, which also presents proposed mitigation measures. Proposed infrastructure improvements will better control runoff and erosion (compared to existing conditions under which the land is covered with weeds, grasses, and shrubbery). No threatened or endangered species or species of concern are known to exist on the site.

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Section 226-12 Objective and policies for the physical environment – scenic, natural beauty, and historic resources:

- (a) *Planning for the State's physical environment shall be directed towards achievement of the objective of enhancement of Hawaii's scenic assets, natural beauty, and multi-cultural/historic resources.*
- (b) *To achieve the scenic, natural beauty, and historic resources objective, it shall be the policy of this State to:*
 - (1) *Promote the preservation and restoration of significant natural and historic resources.*
 - (3) *Promote the preservation of views and vistas to enhance the visual and aesthetic enjoyment of mountains, ocean, scenic landscapes, and other natural features.*
 - (4) *Protect those special areas, structures, and elements that are an integral and functional part of Hawaii's ethnic and cultural heritage.*
 - (5) *Encourage the design of developments and activities that complement the natural beauty of the islands.*

Discussion: As discussed above, this EA identifies physical, archaeological, and cultural attributes of the proposed project; identifies potential impacts; and proposes mitigation measures. There are no identified historic or archaeologically significant sites in the project area or vicinity, which was under sugarcane cultivation for many years and is essentially disturbed land. Items of historical value that may have existed previously on the site most likely have been destroyed by heavy equipment during years of cultivation. As requested by the Office of Hawaiian Affairs, should iwi or Native Hawaiian cultural or traditional deposits be found during ground disturbance, work will cease and the appropriate agencies will be contacted (Chapter 7.0).

The Anahola Residence Lots, Unit 6 site is located approximately 0.14 miles from the shoreline. Views to the east of the project site are primarily of existing private and DHHL single-family homes. To the west are views of the coastline and ocean. The proposed project will be of a similar character as existing residences and is not anticipated to substantially affect existing public coastal or ocean views.

Section 226-15 Objectives and policies for facility systems – solid and liquid wastes:

- (a) *Planning for the State's facility systems with regard to solid and liquid wastes shall be directed towards achievement of the following objectives:*
 - (1) *Maintenance of basic public health and sanitation standards relating to treatment and disposal of solid and liquid wastes.*

Discussion: The Anahola region is not currently serviced by a municipal wastewater treatment system. Existing houses are served by individual wastewater systems (IWS). For developments of 50 or more residential lots, the State DOH requires a wastewater treatment facility to service the subdivision. The DHHL has applied for a variance (Docket No. 05-VWW-34) to allow the use of individual waste disposal systems. The DOH recently issued a draft Decision and Order granting the variance request. Additionally, in its comment letter on the Draft EA, the DOH Wastewater Branch stated that it is "pleased to see that dry sewer lines will be put in place for future connection to the County sewer service system" (Chapter 7.0).

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Section 226-16 Objective and policies for facility systems – water:

- (a) *Planning for the State's facility systems with regard to water shall be directed towards achievement of the objective of the provision of water to adequately accommodate domestic, agricultural, commercial, industrial, recreational, and other needs within resource capacities.*
- (b) *To achieve the facility systems water objective, it shall be the policy of this State to:*
 - (1) *Coordinate development of land use activities with existing and potential water supply.*

Discussion: The County of Kaua'i Department of Water (DOW) currently operates the Anahola water system, which includes two DHHL wells covered under prior agreements. The DHHL has a Water Credits Agreement (signed on November 13, 2002) with DOW. This agreement states that DOW shall allocate capacity, in the form of water meter issuance, equivalent to 400,000 gallons of potable water per day (gpd). At the time of the agreement, water capacity had already been allocated for 145 residential dwelling units in Anahola Residence Lots, Units 3, 4, and 5, for a total of 108,750 gpd, leaving a balance of 291,250 gpd, which is equivalent to approximately 388 water meters for residential dwelling units. According to the DOW's comment letter on the Draft EA, existing well source facilities are at capacity (Chapter 7.0). Additional facilities are being considered by the County.

Section 226-19 Objectives and policies for socio-cultural advancement – housing:

- (a) *Planning for the State's socio-cultural advancement with regard to housing shall be directed toward the achievement of the following objectives:*
 - (1) *Greater opportunities for Hawaii's people to secure reasonably priced, safe, sanitary, livable homes, located in suitable environments that satisfactorily accommodate the needs and desires of families and individuals, through collaboration and cooperation between government and nonprofit and for-profit developers to ensure that more affordable housing is made available to very low-, low- and moderate-income segments of Hawaii's population.*
 - (2) *The orderly development of residential areas sensitive to community needs and other land uses.*
- (b) *To achieve the housing objectives, it shall be the policy of this State to:*
 - (1) *Effectively accommodate the housing needs of Hawaii's people.*
 - (3) *Increase homeownership and rental opportunities and choices in terms of quality, location, cost, densities, style, and size of housing.*
 - (5) *Promote design and location of housing developments taking into account the physical setting, accessibility to public facilities and services, and other concerns of existing communities and surrounding areas.*
 - (6) *Facilitate the use of available vacant, developable, and underutilized urban lands for housing.*
 - (7) *Foster a variety of lifestyles traditional to Hawaii through the design and maintenance of neighborhoods that reflect the culture and values of the community.*

Discussion: The Anahola Residence Lots, Unit 6 development will provide native Hawaiians with home ownership opportunities. As beneficiaries move out of their current residences that are not on DHHL lands and into the Anahola community, the vacated units will become available to the general public, helping to ease the statewide shortage of housing. This project proposes the development of single-family residences that will be designed to reflect the character of existing surrounding homestead units in Anahola.

Section 226-21 Objectives and policies for socio-cultural advancement – Education:

- (a) *Planning for the State's socio-cultural advancement with regard to education shall be directed towards achievement of the objective of the provision of a variety of educational opportunities to enable individuals to fulfill their needs, responsibilities, and aspirations:*
 - (2) *Ensure the provision of adequate and accessible educational services and facilities that are designed to meet individual and community needs.*

Discussion: Students in Anahola attend elementary, middle, and high school in Kapa'a, or other public, private, and charter schools in Kaua'i. As of 1999, the Kapa'a public schools had a combined surplus in student capacity of 563. In its comment letter on the Draft EA, the DOE confirmed that approximately 104 students are estimated to live in the proposed subdivision when it is complete (Chapter 7.0). The DHHL has set aside a 12-acre school site on the property. However, the DOE noted that it is not a likely site for a new school if the DOE is required to pay market rate rent. The DHHL is now considering use of the site by a smaller charter school and/or residential expansion.

Section 226-23 Objectives and policies for socio-cultural advancement – Leisure:

- (a) *Planning for the State's socio-cultural advancement with regard to leisure shall be directed towards achievement of the objective of the adequate provision of resources to accommodate diverse, cultural, artistic, and recreational, needs for present and future generations:*

Discussion: The Anahola Residence Lots, Unit 6 project will not alter beach access for recreation and subsistence activities. Coastal resources and access to the shoreline are very important to the residents of Anahola. To ensure the continued health of the coastal region at Anahola, the DHHL *Kaua'i Island Plan* (2004) established a "Special District," which acts as a coastal buffer between residential areas, including the Anahola Residence Lot, Unit 6, and the shoreline.

Section 226-52 Statewide planning system:

- (a) *The statewide planning system shall consist of the following policies, plans, and programs:*
 - (2) *The priority guidelines established in this chapter shall provide guidelines for decision-making by the State and the counties for the immediate future and set priorities for the allocation of resources. The formulation and amendment of state functional plans shall be in conformance with the priority guidelines.*
- (b) *The statewide planning system shall also consist of several implementation mechanisms, including:*
 - (2) *The state budgetary, land use, and other decisionmaking processes. The state budgetary, land use, and other decisionmaking processes shall consist of:*
 - (D) *Land use decisionmaking processes of state agencies. Land use decisions made by state agencies shall be in conformance with the overall theme, goals, objectives, and policies, and shall utilize as guidelines the priority guidelines contained within this chapter, and the state functional plans adopted pursuant to this chapter. The rules adopted by appropriate state agencies to govern land use decisionmaking shall be in conformance with the overall theme, goals, objectives, and policies contained within this chapter.*

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Discussion: The DHHL Anahola Residence Lots, Unit 6 project complies with the guidelines established by the *Hawaii State Plan* and *State Functional Plans* regarding the statewide planning system and the land use decision-making process.

Section 226-103 Economic priority guidelines:

- (f) *Priority guidelines for energy use and development:*
 - (1) *Encourage the development, demonstration, and commercialization of renewable energy resources.*
 - (2) *Initiate, maintain, and improve energy conservation programs aimed at reducing energy waste and increasing public awareness of the need to conserve energy.*

Discussion: In compliance with Chapter 344 (State Environmental Policy) and Chapter 226 (Hawaii State Planning Act), HRS, all project buildings, activities, and site grounds will be designed with energy-saving considerations. Energy-efficient design practices and technologies will be specifically addressed in the design phase of the proposed project. The State's Model Energy Code will be considered during the detailed design phases of project development.

Section 226-104 Population growth and land resources priority guidelines:

- (a) *Priority guidelines to effect desired Statewide growth and distribution:*
 - (1) *Encourage planning and resource management to insure population growth rates throughout the State that are consistent with available and planned resource capacities and reflect the needs and desires of Hawaii's people.*
- (b) *Priority guidelines for regional growth distribution and land resource utilization:*
 - (6) *Direct future urban development away from critical environmental areas or impose mitigating measures so that negative impacts on the environment would be minimized.*
 - (12) *Utilize Hawaii's limited land resources wisely, providing adequate land to accommodate projected population and economic growth needs while ensuring the protection of the environment and the availability of the shoreline, conservation lands, and other limited resources for future generations.*

Discussion: Population projections indicate that the County of Kaua'i population will reach 74,750 by 2030, a 27.9 percent increase over the population recorded by the most recent U.S. Census in 2000 (*State of Hawaii Data Book, 2003*). The *Kaua'i Island Plan* beneficiary survey indicated that Anahola is one of the most preferred regions for a residential homestead. Of the Anahola lands that are in the DHHL inventory, Unit 6 presents the best opportunity to develop residential homesteads and meet the beneficiary demand in the short-term due to existing water infrastructure. The Anahola Residence Lots, Unit 6 will include 181 single-family residential units.

The Anahola Residence Lots, Unit 6 site is not in a critical environment. The project is not expected to negatively impact the shoreline, conservation lands, or other limited resources and will provide single-family residences to eligible native Hawaiian homestead beneficiaries, helping to accommodate the projected population growth and address the demand for new housing.

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The project site is located in the critical wastewater disposal area determined by the County Wastewater Advisory Committee. No cesspools are allowed in this area and none are proposed in this project. Best management practices will be employed during construction to mitigate erosion, which has the potential for impacting air and water quality. Mitigation measures for other potential impacts resulting from this project are identified in this EA. Any historic and cultural sites encountered during construction will be treated in accordance with accepted standards and regulations of the State Department of Land and Natural Resources (DLNR) Historic Preservation Division (SHPD).

Section 226-106 Affordable housing:

(b) *Priority guidelines for the provision of affordable housing:*

- (1) *Seek to use marginal or nonessential agricultural land and public land to meet housing needs of low- and moderate-income and gap-group households.*
- (2) *Encourage the use of alternative construction and development methods as a means of reducing production costs.*
- (4) *Create incentives for development which would increase home ownership and rental opportunities for Hawaii's low- and moderate-income households, gap-group households, and residents with special needs.*
- (7) *Encourage improved coordination between various agencies and levels of government to deal with housing policies and regulations.*

Discussion: The Anahola Residence Lots, Unit 6 project will use public land and will provide home ownership opportunities for eligible native Hawaiians. As DHHL beneficiaries move to the Anahola Residence Lots, their vacated residences that are not on DHHL lands will become available to the general public, thus helping to ease the statewide shortage of housing.

3.1.3 Chapter 226 Hawaii Revised Statutes – State Functional Plan

The *Hawaii State Plan* is primarily guided by the *State Functional Plans* (Chapter 226, HRS) and implemented by the State Department of Budget and Finance and the LUC. *State Functional Plans*, prepared by various State agencies with citizen input, provide specific recommendations for action. The areas addressed by the plans are: agriculture, conservation lands, education, employment, energy, health, higher education, historic preservation, housing, human services, recreation, tourism, and transportation. The following describes how the Anahola Residence Lots, Unit 6 project complies with applicable *State Functional Plans*.

Historic Preservation Functional Plan

According to the *Historic Preservation Functional Plan*, the preservation of historic properties involves three major areas of activity: the identification, protection, and management and treatment of historic properties. The policies in the *Historic Preservation Functional Plan* are aimed primarily toward government action to provide mechanisms for improving the State's inventory, preservation systems, public access, and public awareness programs on archaeological matters.

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Discussion: There are no identified historic or archaeologically significant sites in the project area or vicinity, which was under sugarcane cultivation for many years and is essentially disturbed land. Any items of historical value that may have existed previously on the site most likely have been destroyed by heavy equipment during years of cultivation. In its comment letter on the Draft EA, the SHPD stated that it believes there are no historic properties present on the site because residential development/urbanization and previous grubbing/grading have altered the land (Chapter 7.0).

Housing Functional Plan

The State *Housing Functional Plan*, prepared by the State Housing Finance and Development Corporation (now Housing and Community Development Corporation of Hawaii), addresses six major areas of concern: 1) increasing home ownership; 2) expanding rental housing opportunities; 3) expanding rental housing opportunities for the elderly and other special need groups; 4) preserving housing stock; 5) designating and acquiring land that is suitable for residential development; and 6) establishing and maintaining a housing information system. The majority of the objectives, policies, and implementing actions of the State Housing Functional Plan apply to the government sector.

Objective A: *Homeownership for at least sixty percent, or roughly 248,500 households by the year 2000.*

Strategy: *Expand the supply of affordably priced residential units through joint public/private sector efforts. Mobilize resources to better assist families seeking home ownership opportunities. Alternate or Innovative approaches to developing housing should also be pursued.*

Policy A(1): *Direct Federal, State and county resources and efforts toward the development of affordable for-sale housing units.*

Policy A(2): *Encourage increased private sector participation in the development of affordable for-sale housing units.*

Policy A(3): *Ensure that (1) housing projects and (2) projects which impact housing provide a fair share/adequate amount of affordable home ownership opportunities.*

Policy A(4): *Assist first time home buyers in purchasing a home.*

Policy A(5): *Use alternative approaches in providing affordable housing for sale.*

Discussion: The Anahola Residence Lots, Unit 6 project provides for the development of single-family residences with Federal and State resources. Housing opportunities afforded by this project will stimulate and promote increased housing choices for Hawai'i's citizens, directly to eligible native Hawaiians and indirectly to the general population as residences become available when DHHL beneficiaries move out of their current residences that are not on DHHL lands and onto homestead lots. The project will add to the housing inventory, thus

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helping to stabilize the price, overall quality, location, style, and size of housing in Hawai'i. The proposed Anahola Residence Lots, Unit 6 project will also satisfy the beneficiary desire and demand for homes in Anahola.

Agriculture Functional Plan

The *Agriculture Functional Plan* seeks to increase the overall level of agricultural development in Hawaii, in accordance with the two fundamental Hawaii State Plan objectives for agriculture: 1) continued viability of Hawaii's sugar and pineapple industries, and 2) continued growth and development of diversified agriculture throughout the State.

Discussion: Anahola is currently DHHL's largest residential area on Kaua'i. Although the proposed site was previously used for agriculture, the surrounding area has been converted to residential uses. Additional agricultural land is available in the Anahola/Kamalomalo'o tract and elsewhere on Kaua'i. The limiting factor to the growth of diversified agriculture is not the land supply, but rather the size of the market for those crops than can be grown profitably in Hawai'i. Based on the ample supply of land suitable for diversified agriculture on Kaua'i and the relative lack of market demand (compared to the supply available), the Anahola Residence Lots, Unit 6 project site is not expected to adversely impact agricultural activities.

Employment Functional Plan

The policies and recommended actions in the *Employment Functional Plan* center around the development and improvement of career/job training programs, the expansion of the labor pool, and the improvement of quality of life for workers.

Discussion: The proposed Anahola Residence Lots, Unit 6 project will generate direct, indirect, and induced construction-related jobs, both within the property and on an island-wide and statewide basis. Construction industries, as well as industries supporting construction, will benefit from the employment and economic opportunities provided by the project. Once the project is completed, DHHL beneficiaries are likely to spend money on home improvements and will either purchase materials and do the work themselves or hire contractors to do the work.

Energy Functional Plan

The *Energy Functional Plan* outlines policies to promote energy efficiency, displace fossil fuel consumption, support public education and legislation on energy, and better develop and manage energy.

Discussion: In compliance with Chapter 344 (State Environmental Policy) and Chapter 226 (Hawaii State Planning Act), HRS, all project buildings, activities, and site grounds will be designed with energy-saving considerations. Energy-efficient design practices and technologies will be specifically addressed in the design phase of the proposed project. The

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State's Model Energy Code will be considered during the detailed design phases of project development.

Recreation Functional Plan

The *Recreation Functional Plan* addresses government action toward the acquisition of recreation areas and accesses, the establishment and development of areas and facilities, and the management and usage of recreation resources.

Discussion: Existing recreational facilities in Anahola include Anahola Beach Park, Anahola Hawaiian Homes Park, and Village Park. The Anahola Residence Lots, Unit 6 project will not limit access to these existing recreational opportunities. Some residents of the project may already live in the Kawaihau region and visit parks in the project area.

Transportation Functional Plan

The overall objective of the *Transportation Functional Plan* is to provide for the efficient, safe, and convenient movement of people and goods. The *Transportation Functional Plan* is implemented as a short- to mid-term action agenda by the State Department of Transportation (DOT). It identifies four key issue areas as the most critical concerns relating to transportation in Hawai'i. They are: (1) Congestion, (2) Economic Development, (3) Funding, and (4) Education. The following objectives, policies, and actions have the most relevance to the Anahola Residence Lots, Unit 6 project.

Objective I.A: *Expansion of the transportation system.*

Policy I.A.1: *Increase transportation capacity and modernize transportation infrastructure in accordance with existing master plans and laws requiring accessibility for people with disabilities.*

Policy I.A.2: *Improve regional mobility in areas of the State experiencing rapid urban growth and road congestion.*

Objective I.B: *Reduction of travel demand through zoning and decentralization initiatives.*

Policy I.B.1: *Close the gap between where people live and work through decentralization, mixed zoning, and related initiatives.*

Discussion: The primary roadway serving the Kawaihau region is Kūhio Highway, a two-lane arterial highway. While travel on this highway can be congested in Kapa'a, the section of the highway in the project vicinity experiences relatively free-flowing circulation.

Primary access and egress will be via Kukuihale Road, which is an existing two-lane, two-way roadway through the Anahola Residence Lots, Unit 2. The intersection of Kukuihale Road with Kūhio Highway is an unsignalized T-intersection with no separate left turn lanes into or out of the project area. Secondary access and egress will be via an extension of Ehukai Road.

3.1.4 Section 205A Hawaii Revised Statutes – Coastal Zone Management Program

The objectives of the Coastal Zone Management (CZM) Program are to provide the public with recreational opportunities, protect historic and prehistoric resources, protect scenic and open space resources, protect coastal ecosystems, provide facilities for economic development, reduce hazards, and manage development. Program objectives applicable to the Anahola Residence Lots, Unit 6 project are discussed below.

Recreational Resources

Objective: *Provide coastal recreational opportunities accessible to the public.*

Policies:

- (B) *Provide adequate, accessible, and diverse recreational opportunities in the coastal zone management area by:*
 - (i) *Protecting coastal resources uniquely suited for recreation activities that cannot be provided in other areas.*
 - (iii) *Providing and managing adequate public access, consistent with conservation of natural resources, to and along shorelines with recreational value.*
 - (iv) *Providing an adequate supply of shoreline parks and other recreational facilities suitable for public recreation.*
 - (vii) *Developing new shoreline recreational opportunities, where appropriate, such as artificial lagoons, artificial beaches, and artificial reefs for surfing and fishing.*
 - (viii) *Encouraging reasonable dedication of shoreline areas with recreational value for public use as part of discretionary approvals or permits by the land use commission, board of land and natural resources, and county authorities; and crediting such dedication against the requirements of section 46-6.*

Discussion: The Anahola Residence Lots, Unit 6 project will not alter beach access for recreation and subsistence activities. Coastal resources and access to the shoreline are very important to the residents of Anahola. To ensure the continued health of the coastal region at Anahola, the DHHL *Kaua'i Island Plan* (2004) established a "Special District," which acts as coastal buffer between residential areas, including the Anahola Residence Lot, Unit 6, and the shoreline.

Historic Resources

Objective: *Protect, preserve, and where desirable, restore those natural and man made historic and prehistoric resources in the coastal zone management area that are significant in Hawaiian and American history and culture.*

Policies:

- (A) *Identify and analyze significant archaeological resources;*
- (B) *Maximize information retention through preservation of remains and artifacts or salvage operations; and*
- (C) *Support state goals for protection, restoration, interpretation, and display of historic resources.*

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Discussion: There are no identified historic or archaeologically significant sites in the project area or vicinity, which was under sugarcane cultivation for many years and is essentially disturbed land. Items of historical value that may have existed previously on the site most likely have been destroyed by heavy equipment during years of cultivation. The SHPD stated that it believes there are no historic properties present on the site (Chapter 7.0). However, should any unanticipated sites, artifacts or remains, such as shell, bone, or charcoal deposits be discovered during construction, the work will be halted and mitigating measures will be discussed with the SHPD prior to commencing construction activity.

Scenic and Open Space Resources

Objective: *Protect, preserve, and where desirable, restore or improve the quality of coastal scenic and open space resources.*

Policies:

- (B) *Ensure that new developments are compatible with their visual environment by designing and locating such developments to minimize the alteration of natural landforms and existing public views to and along the shoreline.*
- (C) *Preserve, maintain, and where desirable, improve and restore shoreline open space and scenic resources.*
- (D) *Encourage those developments that are not coastal dependent to locate in inland areas.*

Discussion: The Anahola Residence Lots, Unit 6 site is located outside of the Special Management Area, approximately 0.14 miles from the shoreline. Views to the east of the project site are primarily of existing private and DHHL single-family homes. To the west are views of the coastline and ocean. The proposed project will be of a similar character as existing residences and is not anticipated to substantially affect existing public coastal or ocean views.

Coastal Ecosystems

Objective: *Protect valuable coastal ecosystems, including reefs, from disruption and minimize adverse impacts on all coastal ecosystems.*

Policies:

- (B) *Improve the technical basis for natural resource management.*
- (C) *Preserve valuable coastal ecosystems, including reefs, of significant biological or economic importance.*
- (D) *Minimize disruption or degradation of coastal water ecosystems by effective regulation of stream diversions, channelization, and similar land and water uses, recognizing competing water needs.*
- (E) *Promote water quantity and quality planning and management practices that reflect the tolerance of fresh water and marine ecosystems and maintain and enhance water quality through the development and implementation of point and nonpoint source water pollution control measures.*

Discussion: The Anahola Residence Lots, Unit 6 project will incorporate measures to mitigate any water quality impacts from surface runoff in accordance with applicable State

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DOH drainage regulations. No adverse drainage impacts are anticipated, as both temporary and permanent erosion and sedimentation control measures will be implemented. Best management practices and erosion control measures will also be implemented during construction activities.

Economic Uses

Objective: *Provide public or private facilities and improvements important to the State's economy in suitable locations.*

Policies:

- (A) *Ensure that coastal dependent development such as harbors and ports, and coasted related development such as visitor industry facilities and energy generating facilities, are located, designed, and constructed to minimize adverse social, visual, and environmental impacts in the coastal zone management area.*
- (B) *Direct the location and expansion of coastal dependent developments to areas presently designated and used for such developments and permit reasonable long-term growth at such areas, and permit coastal dependent development outside presently designated areas when:*
 - (ii) *Adverse environmental effects are minimized.*

Discussion: There are no coastal-dependent economic activities within the vicinity of the Anahola Residence Lots, Unit 6 site. The proposed project will not alter beach access for recreation and subsistence activities nor will it impact coastal resources. To ensure the continued health of the coastal region at Anahola, the DHHL *Kaua'i Island Plan* (2004) established a "Special District," which acts as coastal buffer between residential areas, including the Anahola Residence Lot, Unit 6, and the shoreline.

Coastal Hazards

Objective: *Reduce hazard to life and property from tsunami, storm waves, stream flooding, erosion, subsidence, and pollution.*

Policies:

- (B) *Control development in areas subject to storm wave, tsunami, flood, erosion, hurricane, wind, subsidence, and point and nonpoint source pollution hazards.*
- (C) *Ensure that developments comply with requirements of the Federal Flood Insurance Program.*
- (D) *Prevent coastal flooding from inland projects.*

Discussion: The Anahola Residence Lots, Unit 6 is not anticipated to be affected by tsunami, as it is located away from the shoreline and primarily out of the tsunami evacuation zone. A small portion of the site appears to be located within the tsunami evacuation zone; however, it is difficult to determine the accuracy of the zone as boundaries were estimated by topographical characteristics, or approximated using surrounding features such as roads. The Flood Insurance Rate Map indicates that Anahola Residence Lots, Unit 6 site is located in Zone X, which designates areas determined to be outside the 500-year flood plain (Figure 8).

ANAHOLA RESIDENCE LOTS, UNIT 6
FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

Managing Development

Objective: *Improve the development review process, communication and public participation in the management of coastal resources and hazards.*

Policies:

- (A) *Use, implement, and enforce existing law effectively to the maximum extent possible in managing present and future coastal zone development;*
- (C) *Communicate the potential short- and long-term impacts of proposed significant coastal developments early in their life-cycle and in terms understandable to the public to facilitate public participation in the planning and review process.*

Discussion: All improvements will be developed in accordance with all Federal, State, and County requirements and standards affecting health and safety. This EA reports on the potential short- and long-term impacts of the proposed project. Preparation of this EA included meetings with cultural practitioners knowledgeable about the site and the Anahola area, which created the opportunity for public input on potential impacts on Native Hawaiian cultural practices, as well as other issues.

Public Participation

Objective: *Stimulate public awareness, education, and participation in coastal management.*

Policies:

- (A) *Promote public involvement in coastal zone management processes.*
- (C) *Organize workshops, policy dialogues, and site-specific mediations to respond to coastal issues and conflicts.*

Discussion: DHHL held a general informational meeting on Kaua'i to discuss future development on the island. This EA reports on the potential short- and long-term impacts of the proposed Anahola Residence Lots, Unit 6 project. Prior to and throughout the development of this EA, various agencies (or agency documents) and individuals were consulted (see consultation list in Chapter 7.0). The Draft EA was distributed to various agencies and submitted to the OEQC, commencing a 30-day public review period, which ended on November 7, 2005.

Beach Protection

Objective: *Protect beaches for public use and recreation.*

Policies:

- (A) *Locate new structures inland from the shoreline setback to conserve open space, minimize interference with natural shoreline processes, and minimize loss of improvements due to erosion.*
- (C) *Minimize the construction of public erosion-protection structures seaward of the shoreline.*

Discussion: The Anahola Residence Lots, Unit 6 project will not interfere with natural shoreline processes. Coastal access to the shoreline is very important to the residents of

ANAHOLA RESIDENCE LOTS, UNIT 6
FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

Anahola. The DHHL *Kaua'i Island Plan* (2004) established a "Special District," which acts as coastal buffer between residential areas, including the Anahola Residence Lot, Unit 6, and the shoreline.

Marine Resources

Objective: *Promote the protection, use, and development of marine and coastal resources to assure their sustainability.*

Policies:

- (A) *Ensure that the use and development of marine and coastal resources are ecologically and environmentally sound and economically beneficial.*
- (B) *Coordinate the management of marine and coastal resources and activities to improve effectiveness and efficiency.*

Discussion: The proposed Anahola Residence Lots, Unit 6 is not expected to have an impact on marine and coastal resources. Coastal resources are very important to the residents of Anahola. To ensure the continued health of the coastal region at Anahola, the DHHL *Kaua'i Island Plan* (2004) established a "Special District," which acts as coastal buffer between residential areas, including the Anahola Residence Lot, Unit 6, and the shoreline.

3.2 COUNTY OF KAUA'I

County-specific land use plans and ordinances pertaining to the proposed Anahola Residence Lots, Unit 6 include the *Kaua'i General Plan (2000)* and the Kaua'i County Comprehensive Zoning Ordinance.

3.2.1 General Plan

As required by the County of Kaua'i Charter, the *General Plan* sets forth the desired sequence, patterns, and characteristics of future development. This is accomplished through long-range objectives focusing on the social, economic, and environmental effects of development coupled with specific policies designed to implement the objectives.

The proposed residential project is in compliance with the General Plan because it is in an area designated as Residential Community on the General Plan Land Use Map (Figure 5). Further, the General Plan directs County policy to "support agricultural, residential, and limited commercial development of the Hawaiian Home Lands at Anahola, with the recommendation that projects be sited to avoid the appearance of strip development along the highway frontage and be enhanced with landscaping." The proposed project site is located away from the Kūhio Highway and will be designed to reflect the rural character of the existing residential neighborhoods at Anahola.

ANAHOLA RESIDENCE LOTS, UNIT 6
FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

3.2.2 County of Kaua'i Zoning

The Kaua'i County zoning for the Anahola Residence Lots, Unit 6 site is Agricultural, Open, and R-4 Residential (Figure 6). Hawaiian home lands are not subject to zoning ordinance designations pursuant to the legal Memorandum by the State Attorney General dated May 6, 1994.

3.3 REQUIRED APPROVALS AND PERMITS

During the implementation stages of the project, the applicant will work with the State and County review agencies for examination and approval of project plans and specifications. Required approvals and permits are listed in the following table.

Required Permits and Approvals

Permit/Approval	Responsible Agency
Chapter 343, HRS compliance	State of Hawai'i Department of Health – Office of Environmental Quality Control
National Pollutant Discharge Elimination System (NPDES) Permit	State of Hawai'i Department of Health
Building/Grading Permits Construction Plan Approval	County of Kaua'i Department of Public Works
Water Availability Construction Plan (Water) Approval	County of Kaua'i Department of Water
Variance to Allow Individual Waste Disposal System	State of Hawai'i Department of Health
Construction Plan (Electric) Approval	Kaua'i Island Utility Company, Verizon Cable

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4.0 ASSESSMENT OF THE EXISTING ENVIRONMENT, POTENTIAL IMPACTS, AND MITIGATION MEASURES

This chapter describes the existing natural environment associated with the property and potential impacts that may result from development of the Anahola Residence Lots, Unit 6 project. Mitigation measures to address potential impacts are also described, as applicable.

4.1 HUD ENVIRONMENTAL REQUIREMENTS (24 CFR 58)

Because the DHHL will be receiving funds from the United States Department of Housing and Urban Development (HUD), this environmental assessment is prepared in compliance with 24 CFR 58. The following information is provided in fulfillment of the requirement.

4.1.1 Historic Preservation

In September 2005, Cultural Surveys Hawai'i, Inc. (CSH) completed an archaeological letter report for the Anahola Residence Lots, Unit 6 project (Appendix A). This included brief reviews of historic documentation and previous archaeological investigation of Anahola Ahupua'a, and a field inspection of the project site. According to the CSH letter report, no surface historic properties related to traditional Hawaiian culture were located during the inspection. Further, CSH concludes that there is little or no potential for subsurface properties as the entire area was in long-term use for sugarcane cultivation and was plowed repeatedly. No plantation-era structures, such as ditches, wells, or flumes, were noted.

In interviews conducted for this EA, area residents referred to a heiau on or near the project site. This heiau appears to be 'Aikanaka heiau, identified by Wendell Bennett early in the 20th century, located on the south point of Anahola Bay, i.e. Kahala Point. This heiau site is nearly 2,000 feet north of the project site.

Potential Impacts and Mitigation Measures

Because the site was under sugar cultivation for many years and there are no identified historic or archaeologically significant sites in the project area, no impacts on historic properties are anticipated. The State Historic Preservation Division (SHPD) stated the following in its comment letter on the Draft EA (Chapter 7.0).

We believe there are no historic properties present, because:

- *Residential development/urbanization has altered the land*
- *Previous grubbing/grading has altered the land*
- *An acceptable archaeological assessment or inventory survey found no historic properties.*

Thus, we believe that "no historic properties will be affected" by this undertaking.

Should any unanticipated sites, artifacts or remains, such as shell, bone, or charcoal deposits be discovered during construction, the work will be halted and mitigating measures will be discussed with the SHPD prior to commencing construction activity.

4.1.2 Floodplain Management

According to the Federal Insurance Rate Map (FIRM) (Figure 8) the Anahola Residence Lots, Unit 6 site is located within Zone X, which indicates areas outside of the 500-year floodplain.

Potential Impacts and Mitigation Measures

Because the Anahola Residence Lots, Unit 6 site is located within Zone X (areas determined to be outside the 500-year floodplain), the proposed project is not expected to: 1) be highly susceptible to flooding; 2) change the 500-year floodplain; or 3) affect the floodway.

Although the project will increase impervious surface area, drainage improvements to control runoff will be implemented.

4.1.3 Wetlands Protection

The Anahola Residence Lots, Unit 6 site is not located within or adjacent to any wetlands (Figure 9).

Potential Impacts and Mitigation Measures

Because the Anahola Residence Lots, Unit 6 site is not located within or adjacent to any wetlands, the proposed project will have no impact on wetlands and no mitigation measures are proposed.

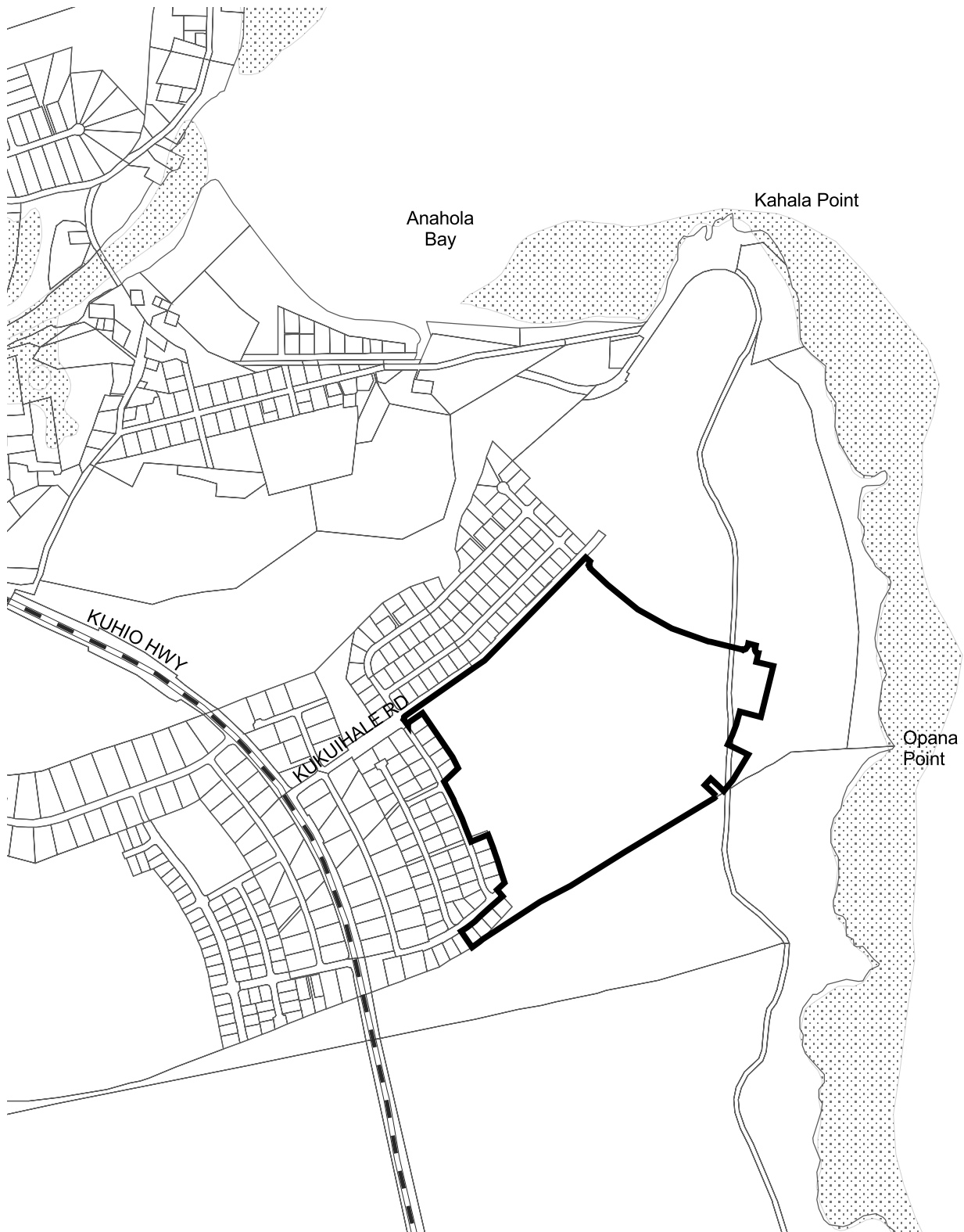
4.1.4 Coastal Zone

The site of the Anahola Residence Lots, Unit 6 is not located within the coastal zone as defined by the Special Management Area (Figure 7).

The proposed project is consistent with the Hawai'i Coastal Zone Management (CZM) program and meets the criteria of general consistency certification approved by the State of Hawai'i Department of Business, Economic Development and Tourism (DBEDT).

Potential Impacts and Mitigation Measures

The Anahola Residence Lots, Unit 6 is not located within the coastal zone. Additionally, the proposed Anahola Residence Lots, Unit 6 project is consistent with the CZM program and meets the criteria of the general consistency certification approved by the DBEDT.



LEGEND

-  Wetlands
-  Project Site Boundary

Source: U.S. Fish and Wildlife Service, Pacific Office

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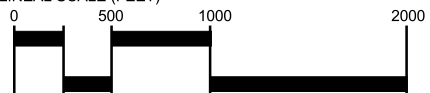
Figure 9
Wetlands
Anahola Residence Lots, Unit 6

DEPARTMENT OF HAWAIIAN HOME LANDS

ISLAND OF KAUAI

NORTH

LINEAL SCALE (FEET)



Therefore, no impacts to coastal zones are anticipated and no mitigation measures are proposed.

4.1.5 Sole Source Aquifers

According to the U.S. Environmental Protection Agency's (EPA) *National Summary of Sole Source Aquifer Designations*, the Anahola Residence Lots, Unit 6 project is not located within an EPA-designated sole source aquifer area.

Potential Impacts and Mitigation

Because the Anahola Residence Lots, Unit 6 site is not located within an EPA-designated sole source aquifer area, it does not have the potential to impact a designated aquifer and no mitigation measures are proposed.

4.1.6 Endangered Species

The Department of Interior list of Endangered Species and Critical Habitats has been reviewed and the Anahola Residence Lots, Unit 6 project will not affect any listed or proposed endangered or threatened species or critical habitats. The site is not a critical habitat (Figure 10). The U.S. Fish and Wildlife Service has been consulted and has confirmed that no endangered, threatened, or candidate species occur in the project area, which does not include any critical habitat (Appendix B).

The site was historically used for sugar cultivation. As a result, no threatened or endangered plant or animal species are known to exist on the proposed Anahola Residence Lots, Unit 6 site.

In addition, no wetlands, streams, estuaries, or other habitats that could accommodate threatened or endangered plant or animal species are present on the proposed site. The project site is covered with introduced species, such as sugar cane, guava, Christmas Berry, California Grass, and Bermuda Grass. The usual complement of introduced birds common to this area of Kaua'i are found on the adjacent properties and the project site, including the Japanese white-eye, northern cardinal, spotted doves, common myna, zebra doves, house sparrow, house finch, and chestnut mannikin.

Potential Impacts and Mitigation Measures

Vegetation on the Anahola Residence Lots, Unit 6 site and surrounding properties consists of exotic species, and there are no threatened or endangered plant or animal species present on the site. Therefore, the proposed development is not expected to create conditions that might threaten the survival of threatened or endangered plants or animals. No mitigation measures are proposed.

4.1.7 Wild and Scenic Rivers

Hawai'i has no rivers designated for inclusion in the National Wild and Scenic Rivers System (NWSRS).

Potential Impacts and Mitigation Measures

Because there are no wild and scenic rivers in Hawai'i, none will be impacted by the project and no mitigation measures are proposed.

4.1.8 Air Quality

In general, air quality in Hawai'i is excellent due to the predominant northeast trade winds. According to the EPA, there are no "non-attainment" sites in the State of Hawai'i. A non-attainment area is defined as a locality where air pollution levels persistently exceed National Ambient Air Quality Standards.

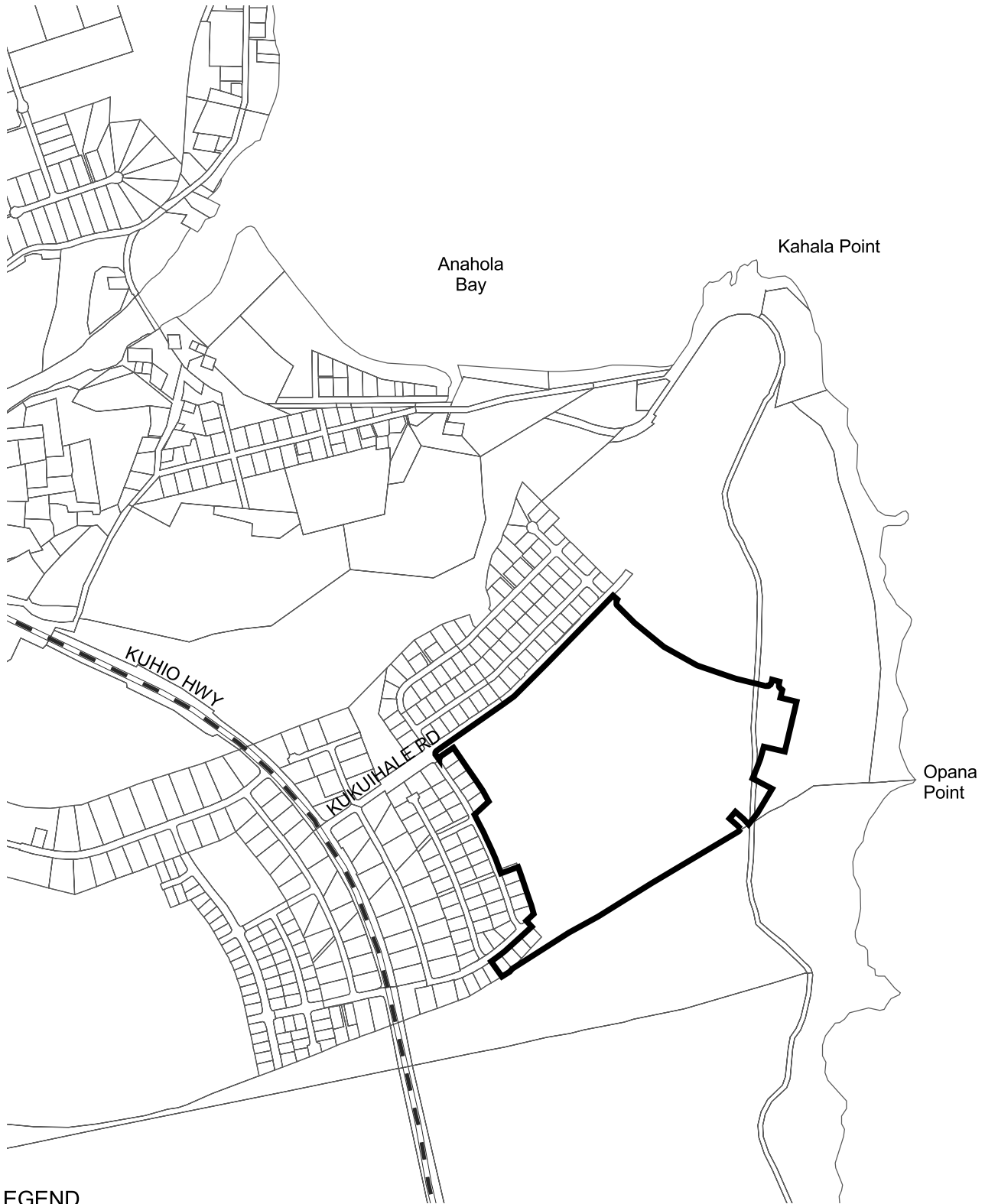
Because there are no "non-attainment" sites in Hawai'i, the entire state is considered by the EPA to be in attainment for all criteria pollutants. Therefore, the Anahola Residence Lots, Unit 6 site is located within an "attainment area." To ensure that existing air quality continues, both Federal and State standards have been established to identify ambient air quality conditions and potential changes as they may occur in the future.

Potential Impacts and Mitigation Measures

Long-term air quality impacts due to the proposed Anahola Residence Lots, Unit 6 project are not expected. Once the residences are built and occupied, the number of vehicles waiting to enter Kūhio Highway will likely increase, especially during the morning hours. However, the persistent tradewinds and the short periods that the vehicles stop before entering Kūhio Highway will rapidly dissipate any potential impacts from noxious gasses.






Short-term air quality impacts due to the proposed project may result from construction activities. During construction, air quality in the area may be impacted by exhaust generated from construction equipment and fugitive dust. All construction activities will implement best management practices to reduce any negative air quality impacts and comply with the provisions of Hawaii Administrative Rules, Chapter 11-60.1, "Air Pollution Control," Section 11-60.1-33, Fugitive Dust.

A combination of measures to mitigate potential air quality impacts (i.e., watering exposed soils, grassing, minimizing the amount of disturbed area, and rapidly establishing plant materials) will be implemented as appropriate. Should dirt be tracked onto the highway, washdown will be undertaken to prevent fugitive dust formation. Exhaust emissions from construction equipment and increased vehicular traffic will not violate State or Federal air quality standards based on the moderate level of existing traffic volumes in the project region.



LEGEND

Critical Habitats by Species

-  Newcomb's Snail
-  Cave Spider/Arthropod
-  Plants
-  Not in Critical Habitats
-  Project Site Boundary

Source:
U.S. Fish and Wildlife Service, Pacific Island Office (2004)

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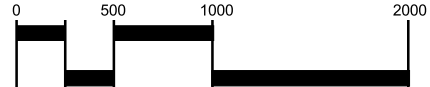
Figure 10
Critical Habitats
Anahola Residence Lots, Unit 6

DEPARTMENT OF HAWAIIAN HOME LANDS

ISLAND OF KAUAI

NORTH

LINEAL SCALE (FEET)



4.1.9 Farmland Protection

Historically, the site for the proposed Anahola Residence Lots, Unit 6 was used for sugarcane cultivation by Lihue Plantation Co., Ltd. However, agricultural activities ceased following Lihue Plantation Co., Ltd.'s closing in 2002. According to the Agricultural Lands of Importance to the State of Hawai'i (ALISH) system, the Anahola Residence Lots, Unit 6 site is primarily classified as "Prime" (Figure 11). In addition, the State Land Study Bureau's Detailed Land Classification system has classified the majority of the Anahola Residence Lots, Unit 6 site as "B (Good)" (Figure 12). A portion of the site along the southern boundary of the site is classified as "C (Fair)." There are also very small areas classified as "D (Poor)" and "E (Very Poor)." The northwestern and southwestern corners of the site, adjacent to the existing residential lots, are not classified.

Potential Impacts and Mitigation Measures

Although the proposed site for the Anahola Residence Lots, Unit 6 includes agricultural land designated as "Prime" and "B (Good)", it is located in an area committed to urban uses. Additional farmland is available in the Anahola/Kamalomalo'o tract and elsewhere on Kaua'i. The limiting factor to the growth of diversified agriculture is not the land supply, but rather the size of the market for those crops than can be grown profitably in Hawai'i. Based on the ample supply of land suitable for farmland on Kaua'i and the relative lack of market demand (compared to the supply available), no mitigation measures are proposed for the loss of farmland associated with the proposed site.

4.1.10 Noise Abatement and Control

The Anahola Residence Lots, Unit 6 site is located approximately 11 miles from the Līhu'e Airport and approximately 10.4 miles from the Princeville Airport (Figure 13). Current sources of noise in the vicinity of the project include vehicle traffic, occasional overhead aircraft, natural sounds associated with weather (e.g. wind and rain), and birds.

Potential Impacts and Mitigation Measures

The Anahola Residence Lots, Unit 6 site is located approximately 1,000 feet off Kūhio Highway. However, it is separated from the highway by residential structures within the existing Anahola community. These structures serve as a barrier that will attenuate noise generated by vehicular traffic on Kūhio Highway. There are no railroads on Kaua'i.

Although the project is located within 15 miles of civilian airports (Līhu'e Airport and Princeville Airport), according to 24 CFR 51, subpart B, Sec. 51.101(a)(8), "sites with a day-night average sound level of 65 and below are acceptable and allowable." According to the adopted DNL contours from the Līhu'e and Princeville Airports, the project site is located below the 65 DNL contour line.

ANAHOLA RESIDENCE LOTS, UNIT 6
FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

Long-term noise impacts due to the proposed Anahola Residence Lots, Unit 6 are not expected to be significant. Since a substantial increase in noise sources is not anticipated and noise levels are not expected to increase significantly over existing levels.

Short-term noise impacts will be generated during construction. Proper mitigating measures (such as limiting construction to daylight hours) will be employed to minimize the noise impacts. There are no sensitive land uses, such as hospitals or schools, in the vicinity of the project site that would be affected during the construction period. All project activities will comply with the State Department of Health's Administrative Rules, Chapter 11-46, "Community Noise Control" and will be monitored to ensure compliance.

Because long-term noise levels are not expected to be significant, no noise mitigation measures are planned as part of the project.

4.1.11 Explosive or Flammable Operations

A search of available environmental records was conducted by Environmental Data Resources, Inc. (EDR) to determine the distance of the Anahola Residence Lots, Unit 6 project site from any potentially harmful facilities or operations (see Appendix C). The EDR report found no industrial facilities handling explosive or fire-prone materials such as liquid propane, gasoline, or other storage tanks adjacent to or visible from the Anahola Residence Lots, Unit 6 site.

The proposed Anahola Residence Lots, Unit 6 project will expose neither people nor buildings to explosive or flammable fuels or chemical containers.

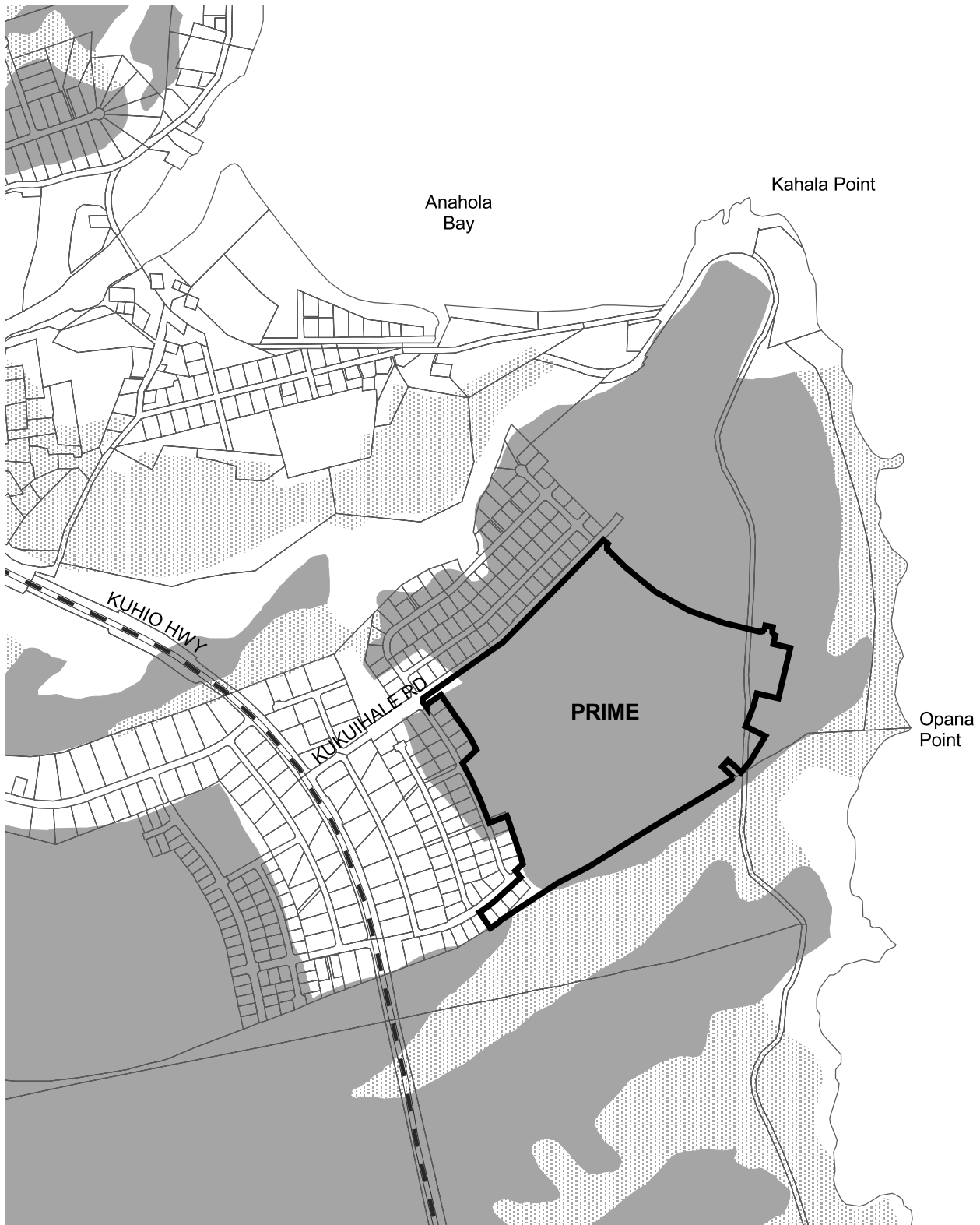
Potential Impacts and Mitigation Measures

Because industrial facilities handling explosive or fire-prone materials such as liquid propane, gasoline, or other storage tanks are not adjacent to or visible from the Anahola Residence Lots, Unit 6 site, no potential impacts from hazardous industrial operations are anticipated and no mitigation measures are proposed.

The Anahola Residence Lots, Unit 6 project will not expose people or buildings to explosive or flammable fuels or chemical containers. As such, no impacts are expected and no mitigation measures are proposed.

4.1.12 Toxic Chemicals and Radioactive Materials

The EDR discussed in Section 4.1.11 included a search for toxic chemicals and radioactive materials (see Appendix C). According to this report, the Anahola Residence Lots, Unit 6 site is free of hazardous materials, contamination, toxic chemicals, gasses, and radioactive substances. There are no nearby dumps, landfills, industrial sites, or other operations with hazardous wastes. Further, the site is not within one mile of a National Priority List "Superfund" site; or 2,000 feet of a State hazardous materials site; or other known toxic site.



LEGEND

ALISH Types

- Prime ALISH Lands
- Other ALISH Lands
- Not in ALISH Lands

- Project Site Boundary

Source: State Department of Agriculture (1977)

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Figure 11

Agricultural Lands of Importance to
the State of Hawaii

Anahola Residence Lots, Unit 6

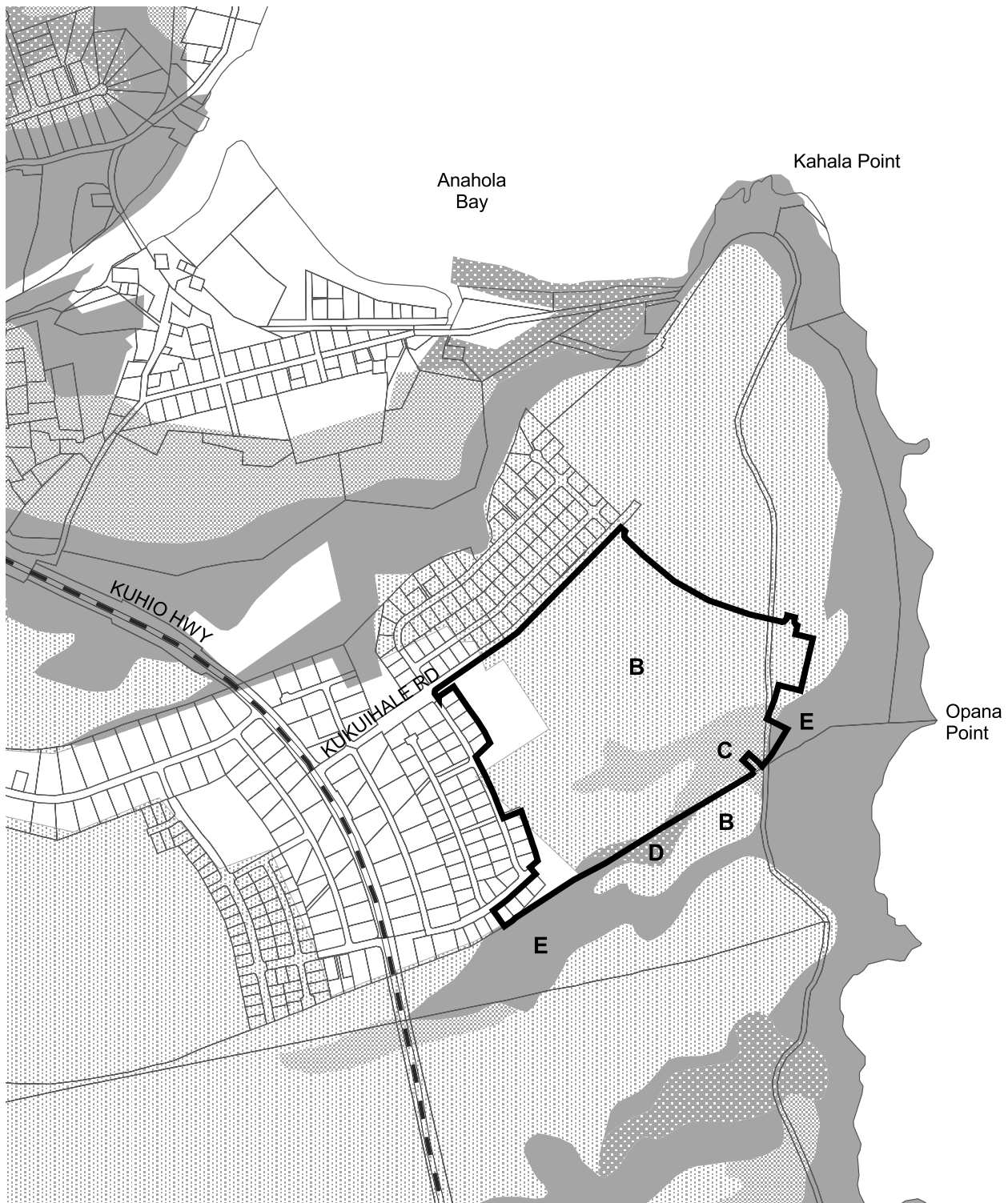
DEPARTMENT OF HAWAIIAN HOME LANDS

NORTH

LINEAL SCALE (FEET)

ISLAND OF KAUAI





LEGEND

Agricultural Land Productivity Ratings

- A (Excellent)
- B (Good)
- C (Fair)
- D (Poor)
- E (Very Poor)
- Not Classified

Project Site Boundary

Source: Land Study Bureau (1967)
State of Hawaii GIS (1998)

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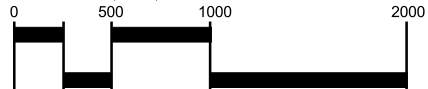
Figure 12
Detailed Land Classification
Anahola Residence Lots, Unit 6

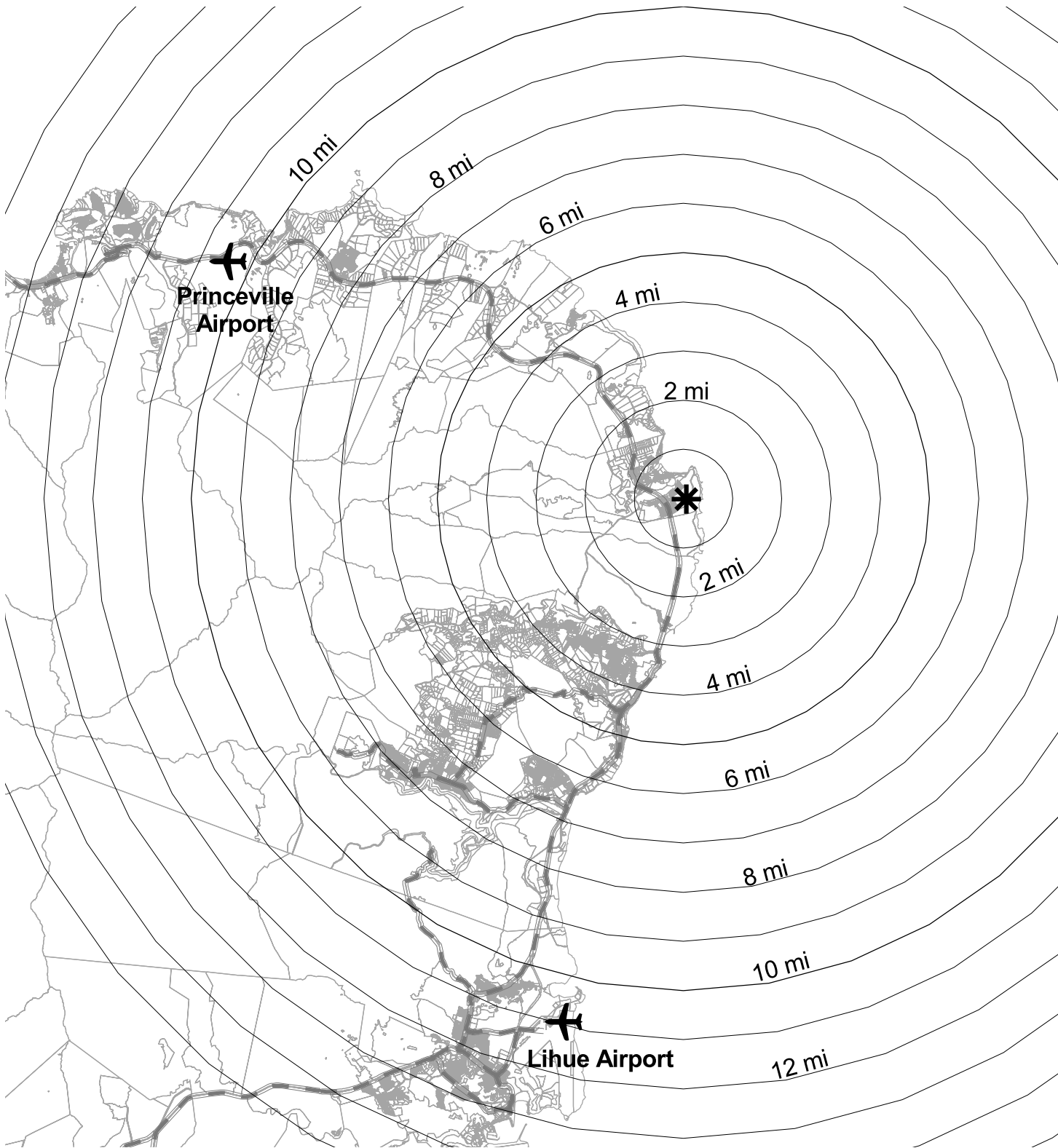
DEPARTMENT OF HAWAIIAN HOME LANDS

ISLAND OF KAUAI



NORTH

LINEAL SCALE (FEET)





LEGEND

-  Approximate Location of Project Site
-  Airport

Source: State of Hawaii GIS System

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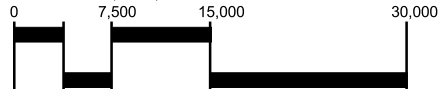
Figure 13
Distance from Airport
Anahola Residence Lots, Unit 6

DEPARTMENT OF HAWAIIAN HOME LANDS

ISLAND OF KAUAI

NORTH

LINEAL SCALE (FEET)



Potential Impacts and Mitigation Measures

Because the proposed Anahola Residence Lots, Unit 6 site is not contaminated with hazardous substances or radioactive materials and is not near a dump, landfill, or industrial site, no impacts from toxic chemicals and radioactive materials are expected and no mitigation measures are proposed.

4.1.13 Airport and Runway Clear Zones and Accident Potential Zones

The Anahola Residence Lots, Unit 6 site is located approximately 11 miles from the Līhu'e Airport and 10.4 miles from Princeville Airport. The site is not within a designated Airport Clear Zone, Accident Potential Zone, or Runway Clear Zone.

Potential Impacts and Mitigation Measures

Because the Anahola Residence Lots, Unit 6 site is located approximately 11 miles from the Līhu'e Airport and 10.4 miles from Princeville Airport, there will be no impacts to airport clear zones and no mitigation measures are proposed.

4.1.14 Environmental Justice

The Anahola Residence Lots, Unit 6 site is located within a predominantly minority and low-income area. However, the site and the surrounding neighborhood do not suffer from disproportionate adverse environmental effects relative to the community at large.

Potential Impacts and Mitigation Measures

The Anahola Residence Lots, Unit 6 project will help the DHHL to fulfill its mandate to develop and deliver homesteads to native Hawaiians by creating a livable neighborhood. The proposed 181-unit single-family subdivision will positively affect the economic and social welfare of the native Hawaiian community by providing housing opportunities in a highly desirable location.

The project vicinity has been a residential neighborhood since the 1970s. Extending this use to the proposed site is a suitable use. There are no adverse health and environmental conditions that affect the project because of its location and there will be no activity that disproportionately affects minority and low-income populations in comparison to the rest of the population based on the siting or purpose of the Anahola Residence Lots, Unit 6. As such, the notion of environmental justice has been evaluated.

4.2 STATE OF HAWAI'I ENVIRONMENTAL IMPACT STATEMENT LAW

The following environmental considerations are provided in addition to 24 CFR 58 in fulfillment of the State of Hawai'i Environmental Impact Statement Law (Chapter 343, HRS).

4.2.1 Climate

The climate of the region is generally warm and humid with average annual temperatures ranging from 60 to 87 degrees Fahrenheit, with the winter months receiving the majority of the rainfall. Prevailing winds are trades from the northeast and southwest winds associated with “Kona” storms occurring predominately in the winter months. In the absence of the trades or storm conditions, winds occasionally become light and variable and, at times, the diurnal heating and cooling of the island gives rise to onshore sea breezes during the day and offshore land breezes at night. Strong winds do occur at times in connection with storm systems moving through the area.

Potential Impacts and Mitigation Measures

No significant impacts to the regional climate are anticipated. With project build-out, there may be some localized temperature increases resulting from paved surfaces and roofs. However, it is assumed that each lot will eventually be landscaped (by lessees) with shade trees, which will help mitigate localized temperature increases from roadways and buildings.

4.2.2 Topography and Geology

The island of Kauaʻi is the oldest of the major islands in the Hawaiian chain. The Kauaʻi volcanic shield built itself off the ocean floor approximately two to four million years ago. Rock formations belonging to this original shield are part of the Waimea Canyon Volcanic Series, a major portion of which are the thin lava flows of the Nāpili formation, which later covered the shield mass.

The Geological and Topographical Map of the island of Kauaʻi, which is a supplement to Bulletin 13 “Geology and Groundwater Resources of the Island of Kauaʻi,” by G.A. MacDonald, D.A. Davis, and D.C. Cox, shows that the project site is underlain with basalt from lava flows of the Koloa Volcanic series. Lavas of the Koloa Volcanic series are for the most part poorly to moderately permeable. Basal water occurs in the rocks where they extend below sea level.

The topography of the 71.3-acre site is gently sloping with elevations ranging from 44 feet to 148 feet above mean sea level (MSL), with an average slope of 4 percent. The site is currently vacant.

Potential Impacts and Mitigation Measures

The site has been modified through previous agricultural uses. The planned development on the site will not require any major alterations. Grading activities will entail some minor cut and fill; and, therefore, no significant impacts to the site topography are anticipated.

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FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

All grading operations will be conducted in full compliance with dust and erosion control and other requirements of Section 22-7.18 of the Kaua'i County Code and the provisions of Chapter 11-60.1, Hawaii Administrative Rules, Section 11-60.1-33 on fugitive dust. Best management practices (BMPs) to mitigate pollutants will be included in the construction plans. To protect against wind erosion during construction periods, graded areas will be sprayed with water and grassed. With adherence to County regulations and standards and implementation of standard control measures, further mitigation measures are not warranted.

4.2.3 Drainage

The Anahola region can be characterized as having both flat and gently rolling regions with some rugged cliffs rising above the coastal plain. It is located on the wet side of island and receives approximately 50 inches of rain per year in lowland areas. Coastal waters, Anahola Stream (perennial), and Kamalomalo'o Stream (intermittent) are located in the vicinity of the project site. None of these appear on the *List of Impaired Waters in Hawaii Prepared under Clean Water Act §303(d)* or are designated as water areas to be protected in DOH's Administrative Rules, Chapter 11-54.

Flood flows generated by mauka residential areas are either directed away from the project (northerly side) or collected in an existing ditch system (southerly side). The entire 71.3-acre site and surrounding area is designated Zone X (areas determined to be outside the 500 year flood plain) by the Flood Insurance Rate Map (Figure 8). The project will include improvements to the existing ditch system on the southerly side.

Potential Impacts and Mitigation Measures

The natural terrain of the project site will require minimal grading. The finished grade will therefore be close to the existing level grade on the site.

A drainage master plan will be prepared for the proposed project during the design of the development to control flooding and provide adequate storm water disposal for on-site and off-site generated runoff. Although the project will create impervious surfaces (i.e., roads and roofs) that increase runoff, proposed drainage improvements will mitigate any potential flood hazard.

Construction work on the site will temporarily expose bare soil and will slightly increase the erosion potential until the building foundations are in place. Best management practices will be implemented to prevent any project-related increases in pollutant loads. Such practices include the early construction of drainage control features, construction of temporary and permanent sediment basins, use of temporary berms and cut-off ditches, and use of temporary silt fences and sediment control devices. After construction, the presence of impermeable surfaces (walkways and driveways) and landscaping (by residents) will reduce the overall rate of erosion.

4.2.4 Soils

There have been three soil suitability studies prepared for Hawai'i whose principal focus have been to describe the physical attributes of land and the relative productivity of different land types for agricultural production. These are: 1) the Land Study Bureau's Detailed Land Classification; 2) the U.S. Department of Agriculture Soil Survey; and 3) the Agricultural Lands of Importance to the State of Hawai'i (ALISH).

Detailed Land Classification. For agricultural purposes, the *Detailed Land Classification, Island of Hawai'i* (University of Hawai'i, Land Study Bureau, 1972) has developed a five-class productivity rating system using the letters A, B, C, D, and E with soils rated as follows: A ("very good"); B ("good"); C ("fair"); D ("poor"); and E ("very poor"). The majority of the Anahola Residence Lots, Unit 6 site is classified as "B (Good)" (Figure 12). A portion of the site along the southern boundary of the site is classified as "C (Fair)." There are also very small areas classified as "D (Poor)" and "E (Very Poor)." The northwestern and southwestern corners of the site, adjacent to the existing residential lots, are not classified.

Soil Survey. According to the *United States Department of Agriculture Soil Conservation Service, Soil Survey of the Islands of Kaua'i, O'ahu, Maui, Moloka'i, and Lāna'i, State of Hawai'i, 1972*, the Anahola Residence Lots, Unit 6 site contains three soil types (Figure 14). These soil types are described below.

Lihue Silty Clay, 0 to 8 percent slopes (LhB) – This soil is used for sugarcane, pineapple, pasture, truck crops, orchards, wildlife habitat, and homesites. Permeability is moderately rapid. Runoff is slow, and the erosion hazard is no more than slight.

Lihue Silty Clay, 8 to 15 percent slopes (LhC) – On this soil, runoff is slow and the erosion hazard is slight. It is used for the same activities as Lihue Silty Clay, 0 to 8 percent slopes.

Lihue Silty Clay, 25 to 40 percent slopes, eroded (LhE2) – This soil is similar to LhB, except that the surface layer is thin. Runoff is rapid and the erosion hazard is severe.

Agricultural Lands of Importance to the State of Hawai'i. The State Department of Agriculture *Agricultural Lands of Importance to the State of Hawai'i (ALISH)* system of defining agricultural suitability has classified the property as "Prime" (Figure 11).

Potential Impacts and Mitigation Measures

With the Anahola Residence Lots, Unit 6 development, the soils on the property will be permanently lost to soil-based agriculture. There is potential for soil loss through the generation of dust and water-borne soil erosion as areas are graded during the construction phases although the erosion hazard of the soils is rated "no more than slight".

Grassing and drainage improvements will further mitigate soil loss during construction and after project build-out. All grading operations will be conducted in compliance with dust and erosion control and other requirements of Section 22-7.18 of the Kaua'i County Code and the provisions of Chapter 11-60.1, Hawaii Administrative Rules, Section 11-60.1-33 on

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fugitive dust. Roadway and lot grading will be accomplished in increments of no more than 10 acres at a time. A watering program will be implemented during construction to minimize soil loss through fugitive dust emission. Other erosion control measures include cleaning job-site construction equipment and establishing groundcover as quickly as possible after grading. Permanent landscaping by lessees will also help to retain soil throughout the project area and significantly reduce erosion compared to the previous agricultural practices. In addition to grassing and watering programs, other mitigation measures generally associated with best management practices include:

- Early construction of drainage control features;
- Construction of temporary and permanent sediment basins to trap silt;
- Use of temporary berms and cut-off ditches where needed; and
- Use of temporary silt fences and sediment control devices.

4.2.5 Agricultural Impact

Portions of the 71.3-acre Anahola Residence Lots, Unit 6 site are within the State Agricultural District (Figure 4). However, the land is no longer used for agricultural activities and is now vacant.

Potential Impacts and Mitigation Measures

As previously discussed, with development of the Anahola Residence Lots, Unit 6, the soils on the property will be permanently lost to soil-based agriculture. However, additional agricultural land is available in the Anahola/Kamalomalo'o tract and elsewhere on Kaua'i. The limiting factor to the growth of diversified agriculture is not the land supply, but rather the size of the market for those crops than can be grown profitably in Hawai'i. Based on the ample supply of land suitable for diversified agriculture on Kaua'i and the relative lack of market demand (compared to the supply available), no mitigation measures are proposed for the loss of agricultural land associated with the proposed site.

4.2.6 Groundwater Resources/Hydrology

The principal sources of groundwater on the island of Kaua'i are from rocks of the Waimea Canyon volcanic series. These rocks are typically highly permeable and yield water readily to wells. The Koloa Volcanic series, in contrast, tend to be poorly to moderately permeable and offer limited yield. In the Anahola area, which is within the Koloa Volcanic series, water is obtained primarily from wells and tap basal aquifers.

The project site is located in the critical wastewater disposal area determined by the County Wastewater Advisory Committee. No new cesspools are allowed in this area.

Potential Impacts and Mitigation Measures

All storm water entering the proposed project site must ultimately flow through the property and evaporate, discharge into the ocean, or infiltrate into the ground. Detention basins will

be developed to maintain the existing design storm peak flows exiting the project site. Impacts to groundwater quality will be mitigated by the 4,000-foot distance between the existing water wells and the proposed project site, in compliance with the Kaua'i County Department of Water's enforced 1,000-foot encroachment limit.

The DHHL has submitted an application for a variance (Docket No. 05-VWW-34) to allow the use of individual waste disposal systems. The DOH Wastewater Branch stated that it concurs with the variance request, provided that non-cesspool individual wastewater systems are utilized (Chapter 7.0). Individual wastewater systems will be designed by a licensed engineer and constructed by a licensed contractor. Should the DOH allow individual waste disposal systems for the proposed Anahola Residence Lots, Unit 6 project, measures will be implemented to mitigate potential impacts to groundwater resources and hydrology. Mitigation measures are discussed further in Section 4.2.20 of this report.

4.2.7 Natural Hazards

The island of Kaua'i has a Zone 1 Seismic Probability Rating (Hawai'i Island is in Zone 3) and volcanic eruption is unlikely.

The State of Hawai'i and especially Kaua'i has been affected by devastating hurricanes, 'Iwa in 1982 and 'Iniki in 1992. While it is difficult to predict these natural occurrences, it is reasonable to assume that future events could be likely given the recent record. The project area, as the rest of the island or state, is no more or less vulnerable to the destructive winds and torrential rains associated with hurricanes.

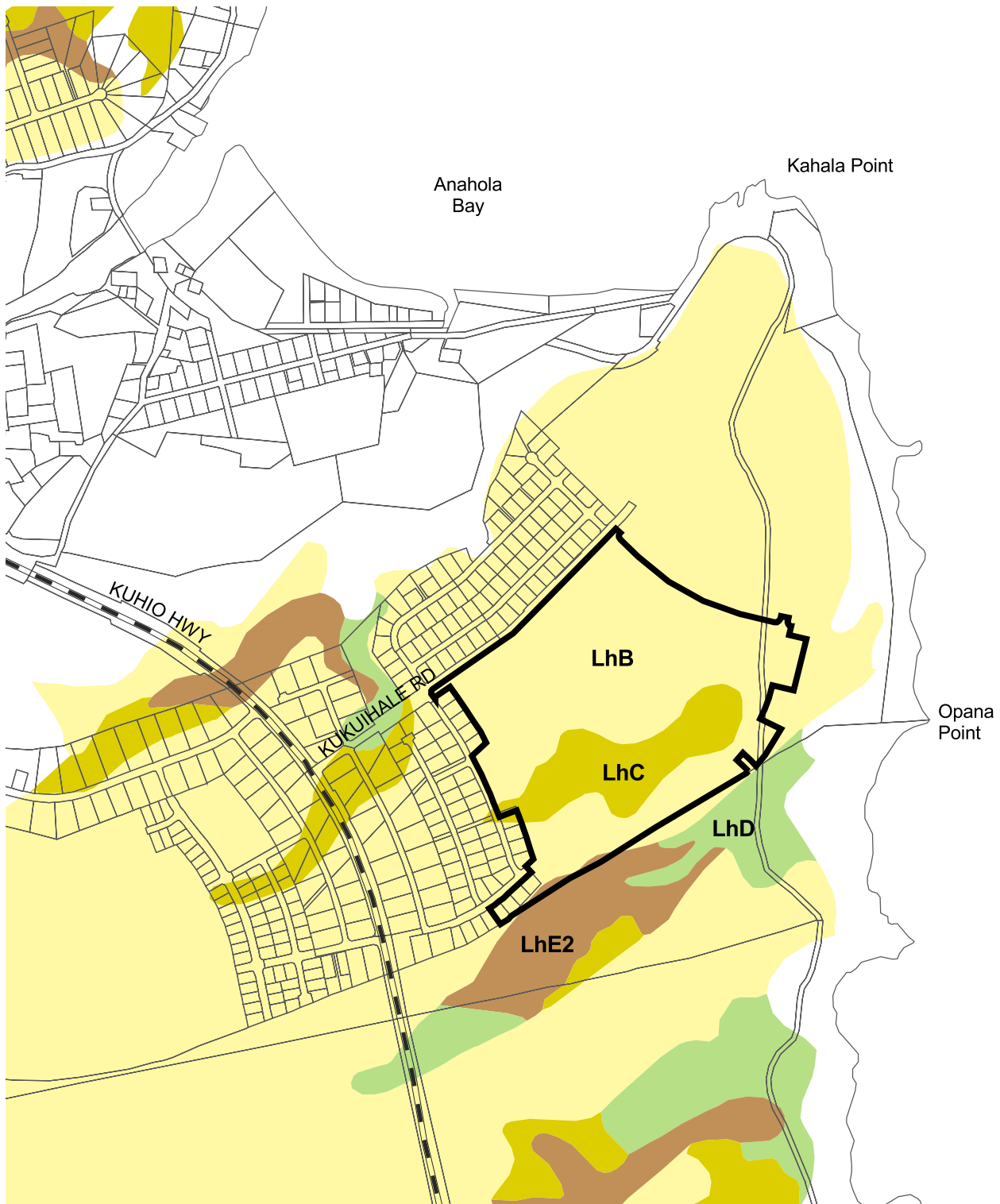
A small portion of the site appears to be located within the tsunami evacuation zone; however, it is difficult to determine the accuracy of the zone as boundaries were estimated by topographical characteristics, or approximated using surrounding features such as roads. The Flood Insurance Rate Map indicates that Anahola is located in Zone X, which designates areas determined to be outside the 500-year flood plain (Figure 8).

Potential Impacts and Mitigation Measures

The project will not exacerbate any hazardous conditions. The Hawaiian Islands are associated with volcanic formation and tectonic plate movement. All structures will be constructed for protection from earthquakes and destructive winds and torrential rainfall of tropical hurricanes in accordance with Kaua'i County Building Codes. The project is not anticipated to be affected by tsunami, as it is located away from the shoreline and primarily out of the tsunami evacuation zone.

4.2.8 Flora and Fauna

The site was historically used for sugar cultivation. As a result, no threatened or endangered plant or animal species are known to exist on the proposed Anahola Residence Lots, Unit 6 site. In addition, no wetlands, streams, estuaries, or other habitats that could accommodate



LEGEND

Soil Types

- LhB: LIHUE Silty Clay, 0-8% Slopes
- LhC: LIHUE Silty Clay, 8-15% Slopes
- LhD: LIHUE Silty Clay, 15-25% Slopes
- LhE2: LIHUE Silty Clay, 25-40% Slopes, Eroded
- Other Types

Project Site Boundary

Source: Natural Resources Conservation Service (1995)

Disclaimer:
This graphic has been prepared for
general planning purposes only.

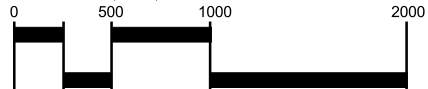
Figure 14
Soil Survey
Anahola Residence Lots, Unit 6

DEPARTMENT OF HAWAIIAN HOME LANDS

ISLAND OF KAUAI

NORTH

LINEAL SCALE (FEET)



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threatened or endangered plant or animal species are present on the proposed site. The site is not a critical habitat (Figure 10). The U.S. Fish and Wildlife Service has been contacted and confirmed that no endangered, threatened, or candidate species occur in the project area, which does not include any critical habitat (Appendix B).

The project site is covered with introduced species, such as sugar cane, guava, Christmas Berry, California Grass, and Bermuda Grass. The usual complement of introduced birds common to this area of Kaua'i are found on the adjacent properties and the project site, including the Japanese white-eye, northern cardinal, spotted doves, common myna, zebra doves, house sparrow, house finch, and chestnut mannikin.

Potential Impacts and Mitigation Measures

Because vegetation on the Anahola Residence Lots, Unit 6 site and surrounding properties consists of exotic species, it is anticipated that the proposed development of the site should not create conditions that might threaten the survival of native plant communities and no mitigation measures are proposed.

Birds found in the vicinity of the project site are introduced species commonly found on Kaua'i. Because there are no identified native species associated with the site and the site is not within a designated critical habitat, no impacts to native fauna are anticipated and no mitigation measures are proposed.

4.2.9 Archaeological and Historic Resources

The proposed action is situated on a Hawaiian Home Lands parcel, which is adjacent to a larger residential subdivision constructed in the mid-1970s. The site was utilized for sugarcane cultivation in the past and is essentially disturbed land. Items of historical value that may have existed previously on the site most likely have been destroyed by heavy equipment during years of cultivation.

As discussed in Section 4.1.1, Cultural Surveys Hawai'i, Inc. (CSH) conducted a field inspection of the proposed site and reviewed relevant historic documents and previous archaeological investigations in September 2005 (Appendix A). During the field inspection, no surface historic properties related to traditional Hawaiian culture were located during the inspection. Further, CSH concludes that there is little or no potential for subsurface properties as the entire area was in long-term use for sugarcane cultivation and was plowed repeatedly. No plantation-era structures, such as ditches, wells, or flumes, were noted.

Potential Impacts and Mitigation Measures

According to CSH, based on the results of background research and field inspection, the Anahola Residence Lots, Unit 6 project site has no archaeological potential and no further investigation is warranted. In addition, the State Historic Preservation Division stated the following.

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We believe there are no historic properties present, because:

- *Residential development/urbanization has altered the land*
- *Previous grubbing/grading has altered the land*
- *An acceptable archaeological assessment or inventory survey found no historic properties.*

Thus, we believe that “no historic properties will be affected” by this undertaking.

In the event that any archaeologically significant artifacts, bones, or other indicators are uncovered during construction, work will cease in the area and the State Historic Preservation Division will be contacted.

4.2.10 Cultural Resources

A cultural assessment was prepared by PBR Hawaii in September 2005 to identify cultural resources and practices associated with the proposed project site (Appendix D). The assessment, summarized below, stated that due to the long history of ground disturbance as a result of past agricultural activities on the project site, it is highly unlikely that any significant historic sites would remain.

Cultural Assessment

The Anahola Residence Lots, Unit 6 project site is located within the ahupua‘a of Anahola, which is the largest ahupua‘a within the Ko‘olau district, containing some 6,327 acres. Anahola is named after a mo‘o (lizard) that appeared on land as a man and in the sea as a merman. The ahupua‘a of ‘Aliomanu (*lit. “scar made by birds”*) lies to the north and the ahupua‘a of Kamalomalo‘o (*lit. “dry loincloth”*) to the south. The northern boundary of the ahupua‘a is at Kuaehu Point (*lit. “silent, still, lonely”*), and the southern boundary of the ahupua‘a is at Lae Līpoa (*lit. “līpoa seaweed point”*).

Natural Resources. Natural resources within the ahupua‘a include Anahola Stream, two prominent mountain peaks known as Hōkū‘alele peak (*lit. “star messenger, shooting star, or comet”*) and Kalalea Mountain (*lit. “prominent, protruding”*), fertile land and abundant ocean resources. Historically, the upper portion of the valley contained taro terraces, but it is the flatlands along the river mouth that were heavily cultivated. Hōkū‘alele Peak and Kalalea Mountain are very prominent throughout the community; the mountains can be seen from various locations in Anahola.

Known Archaeological Sites. Wendell Clark Bennet’s archaeological survey of the island of Kaua‘i lists several sites in the Anahola area, none of which are located directly on the project site. However, the sites can be considered significant in the regional context of their location in relation to the project site. Due to the long history of ground disturbance as a result of past agricultural activities on the project site, it is highly unlikely that any significant historic sites would be found/remain intact on the subject property. Many of the kupuna interviewed during the cultural assessment stated that a heiau is located either on or near the project site. The field inspection of the project site conducted by CSH (see Section 4.1.1 and

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Appendix A) concluded that they are likely referring to 'Aikanaka Heiau, which is located nearly 2,000 feet north of the project site.

Legends. There are several legends associated with Anahola, some of which were retold in variation by the kupuna that were interviewed for this project. Legends from the area include:

- Alaweo pond at the mouth of **Anahola River** is said to be the home of a mo'o, Pehuiki, who is the guardian of the pond. Pehuiki is said to have three daughters who were often seen sitting on the banks of Alaweo pond, combing their long hair. The four mo'o are said to sleep in the cave of Hāhālina.
- Lā'ieikawai and her twin sister Lā'ielohelohe were born in Ko'olau, O'ahu, where their father was a great chief. Lā'ieikawai and sister were separated at birth and hidden because their father had sworn to kill all of his daughters that were born before he had a son. It is said that there was a prayer tower on the peak of **Hōkū'alele** from which the prophet Hulumāniani announced that Lā'ieikawai would eventually settle on Kaua'i (Wichman, 1998).
- A large rectangular rock on the slopes of **Hōkū'alele** is said to have once been a man who was punished by being turned to stone. The punishment was served to the man for spying on Lahemanu, the daughter of a chief, while she took a bath (Armitage, 1944).
- Kawelo was a young chief of Kaua'i whom had many adventures, some which associate him with Anahola (Thompson, 1991).

Some of the names mentioned above are prevalent throughout the community today. For example, the Anahola Clubhouse is located near the intersection of Kalalea Road and Kawelo Street.

Previous Land Use. Prior to western contact, the Hawaiian people of Anahola lived a traditional subsistence life. In the 1870s, a Honolulu firm of Chinese rice planters moved into the area and began to buy the kuleana land of Hawaiians who wished to sell. Commercial sugar cultivation began in 1880 by the Makee Sugar Company. Makee Sugar, together with inter-island shipping companies, developed a small landing at Anahola and built a rail line to the landing. By the early 1920s, Anahola Landing was phased out with commercial freight and passengers utilizing Ahukini Landing in Hanamā'ulu. By the 1930s, Lihue Plantation absorbed Makee Sugar Company and continued sugar cane cultivation in Anahola until the early 1990s. After the last cane harvest, the lands were returned to the State Department of Hawaiian Home Lands. The project site is former pineapple and sugar cane land. A map at the Kaua'i District Office of the DHHL shows the area under cultivation as early as 1904. Today, the land lies vacant and overgrown.

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The shift from a subsistence lifestyle to a commercial agriculture community took its toll on the Hawaiian population of Anahola. A document from the Kaua'i Historical Society entitled, "Anahola. An Experiment in Turning Back the Clock," describes the lost cultural traits as experienced by a Hawaiian woman born in 1860. The woman recalled that only grass houses were previously in the community and that there was a loss of old Hawaiian arts, canoe making, tapa making, and even Hawaiian chickens and pigs, poi, and fishing. The woman stated that Hawaiians had their own things, and that "nobody had to go out to work and everyone had plenty." For example, she cited a Hui Lawai'a (community fishing), in which nets were shared rather than being owned by an individual. The same document also noted that fishing declined with the death of the expert fisherman, Kilokilo (*lit.* "magic, fortune telling").

Interviews. Several individuals knowledgeable about Anahola were contacted via telephone and/or personal interview during the months of August and September of 2005. The information from these interviews is summarized below.

Mr. Roland Licona, the District Supervisor of the DHHL, Kaua'i District Office, provided some background history on the DHHL project and information about the possible location of 'Aikanaka rock in DHHL Unit 7. Ms. Ema Manini-Kamibayashi, who is the Homestead Assistant of the DHHL, Kaua'i District Office and also has relatives living in Anahola, provided the contact information for some of the kupuna living in Anahola. She also noted that many residents in Anahola are aware that the Anahola Residences, Unit 6 are going to be built and that she has not heard any complaints from the community regarding the subject project.

Ms. LaFrance Arboleda of the Office of Hawaiian Affairs, Kaua'i-Ni'ihau Islands Burial Council and an Anahola resident provided contact information for some of the kupuna living in Anahola and also gave possible location information of 'Aikanaka rock. She stated her concerns for finding potential burials at the project site. Ms. Arboleda expressed that unearthed burials should be reinterred within the same ahupua'a from which they are found.

Ms. Healani Trembath coordinated the visit with the kupuna of the Alu Like Program and also suggested that the heiau possibly located on/near the project site may have been a fishing heiau and may still be spiritually 'alive'. According to the archaeological letter report, this heiau appears to be 'Aikanaka heiau, which is located nearly 2,000 feet north of the project site.

Mr. Brian Yamamoto's grandparents were first generation Japanese farmers in Anahola whom returned their land to DHHL when their lease expired. His grandparents farmed watermelons, tomatoes and other vegetable crops near 'Smith Corner' (children's swimming beach). Mr. Yamamoto noted that the community was a scattered coastal settlement, with steamships that came into Anahola landing to transport materials. Mr. Yamamoto also noted that there are a number of fishing sites along the Anahola coast.

Dr. Paul Esaki is also a descendant of first generation Japanese farmers in Anahola and is currently the Chair of the Anahola Japanese Community Association (AJCA). Dr. Esaki was

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born and raised in Anahola, leaving the area as a teenager. Currently, the AJCA is trying to document the history of the Japanese community in Anahola, but does not have anything recorded to date.

Mr. Hosea Lovell was born in Anahola on March 15, 1926 and has lived there ever since. Mr. Lovell's father was a forest ranger on Kaua'i, appointed in 1919. Mr. Lovell's great-grandfather was David Kahano and his great-grandmother was Kealiikuaaina. David Kahano was known to frequently walk up the Kalalea Mountains. Mr. Lovell mentioned that there was a trail along Kalalea Mountain that went around the mountain to a place with a lot of mountain apples. On a given weekend, families would get together and go to the mountains to pick the mountain apples, wrapping the fruit in ti leaf to carry home. Mr. Lovell said that you could also walk down from Kalalea Mountain, along Anahola stream to a nice swimming spot.

Mr. Lovell described Anahola as he knew it growing up, when everybody in Anahola fished. His father had an akule net that was used during hukilau. This would involve a lookout on the hill that would spot the schools of akule. When the lookout whistled, everyone would head down to the beach to hukilau. Mr. Lovell has fished along the Anahola coast between Ahihi Point and Kahala Point his entire life. He fishes every morning and late afternoon. He uses various methods to fish, including a throw net, spear diving, and line fishing. He feels that Anahola has some of the best fishing and limu gathering spots that can be found.

Mr. Lovell also recalled that there were no pine trees along the beach as there are today. There were a few coconut trees in yards, which made for a bare beachfront. However, the bare beachfront exacerbated the problem of exposed burials; he recalled finding a lot of bones as a child playing on the beach. Mr. Lovell stated that there are burials all along Anahola Beach Park that run all the way to the Anahola river mouth. As far as the project site is concerned, Mr. Lovell pointed out that sugar cane and pineapple used to grow along Kukuihale Road.

Mr. William Kulia Mokumaia Lemn Sr. was born and raised in Moanalua, O'ahu. He has lived on Kaua'i for 67 years and will be 91 years-old in November. Mr. Lemn's wife's family was from Anahola. He told a story of Kalalea Mountain:

There are stone walls at the base of the mountain; they were used for animals, a place for worship, and for burials. There are two stones there that husbands and wives would go to and sit on when they were having problems. He said when you sit there, you only hear three things: first the birds, second the chickens digging around, then lastly the wild pigs that come down. Once the pigs leave, there is only the makani (wind) that hits your back. Mr. Lemn said that wind is akua (god). In the quiet time spent there, problems are solved.

Ms. Lenora Inanod Kelekoma, Ms. Alice Dabin and Mr. Castro "Sonny" Lovell contributed to a group conversation about several legends of Anahola. The trio retold many of the legends that were found during background research for this assessment. Ms. Kelekoma recalled that a number of people used to climb Kalalea Mountain to go over to the other side for goat hunting.

Anahola Japanese Community. Prior to the establishment of the leased homesteads, some of the DHHL land was leased out to farmers, many of whom were first generation Japanese immigrants. These Japanese families established a school in Anahola. The first building of the Anahola Japanese School was erected in 1907. The land for the school (1.5 acres) was bought from the head bookkeeper of McBride Sugar Co., Mr. Takitani. There is also a Japanese graveyard located above the school. The second school building was erected in 1941, just before World War II, replacing the first building because the student population was growing.

Because Japanese property was taken by the government during WWII, the Japanese community voted to give the school's land to Hawaiian Canneries and American Factors for safe keeping. There was an understanding that the land would be returned after the war if the Japanese community formed an association. The land was returned in 1960, and the Anahola Japanese Community Association (AJCA) was formed.

Records from the AJCA 50th reunion show that prior to 1947, there were 70 Japanese families living in the Anahola area as farmers. In 1991, there were just 19 families living in the area, although 45 Japanese families were part of the AJCA (KHS, 2005).

The Anahola Baptist Church currently congregates at the AJCA Hall, this space also serves as the main gathering place for the last remaining members of the Japanese community in Anahola (Personal Interview, August 30, 2005). The AJCA is currently working to document the history of their existence in Anahola.

Should any archaeological, cultural, or historic sites be uncovered at the project site, proper procedure should be followed with the SHPD.

Potential Impacts and Mitigation Measures

The cultural assessment concludes that although the landscape of Anahola, and more specifically the project site, has been changed by years of cultivation, there are still many cultural resources available in Anahola in the form of oral history, archaeological sites, as well as subsistence fishing. Programs such as the Alu Like Kupuna Program help to preserve these cultural resources by providing a venue for the kupuna to share their knowledge. The efforts of the AJCA also ensure that the historic culture of Anahola will be preserved for generations to come. Hōkū'alele Peak and Kalalea Mountain prove to be important landmarks in the history of Anahola as told through legends and first hand accounts. Therefore, view planes towards those mountains should be maintained as their place in the history of Anahola is significant.

Should any cultural practitioners in the area desire access to sites adjacent to or in close proximity with the project site, there are other points of access in this area which can provide entry for cultural practices (i.e. gathering activities or religious rites). Development of the site will not block or limit access to any existing cultural sites in the area. The Draft EA was sent to OHA for review and comment. As requested by OHA, should iwi or native Hawaiian

cultural or traditional deposits be found during ground disturbance, work will cease and the appropriate agencies will be contacted.

4.2.11 Noise

As discussed in Section 4.1.10 of this environmental assessment, current sources of noise in the vicinity of the project include vehicle traffic, occasional overhead aircraft, natural sounds associated with weather (e.g. wind and rain), and birds.

Potential Impacts and Mitigation Measures

Long-term noise impacts due to the proposed Anahola Residence Lots, Unit 6 are not expected to be significant. Since a substantial increase in noise sources is not anticipated, noise levels are not expected to increase significantly over existing levels.

Short-term noise impacts will be generated during construction. Proper mitigating measures (such as limiting construction to daylight hours) will be employed to minimize the noise impacts. There are no sensitive land uses, such as hospitals or schools, in the vicinity of the project site that would be affected during the construction period. All project activities will comply with the State Department of Health's Administrative Rules, Chapter 11-46, "Community Noise Control" and will be monitored to ensure compliance.

Because long-term noise levels are not expected to be significant, no noise mitigation measures are planned as part of the project.

4.2.12 Air Quality

As discussed in Section 4.1.8 of this environmental assessment, in general, air quality in Hawai'i is excellent due to the predominant northeast trade winds. This is particularly true in the vicinity of the proposed Anahola Residence Lots, Unit 6 project site because of its distance from major urban centers and industries that have the potential to produce noxious gases.

Potential Impacts and Mitigation Measures

Long-term air quality impacts due to the proposed Anahola Residence Lots, Unit 6 project are not expected. Once the residences are built and occupied, the number of vehicles waiting to enter Kūhio Highway will likely increase, especially during the morning hours. However, the persistent winds and the short periods that the vehicles stop before entering Kūhio Highway will present minimal potential impacts from noxious gasses.

Short-term air quality impacts due to the proposed project may result from construction activities. During construction, air quality in the area may be impacted by exhaust generated from construction equipment and fugitive dust. All construction activities will implement best management practices to reduce any negative air quality impacts and comply with the

provisions of Hawai'i Administrative Rules, Chapter 11-60.1, "Air Pollution Control," Section 11-60.1-33, Fugitive Dust.

Watering exposed soils, grassing, and minimizing the amount of disturbed area will mitigate air quality impacts. Should dirt be tracked onto the highway, washdown will be undertaken to prevent fugitive dust formation. Exhaust emissions from construction equipment and increased vehicular traffic will not violate State or Federal air quality standards based on the moderate level of existing traffic volumes in the project region.

4.2.13 Visual Resources and Open Space

The project site is set back from Kūhio Highway approximately 1,000 feet and is relatively obscured by existing residential structures and vegetation on adjoining lots. See Figure 15 for photographs of the proposed site.

Potential Impacts and Mitigation Measures

The visual appearance of the proposed project site will change from vacant land overgrown with weeds, grasses, and shrubbery to a residential community. The site will generally not be visible to the public except for those traveling on internal residential roads within the adjacent neighborhoods. New residential structures will be low-scale and rural in character, similar to existing homes in the surrounding neighborhoods. As such, the project is not expected to significantly impact public views.

4.2.14 Population

Kaua'i is the third fastest growing county in the State of Hawai'i. The 2000 U.S. Census reported that the resident population of Kaua'i County increased 14.2 percent from 51,177 in 1990 to 58,463 in 2000. Growth in Kaua'i County is expected to continue with resident population projections for 2010 and 2020 estimated at 65,900 and 74,750, respectively.

Much of Kaua'i County's population growth has occurred in the Kawaihau region. In 2000, the population of the region was 18,525 people, which represents a 76 percent growth over the region's population in 1980. Within the Anahola community, the population has grown approximately 60 percent, from 1,209 people in 1990 to 1,932 people in 2000.

Potential Impacts and Mitigation Measures

Assuming three to four persons per household and a total of 181 new households once the proposed Anahola Residence Lots, Unit 6 project is completed and occupied, the development may contribute between 543 and 724 residents to the region's population.³ However, some future residents of Anahola Residence Lots, Unit 6 may already live in the Kawaihau region, and therefore, the actual number of new residents to the region may be

³ According to the *DHHL Applicant Survey, 2003* (SMS 2004), a majority of applicants have three to four persons in their households.

lower. The increase in resident population is not anticipated to have a significant adverse impact on the County's resident population or the rural character of the area. The new residences will be built in a similar small scale, rural character as existing homes.

The Anahola Residence Lots, Unit 6 project will provide native Hawaiians with much needed affordable single-family residences (versus competing against all Kaua'i residents in the open market). The beneficiaries of the individual lots are likely to be existing Kaua'i residents, State of Hawai'i residents, and possibly some out-of-State native Hawaiians.

4.2.15 Housing

The *Kaua'i Island Plan* beneficiary survey indicated that the majority of the beneficiaries whose first choice for type of award was residential preferred the Anahola region for a residential homestead. Of the Anahola lands that are in the DHHL inventory, the Anahola Residence Lots, Unit 6 presents the best opportunity to develop residential homesteads and meet beneficiary demand in the near future because of existing infrastructure and continuity with existing homestead neighborhoods.

Potential Impacts and Mitigation Measures

The majority of the 71.3-acre site will be designated for single-family residential use for native Hawaiians. The project will help to meet the demand for homes in Kaua'i and will provide affordable home ownership opportunities for native Hawaiians, especially in light of escalating housing prices on Kaua'i. The Anahola Residence Lots, Unit 6 will also help the DHHL to fulfill its mandate to develop and deliver homesteads to native Hawaiians by creating a livable neighborhood.

The proposed Anahola Residence Lots, Unit 6 project will also indirectly increase housing opportunities for the general population. As beneficiaries move out of their current residences that are not on DHHL lands and into the Anahola community, the vacated units will become available to the general public, helping to ease the statewide shortage of housing.

In accordance with the HHCA, 1920, as amended, Hawaiian home lands are not subject to zoning or other land use controls by the State or County.

4.2.16 Lifestyle/Character of the Community

As the largest Hawaiian homestead community on Kaua'i, Anahola has a strong identity as a native Hawaiian community. This is a close-knit community with values placed on preserving cultural traditions and the rural character of the region.

The nearest population centers to Anahola are Kapa'a Town and Wailua, approximately five miles and seven miles away from Anahola, respectively. Both of these towns are characterized by small, locally owned businesses that meet the needs of both residents and

visitors. Although the Kapa'a-Wailua corridor has grown as a tourist destination, it has retained its small-town character.

Potential Impacts and Mitigation Measures

The proposed Anahola Residence Lots, Unit 6 project is not expected to have a significant adverse impact on the character of the Kawaihau region. The *Kaua'i General Plan* supports the residential development of the Hawaiian home lands at Anahola. New residences will be designed to maintain the small scale, rural character of the region. The proposed project will result in positive social impacts, including the enhancement of residents' quality of life through the provision of residential homes for native Hawaiians.

4.2.17 Economic Characteristics

The Anahola Residence Lots, Unit 6 site is currently vacant and does not generate any revenues for the DHHL.

Potential Impacts and Mitigation Measures

The proposed Anahola Residence Lots, Unit 6 will generate direct, indirect, and induced construction-related jobs, both within the site and island-wide and Statewide. Construction industries, as well as industries supporting construction, will benefit from the employment and economic opportunities provided by the proposed development. Various businesses in the Kawaihau region would achieve significant economic gains, as construction workers and residents of the proposed development are expected to patronize them.

Numerous individuals and businesses will benefit from increased personal income and expenditures made possible by construction of the Anahola Residence Lots, Unit 6. The State will also benefit from the proposed project through the generation of income tax and general excise tax revenues.

4.2.18 Transportation Facilities

The primary roadway serving the Kawaihau region is Kūhio Highway, a two-way, two-lane arterial highway. The posted speed limit on Kūhio Highway in the vicinity of the project site is 35 miles per hour.

Kukuihale Road is a two-way, two-lane paved roadway that intersects with Kūhio Highway at a stop-controlled T-intersection. Kukuihale Road is adjacent to and north of the project site and will provide primary access to the site.

Potential Impact and Mitigation Measures

Proposed Roadways. Ehukai Road, located adjacent to and west of the project site, will be extended to provide secondary access to the site. Eight paved roadways, 44 and 56 feet in



Anahola Residence Lots, Unit 6 site from Kukuihale Road.



Anahola Residence Lots, Unit 6 site and Kukuihale Road looking makai.

Figure 15
Site Photographs
Anahola Residence Lots, Unit 6
DEPARTMENT OF HAWAIIAN HOME LANDS ISLAND OF KAUAI

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width, will be constructed within the site. Pursuant to Section 220 of the HHCA, the roadways within the Anahola Residence Lots, Unit 6 will be owned by the DHHL with a license issued to the County for maintenance purposes.

Traffic Impacts. A Traffic Impact Analysis Report (TIAR) was prepared for this project and is included in Appendix E. According to the *Kaua'i General Plan*, which uses an analysis of project travel demand based on the Kaua'i Planning Department's 2020 Projections, no roadway improvements will be necessary to accommodate daily traffic at an acceptable level of service through the Anahola region. This analysis takes into account future development and associated population growth, including development of native Hawaiian homesteads at Anahola.

Once completed and operational, the impact of increased residential traffic will be mitigated by the construction of a left turn storage lane on Kūhio Highway. Criteria for its design will be developed after completion of traffic engineering studies. Construction of the storage lane will be included in the project and completed during Phase 1 prior to the building of homes.

The construction period of the project will produce a slight increase of traffic on area roadways; however, this impact will be limited to a period of 12 months and will be scheduled during off-peak hours. The contractor shall use Kukuihale Road, which will be improved during Phase I of the project, for accessing the site and for deliveries during the construction period. In the event that there are any undue traffic related impacts on the area residents during this period, alternative routes shall be considered to minimize impacts on the community.

4.2.19 Water Supply Facilities

The County of Kaua'i Department of Water (DOW) provides water service to the Kawaihau service area, which includes Anahola, Moloa'a, and Kapa'a-Wailua. As of 1999, average water demand in the Kawaihau service area was 2.59 million gallons per day (mgd), with a maximum of 3.88 mgd.

The Anahola System includes two DHHL wells covered under prior agreements and operated by the DOW. The DHHL has a Water Credits Agreement (signed on November 13, 2002) with DOW. This agreement states that DOW shall allocate capacity, in the form of water meter issuance, equivalent to 400,000 gallons of potable water per day (gpd). According to this agreement, DOW shall not impose any time limitation on DHHL to use such allocation of potable water capacity from DOW's system.

Potential Impacts and Mitigation Measures

Development in Anahola is currently limited to the lower portion of the Anahola/Kamalomalo'o tract, below the existing water storage facility elevation. At the time of the DOW/DHHL Water Credits Agreement, water capacity had already been allocated for 145 residential dwelling units in Anahola Residence Lots, Units 3, 4, and 5, for a total of 108,750 gpd, leaving a balance of 291,250 gpd, which is equivalent to approximately 388

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water meters for residential dwelling units. According to the DOW's comment letter on the Draft EA (Chapter 7.0), existing well source facilities are at capacity. Additional facilities are being considered by the County. Necessary improvements to service the Anahola Residence Lots, Unit 6 project include transmission and distribution mains, which will be extended from existing DHHL subdivisions.

If available, R-1 recycled wastewater will be used in major common areas and open spaces where it will not pose risks to health and safety.

4.2.20 Wastewater Facilities

The Anahola region is not currently serviced by a municipal wastewater treatment system. For developments of 50 or more residential lots, the State DOH requires a wastewater treatment facility to service the subdivision. However, building a wastewater treatment facility and effluent disposal system (including sewer transmission lines) would be costly and the design, approval, and construction process would set the project back several years. Individual wastewater disposal systems are used in the existing homesteads with variances granted by the State DOH, and the DHHL has applied for a variance (Docket No. 05-VWW-34) to allow more than 50 individual waste disposal systems in this project.

Potential Impacts and Mitigation Measures

Since the surrounding area uses individual wastewater systems and no new cesspools will be used, no significant impact on existing wastewater systems in the region are anticipated. Should the DOH allow individual waste disposal systems for the proposed Anahola Residence Lots, Unit 6 project, the following measures will be implemented to mitigate potential impacts:

1. Cesspools will not be used as on-site individual wastewater systems.
2. Lessees will submit plans for each individual wastewater system to the DOH Wastewater Branch for review and approval. The systems will be approved in writing by the DOH before being placed into service.
3. All individual wastewater systems will be inspected at least once every two years or as specified by the individual wastewater system design engineer and pumped when necessary.
4. Low-flow plumbing fixtures will be required in all new dwellings.
5. The development will connect to a municipal or private sewer system, should it become available to the area (dry sewer lines will be installed as part of the project).
6. Each system will be designed by a licensed engineer and constructed by a licensed contractor.
7. Each system will serve no more than five bedrooms or bedroom-like rooms.

In its comment letter on the Draft EA, the DOH Wastewater Branch concurred with the variance request, provided that no cesspools are utilized (Chapter 7.0). All wastewater plans will conform to applicable provisions of the DOH's Administrative Rules, Chapter 11-62,

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“Wastewater System”, and the Wastewater Branch has the right to review the detailed wastewater plans for conformance with applicable rules.

Recently, the DOH issued a draft of the Decision and Order to grant the variance request. The letter stated the following:

Chapter 342D, Hawaii Revised Statutes, Section 342D-7(c), states that no variance shall be granted by the Department unless the application and supporting information clearly show that:

- 1. The granting of the variance is in the public interest as defined in the Hawaii Revised Statutes, Section 342D-6(c)(4).*
- 2. The granting of this variance will not substantially endanger human health or safety.*
- 3. Compliance with the rules, regulations or standards from which the variance is sought would produce serious hardship without equal or greater benefits to the public.*

Based upon the foregoing findings of fact, it is concluded that the above requirements have been met.

4.2.21 Drainage Facilities

The Anahola region can be characterized as having both flat and gently rolling regions with some rugged cliffs rising above the coastal plain. It is located on the windward side of island and receives approximately 50 inches of rain per year in lowland areas. Coastal waters, Anahola Stream (perennial), and Kamalomalo’o Stream (intermittent) are located in the vicinity of the project site. None of these appear on the *List of Impaired Waters in Hawaii Prepared under Clean Water Act §303(d)* or are designated as water areas to be protected in DOH’s Administrative Rules, Chapter 11-54.

No municipal drainage system is available in the area of the Anahola Residence Lots. Surface runoff from existing individual lots is normally routed to either dry wells for disposal or onto nearby streets. Depending upon the size of the lot, there may be more than one dry well located on the property. Flood flows generated by mauka residential areas are either directed away from the project (northerly side) or collected in an existing ditch system (southerly side). The entire 71.3-acre site and surrounding area is designated Zone X (areas determined to be outside the 500 year flood plain) by the Flood Insurance Rate Map (Figure 8).

Potential Impacts and Mitigation Measures

A drainage master plan will be prepared for the proposed Anahola Residence Lots, Unit 6 project during the design of the development to control flooding and provide adequate storm water disposal for on-site and off-site generated runoff. Although the project will create impervious surfaces (i.e., roads and roofs) that increase runoff, drainage improvements will

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be constructed (extended from existing drainage facilities in adjacent DHHL subdivisions) to minimize the potential for flooding. Construction of such improvements will achieve proper drainage and flow of on-site storm water runoff. A National Pollutant Discharge Elimination System (NPDES) permit application will be prepared for this project's construction activity.

During the construction phase of the project, potential short-term impacts from erosion could occur as a result of on-site storm water drainage patterns. Drainage control features would be established to minimize potential impacts resulting from construction-related activities. Best management practices will be implemented to prevent polluted runoff from entering the ocean and nearby streams. Such practices include the early construction of drainage control features, construction of temporary and permanent sediment basins, use of temporary berms and cut-off ditches, and use of temporary silt fences and sediment control devices. Additionally, appropriate coordination would be conducted with pertinent agencies during the normal construction plan review process to address applicable regulations and other requirements to address concerns during the project's design.

4.2.22 Solid Waste Disposal Facilities

The County of Kaua'i, Department of Public Works (DPW) maintains an island wide solid waste collection and disposal system. The Kekaha Landfill Phase II is the primary disposal site for solid waste on Kaua'i. As of FY1999, the landfill accepted approximately 67,590 tons of solid waste. The County also operates four refuse transfer stations, one of which is located in Kapa'a. The Kapa'a station also accepts greenwaste.

Potential Impacts and Mitigation Measures

As the resident and visitor population on Kaua'i grows, demand on the Kekaha Landfill Phase II will increase irrespective of where new development occurs. The *Kaua'i General Plan* projects that a new landfill site will need to be developed by 2020 to meet future solid waste generation by residents and visitors.

The proposed Anahola Residence Lots, Unit 6 project will generate solid waste during the construction of backbone infrastructure and as the project achieves build-out. The quantity of solid waste generated will vary with different construction activities, and some wastes may require separate and special disposal methods. Project construction will conform to the DOH program goals and objectives of the Integrated Solid Waste Management Act, Chapter 342G, HRS.

Once the site is fully developed, the projected solid waste generated by the residential development is estimated to average approximately 1.22 tons per day. (Single-family residential: 4 persons x 181 units = 724 persons; 3.37 pounds per person per day x 724 persons = 2,440 pounds per day or 1.22 tons per day) This is a relatively small amount in comparison with the total waste generated island wide. Further, it is likely that many of the applicants for Hawaiian home lands on Kaua'i currently reside on Kaua'i. Although the proposed Anahola Residence Lots, Unit 6 project may introduce some new residents to

Kaua'i, it is not expected to greatly impact landfill capacity. A new landfill will have to be developed regardless of the proposed project.

4.2.23 Electrical and Communications Facilities

Electrical Facilities. Kaua'i Island Utility Cooperative (KIUC) supplies power for residential, commercial, large power, and street lighting uses throughout the island. Major load centers are in Kapa'a-Wailua, Līhu'e, and Kōloa-Po'ipū. KIUC generates power from a 96-megawatt (MW), diesel-fired power plant located at Port Allen and purchases 14 MW from Līhu'e Plantation.

The Kawaihau region is served via a tap off of the mauka transmission line that connects the Wainiha Hydroelectric Plant with the plant at Port Allen. This tap provides power via the Kapa'a Switchyard to developed coastal areas. Overhead utility lines connect the existing Anahola Residence Lots homes to the KIUC system via overhead utility lines.

Communications Facilities. Telephone and communication service is currently provided to residents in the Anahola community by Sandwich Isles Communication, Inc. (SIC). SIC recently installed a fiber-optic cable telecommunications system to service Hawaiian home lands communities on Kaua'i. This service will be available in the future to homestead lots in the proposed Anahola Residence Lots, Unit 6. There are existing underground conduits leading to the project area. The SIC Anahola Central Office Building is located mauka of the project site.

Potential Impacts and Mitigation Measures

Electrical and communications improvements necessary to support the development can be served by utility companies, with some off-site work required. The off-site improvements are ongoing activities for the utility companies and should not have an adverse effect on their ability to service other areas. Cables and ducts will be suitable for underground applications and will be tolerant of both wet and dry conditions. All electrical and communications utility systems will be constructed (extended from existing facilities in adjacent DHHL subdivisions) and maintained according to approved utility standards. On-site facilities will have minimal impact on the environment, as noise, aesthetic, and safety considerations will be within normally applied guidelines.

Electrical Facilities. Electrical facilities will be installed to provide electricity for the Anahola Residence Lots, Unit 6 project. Electrical service will be provided by KIUC from the 12.47-kv line currently serving the Anahola Residence Lots, Unit 2. The Unit 6 residences will increase the existing electrical demand; however, this increase is not expected to affect the ability of KIUC to provide services to other areas.

In compliance with Chapter 344 (State Environmental Policy) and Chapter 226 (Hawaii State Planning Act), HRS, all project buildings, activities, and site grounds will be designed with

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energy-saving considerations. Energy-efficient design practices and technologies will be specifically addressed in the design phase of the proposed project.

Communications Facilities. Sandwich Isles Communication, Inc. (SIC) has an exclusive license to provide telecommunication services to new developments on Hawaiian Home Lands. All telecommunication infrastructure (i.e., underground conduits, handholes, and cabling) will be installed by SIC, at no cost to the DHHL, and will be connected to SIC's Anahola Central Office Building (which is located mauka of the project site and Kūhio Highway). SIC will run cabling to each home to provide telephone and high-speed internet service. SIC will coordinate with Oceanic Cable to provide cable television service through the same underground conduits. The proposed project is not expected to adversely affect SIC or other SIC service areas.

4.2.24 Educational Facilities

The proposed project site is within the State Department of Education (DOE) Kapa'a Complex. Public schools in the project area include Kapa'a Elementary, Kapa'a Middle, and Kapa'a High School. The Kanuikapono Learning Center Public Charter School is located in Anahola. Official enrollments for these schools are shown in the following table.

School Name	2004-2005 Official Enrollment
Kapa'a Elementary	916
Kapa'a Middle School	732
Kapa'a High School	1,133
Kanuikapono Learning Center PCS	42
<i>Total</i>	<i>2,823</i>

Source: State of Hawai'i, Department of Education,

In addition to public schools, St. Catherine's School, a private Catholic school, is located in Kapa'a. Anahola Preschool, which is operated as a collaboration between Kamehameha Schools and the DOE, is located in Anahola.

Potential Impacts and Mitigation Measures

The Anahola Residence Lots, Unit 6 project will likely introduce school-aged children who would enroll at Kapa'a Elementary, Kapa'a Middle, or Kapa'a High School.⁴ In its comment letter on the Draft EA, the DOE confirmed that approximately 104 students are estimated to live in the proposed subdivision when it is complete (Chapter 7.0). The DOE is required to provide space for all students; therefore, the DHHL set aside a 12-acre school site on the property. However, the DOE noted that it is not a likely site for a new school if the DOE is required to pay market rate rent. The DHHL is now considering use of the site by a smaller charter school and/or residential expansion.

⁴ Using DOE Multipliers for single-family residential developments, an estimated 104 students will be introduced by this project. (Elementary: 0.29×181 lots = 50.5 students; Middle: 0.143×181 lots = 25.9 students; High: 0.154×181 lots = 27.9 students; Total: 104.3 students)

Fall enrollments at Kapa'a Elementary, Kapa'a Middle, or Kapa'a High Schools have declined since the 2001-2002 school year, and project build-out is expected to occur over five years. Students living in Anahola Residence Lots, Unit 6 will attend public schools in Kapa'a, private schools, charter schools, or other schools in Kaua'i.

4.2.25 Police Protection

Police protection services in the Anahola area are provided by the County of Kaua'i Police Department from its main station in Lihu'e, approximately 15 minutes from the project site. In addition, radio dispatched 24-hour motor patrol is available in the project area.

Potential Impacts and Mitigation Measures

Although some future residents of the proposed Anahola Residence Lots, Unit 6 may already live in the Anahola area, the project will likely introduce new residents to the area. As such, there will be an occasional and unavoidable need for police service; however, this increase in demand is not expected to be significant or to impact the level of service provided to other residents in the service area.

4.2.26 Fire Protection

Fire protection is provided by the County of Kaua'i Fire Department, Kapa'a Station located approximately five to seven minutes from the Anahola project site. Existing fire hydrants are located on Pilipoli Street, with the closest one approximately 300 feet from the project site.

Potential Impacts and Mitigation Measures

With build-out of the proposed Anahola Residence Lots, Unit 6 project, there will be an occasional and unavoidable need for fire protection services, which will be provided by the Kapa'a Station. Structures will be built in compliance with Fire Department standards and requirements. The applicant will advise the Fire Department of project implementation and phasing to permit adequate planning and advance notice of project completion. After reviewing the Draft EA, the County of Kaua'i Fire Department stated that it had no objections to this project (Chapter 7.0). There will be required inspections in the building phase of the project, and the construction of any new hydrants will be in accordance with the Kaua'i County Department of Water standards.

4.2.27 Hospitals/Health Care Facilities

Kauai's three hospitals include Wilcox Memorial Hospital, Kaua'i Veterans Memorial Hospital, and Samuel Mahelona Memorial Hospital. Together, they provide 113 acute care beds, 271 long-term care beds, and four advanced life support ambulances (PBR Hawaii, September 2000). The closest facility to the proposed project site is Samuel Mahelona Memorial Hospital, which is located Kapa'a.

Potential Impacts and Mitigation Measures

The Anahola Residence Lots, Unit 6 project will likely introduce new residents to the Anahola region and there will be an occasional and unavoidable need for emergency medical services by these residents. However, it is unlikely that this demand will impact the level of service provided to other residents in the region. With ambulance service and non-emergency medical care provided nearby, existing hospitals and healthcare facilities in the region are adequate to accommodate residents of the proposed Anahola Residence Lots, Unit 6 project.

Emergency medical service providers will be able to access the property from Kūhio Highway and existing and proposed roadways within the Anahola Residence Lots neighborhood.

4.2.28 Recreational Facilities

The nearest public parks are Anahola Hawaiian Homes Park (mauka of Kūhio Highway), Village Park (makai of Kūhio Highway within Unit 4), Anahola Beach Park (northwest of site), and Lae Lipoa Beach (southeast of the site).

Potential Impacts and Mitigation

Some residents of the project may already live in the Kawaihau region and visit parks in the project area. Therefore, the impact to population and public services/facilities will be less than a project that would introduce entirely new residents to the area.

4.2.29 Community Services

Community services and public facilities in the vicinity of the Anahola Residence Lots, Unit 6 site include the following:

- Several public and private schools (see Section 4.2.24);
- Kaua'i Police Department Main Station (see Section 4.2.25);
- Kaua'i Department of Fire, Kapa'a Station (see Section 4.2.26);
- Hospitals/healthcare facilities (see Section 4.2.27);
- Ambulance service (see Section 4.4.27);
- Several recreational facilities (see Section 4.2.28);
- Churches in Anahola, Kapa'a, and Wailua;
- A public library in Kapa'a;
- Post office on Kūhio Highway; and
- Commercial centers in Kapa'a and Wailua.

There are also plans underway for a 20-acre multi-purpose community center mauka of Kūhio Highway in the vicinity of the proposed Anahola Residence Lots, Unit 6 site.

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Proposed uses to be included in the center include youth and adult education, health and social services, native Hawaiian business opportunities, and a cultural learning center.

Potential Impacts and Mitigation Measures

The proposed Anahola Residence Lots, Unit 6 is not expected to have any adverse impact on community services. Anticipated impacts on public and private schools, police and fire facilities, hospitals and healthcare facilities, and recreational facilities were previously discussed in this chapter. Mitigation measures were also identified to minimize potential impacts.

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5.0 ALTERNATIVES TO THE PROPOSED ACTION

5.1 ALTERNATIVES CONSIDERED

Under Section 11-200-10(6), HAR, Environmental Impact Statement Rules, the alternatives to the proposed action considered are limited to those that would allow the objectives of the project to be met, while minimizing potential adverse environmental impacts. The feasible alternatives must also address the project's economic characteristics while responding to the surrounding land uses that will be impacted by the project. In conformance with applicable regulations, the following alternatives, including alternative sites and uses of the property, have been identified and investigated.

5.2 ALTERNATIVE SITES

The DHHL has a limited amount of developable land for housing its beneficiaries. The Anahola/Kamalomalo'o tract is the second largest of DHHL's land holdings on Kaua'i, representing approximately one-fifth of DHHL's 20,565 total acres. In the *DHHL Applicant Survey, 2003* (SMS 2004), Hawaiian home lands applicants indicated their location preference. The largest percentage of applicants preferred the Anahola area to other areas on Kaua'i. Of the Anahola lands that are in the DHHL inventory, Unit 6 presents the best opportunity to develop residential homesteads and meet the beneficiary demand in the short-term due to existing infrastructure. It is also the logical extension of the existing homestead community at Anahola.

Anahola is the largest Hawaiian homestead community on Kaua'i. According to the *Kaua'i Island Plan*, there are 359 existing residential homesteads totaling 165 acres and 47 agriculture homesteads totaling 241 acres. An additional 20 acres in Anahola has been set aside for the development of a mixed-use community center by Project Faith. The proposed Anahola Residence Lots, Unit 6 would provide additional residences to native Hawaiians in an area highly desired by Hawaiian home lands applicants in an area that already has an established Hawaiian community with a strong cultural identity.

The DHHL is also developing residential communities in Kekaha and Wailua. The Kekaha Residence Lots, Unit 4 consists of 49 residential lots and is currently under site construction. The homes are anticipated to be completed by the end of 2007. Planning and design are still underway for the Wailua project.

5.3 "NO ACTION" ALTERNATIVE

The mission statement of the DHHL is to manage the Hawaiian Home Lands trust effectively and to develop and deliver land to native Hawaiians. The "no-action" alternative would prevent the DHHL from fulfilling its mission of providing land to native Hawaiian beneficiaries on the DHHL waiting list. This alternative would forego opportunities for home

ownership and the enhancement of residents' quality of life. Under this alternative, the site would continue to be unused and unutilized in terms of the positive socio-economic benefits that the proposed project would provide. Additionally, Federal funding from the Department of Housing and Urban Development, through its Native American Housing Assistance and Self Determination Act (NAHASDA) Community Grants program, would be foregone. Therefore, the no-action alternative has been rejected from further consideration.

5.4 ALTERNATIVES RELATED TO DIFFERENT DESIGNS OR DETAILS OF THE PROPOSED ACTIONS WHICH WOULD PRESENT DIFFERENT ENVIRONMENTAL IMPACTS

Approximately all of the 71.3-acre site will be developed for single-family residences. The 181 lots will range in size from 10,000 to 18,000 square feet.

Different designs related to density and design capacity could be applied to the proposed project and would result in different environmental impacts. For example, a higher density development of multi-family would reduce the buildable area and quantity of surface runoff. However, more land-efficient, multi-family dwellings would not be appropriate to the rural character of the surrounding area. The quantities of water used and solid waste, wastewater, and traffic generated would also be greater with a higher density design (if significantly more units per acre are proposed). With a lower density than what is proposed, infrastructure costs would be greater per unit since the development would be spread out and fewer beneficiaries would be served.

Single-family lots on smaller-sized lots would serve more beneficiaries but add more traffic and may alter the character of the area. This alternative would be more efficient from an infrastructure cost perspective.

5.5 ACTIONS OF A SIGNIFICANTLY DIFFERENT NATURE WHICH WOULD PROVIDE SIMILAR BENEFITS WITH DIFFERENT ENVIRONMENTAL IMPACTS

There are no known actions significantly different than the proposed Anahola Residence Lots, Unit 6 that would provide the same level of housing opportunities for native Hawaiians on Kaua'i at this time. In other areas of the State, depending on the environmental conditions and the availability of infrastructure, DHHL lands are used for agricultural (including ranching), industrial, or public use (such as community centers and preschools). All of these uses would benefit DHHL programs and beneficiaries, but each would have different environmental impacts. The proposed project would help fulfill the high demand for residential Hawaiian home lands uses in this area.

5.6 THE ALTERNATIVE OF POSTPONING ACTION PENDING FURTHER STUDY

Development of the project area has been planned and studied by the DHHL. The *Kaua'i Island Plan* (2004) provided a detailed assessment of all of DHHL's landholdings on Kaua'i. Environmental assessments in the project vicinity were also conducted for the SIC Anahola

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Central Office Building (PBR Hawaii 2000). That environmental assessment studied the impacts of development in this area, and was subsequently issued with a Finding of No Significant Impact (FONSI). Further study of the area would not achieve the overall project objective and would delay the provision of housing opportunities to native Hawaiians.

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6.0 ANTICIPATED DETERMINATION, FINDINGS, AND REASONS FOR SUPPORTING DETERMINATION

This EA has evaluated the potential primary, secondary, and cumulative environmental impacts, both short-term and long-term, that could result from the proposed Anahola Residence Lots, Unit 6. Mitigation measures have also been proposed to address potential impacts resulting from the project. Based on an assessment of existing research, a FONSI is anticipated as summarized in this chapter.

6.1 DETERMINATION

Based on the significance criteria established by the *Hawaii Administrative Rules* and the assessment of potential environmental impacts, a FONSI was issued by the DHHL (Accepting Authority), pursuant to Chapter 343, HRS.

6.2 SIGNIFICANCE CRITERIA

According to the Section 11-200-12, HAR, Significance Criteria, an applicant or agency must determine whether an action may have a significant impact on the environment, including all phases of the project, its expected consequences both primary and secondary, its cumulative impact with other projects and its short and long-term effects. The HAR establish a “significance criteria” to determine whether significant environmental impact will occur as a result of a proposed action. An action shall be determined to have a significant impact on the environment if it meets any one of the following criteria:

- (1) **Involves an irrevocable commitment to loss or destruction of any natural or cultural resources;**

The proposed site has been historically disturbed and does not contain any significant natural resources. No features of archaeological or cultural significance were located during a surface field inspection nor are any subsurface features likely to be found based on the lack of historical or prehistoric settlement and agricultural use of the site.

As such, the project should have “no effect” on historic resources. However, should any archaeologically significant artifacts, bones, or other indicators of previous on-site activity be uncovered during the construction phases of development, their treatment will be conducted in compliance with the requirements of the State Historic Preservation Division.

There are no known endangered or threatened flora or fauna species associated with the site.

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(2) Curtails the range of beneficial uses of the environment;

The development of the proposed Anahola Residence Lots, Unit 6 will foreclose other uses, however, residential use of the site would provide affordable housing to native Hawaiians and help to ease the statewide shortage of housing, as residences not on DHHL lands vacated by DHHL beneficiaries will become available to the general population once DHHL beneficiaries move to their homestead lots. The site is vacant land surrounded by other residential uses.

(3) Conflicts with the State's long-term environmental policies or goals and guidelines as expressed in Chapter 344, HRS; and any revisions thereof and amendments thereto, court decisions, or executive orders;

The proposed project is consistent with the environmental policies, goals, and guidelines established in Chapter 344, HRS, and this EA has addressed such issues as: natural resources conservation (to the extent possible); enhancement of the quality of life; population; land, water, visual, air, and other natural resources; flora and fauna; parks, recreation, and open space; economic development; transportation; energy; community life and housing; education and culture; and citizen participation.

(4) Substantially affects the economic welfare, social welfare, or cultural practices of the community or state;

The proposed project will positively affect the economic and social welfare of the native Hawaiian community by providing housing opportunities in a highly desirable area. The Anahola Residence Lots, Unit 6 project will be developed on approximately 71.3 acres and will include 181 single-family residential lots. This project will also positively affect the economic and social welfare of the State by adding to the statewide inventory of housing.

Construction of Anahola Residence Lots, Unit 6 will also benefit the State by creating temporary jobs and increasing sales within the construction industry. Income taxes and sales taxes from the expenditure of construction employees' wages will be generated as a result of this development.

The proposed Anahola Residence Lots, Unit 6 project is not expected to affect the lifestyle and character of the Anahola region. Cultural practices are not likely to be impacted by the Anahola Residence Lots, Unit 6 project, as coastal resources and access to the shoreline will not be altered by the project. The development of land for residential use is consistent with the area's existing use for similar purposes.

(5) Substantially affects public health;

Construction of Anahola Residence Lots, Unit 6 may pose the potential for temporary impacts to noise and air and water quality levels; however, these potential impacts will be short-term and are not expected to substantially affect public health. All construction activities will comply with applicable regulations and will implement appropriate mitigation

ANAHOLA RESIDENCE LOTS, UNIT 6
FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

measures as necessary. After construction, Anahola Residence Lots, Unit 6 should have minimal impact on ambient noise levels or air and water quality.

(6) Involves substantial secondary impacts, such as population changes or effects on public facilities;

The proposed Anahola Residence Lots, Unit 6 project will provide eligible native Hawaiians with much needed single-family residences. A majority of applicants for Hawaiian home lands on Kaua'i currently reside on Kaua'i. Although the proposed development will likely introduce some new residents to Kaua'i, the demand for energy and water, as well as solid waste and wastewater generation, should not increase significantly, either regionally or island-wide.

(7) Involves a substantial degradation of environmental quality;

The proposed project will utilize previously disturbed vacant land and is not expected to substantially degrade environmental quality. The property was substantially modified in the past and today lacks any significant natural resources. Potential impacts to the environment resulting from development, and appropriate mitigation measures have been identified throughout this EA.

(8) Is individually limited but cumulatively has considerable effect on the environment, or involves a commitment for larger actions;

Since much of the Anahola region has been historically used for sugarcane cultivation that altered the natural environment, the DHHL Anahola Residence Lots, Unit 6 and other developments planned in the area are not expected to have a cumulative or considerable adverse impact on the environment. There are no known significant archaeological and cultural sites nor any known endangered or threatened flora or fauna.

(9) Substantially affects a rare, threatened or endangered species or its habitat;

There are no known endangered or threatened flora or fauna species associated with the site and the site is not within a critical habitat.

(10) Detrimentially affects air or water quality or ambient noise levels;

Construction activities for development of the Anahola Residence Lots, Unit 6 could potentially impact noise and air and water quality levels (i.e., fugitive dust from grading work, noise and exhaust emissions from construction equipment and vehicles). However, these potential impacts will be short-term and are not expected to be detrimental. All construction activities will comply with applicable regulations and will implement appropriate mitigation measures as necessary.

After construction, the Anahola Residence Lots, Unit 6 is not expected to adversely impact ambient noise levels or water and air quality. Although impervious surfaces will be created

ANAHOLA RESIDENCE LOTS, UNIT 6
FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

on currently undeveloped land, any increase in runoff would be accommodated by proposed drainage improvements and should not detrimentally affect water quality. The project will also increase residential traffic, which could impact noise levels and air quality. However, no long-term regional air quality impacts are anticipated due to persistent tradewinds and the short periods that the vehicles stop before entering Kūhio Highway will rapidly dissipate any potential impacts from noxious gasses.

- (11) Affects or is likely to suffer damage by being located in an environmentally sensitive area, such as a flood plain, tsunami zone, beach, erosion-prone area, geologically hazardous land, estuary, freshwater, or coastal waters.**

The Anahola Residence Lots, Unit 6 site is located in the Kawaihau region approximately five miles from Kapa'a. The project site is not located in an environmentally sensitive area such as a flood plain, beach, erosion-prone area, geologically hazardous land, estuary, fresh water, or coastal waters and would therefore have no adverse impacts upon such areas. A small portion of the project site appears to be located within the tsunami evacuation zone; however, it is difficult to determine the accuracy of the zone as boundaries were estimated by topographical characteristics, or approximated using surrounding features such as roads. It should be noted that at its lowest point, the site is 44 feet above mean sea level. The project site is located in Zone X, which designates areas determined to be outside of the 500-year floodplain (Figure 8).

- (12) Substantially affects scenic vistas and view planes identified in county or state plans or studies;**

Residential structures within the proposed Anahola Residence Lots, Unit 6 will be designed and built to conform to the requirements of the County zoning and building codes and will not affect any identified scenic vistas and view planes.

- (13) Requires substantial energy consumption.**

Construction of the proposed Anahola Residence Lots, Unit 6 is not expected to require substantially more energy than other projects of similar size and scale. Structures will be designed to incorporate energy-saving technologies, and since the majority of beneficiaries on the Kaua'i Residential Waitlist currently reside on Kaua'i, demand for energy should not increase significantly.

7.0 CONSULTED PARTIES AND PARTICIPANTS IN THE EA PROCESS

A preliminary draft of the *Anahola Residence Lots, Unit 6 Draft Environmental Assessment* was sent to various State and County agencies in 1995. Comments received on the 1995 preliminary Draft EA and notices of a revised Draft EA are included in this chapter.

Several agencies (or agency documents) and individuals were consulted in the preparation of the Draft EA. These agencies are listed below.

Federal

- Federal Emergency Management Agency
- U.S. Fish and Wildlife Service
- U.S. Geological Survey

State of Hawai'i

- Department of Business, Economic Development & Tourism
- Department of Business, Economic Development & Tourism – Energy Division
- Department of Business, Economic Development & Tourism – Land Use Commission
- Department of Education
- Department of Health – Kaua'i District Health Office
- Department of Land and Natural Resources – Historic Preservation Division (Kaua'i)
- Department of Transportation

County of Kaua'i

- Department of Public Works
- Department of Water
- Planning Department

Individuals

- Mr. Roland Licon, District Supervisor of the DHHL, Kaua'i District Office
- Ms. Ema Manini-Kamibayashi, Homestead Assistant of the DHHL, Kaua'i District Office
- Ms. LaFrance Arboleda, Office of Hawaiian Affairs, Kaua'i-Ni'ijau Islands Burial Council and Anahola Resident
- Ms. Healani Trembath, Alu Like Kupuna Program
- Mr. Brian Yamamoto, descendent of first generation Japanese farmers from Anahola
- Dr. Paul Esaki, current Chair of the Anahola Japanese Community Association and descendent of first generation Japanese farmers from Anahola
- Ms. Mary Requilman, Managing Director of the Kaua'i Historical Society
- Mr. and Mrs. Hosea and Jane Lovell, fisherman and Anahola residents
- Mr. William Kulia Mokumaia Lemn Sr., Anahola resident
- Ms. Lenora Inanod Kelekoma, Anahola resident

ANAHOLA RESIDENCE LOTS, UNIT 6
FINAL ENVIRONMENTAL ASSESSMENT / FINDING OF NO SIGNIFICANT IMPACT

- Ms. Alice Dabin, Wailua resident
- Mr. Castro “Sonny” Lovell, Anahola resident

Additionally, the Draft EA was distributed to various agencies and published in the October 8, 2005 issue of the OEQC’s *The Environmental Notice*, commencing a 30-day public review period. Comments received on the Draft EA and appropriate responses are included in this chapter.

AGENCY		Draft EA Distribution	Date of Comments
State			
1	Department of Business, Economic Development and Tourism – Office of Planning	09-30-05	11-04-05
2	Department of Business, Economic Development and Tourism – Land Use Commission	09-30-05	10-25-05
3	Department of Education – Office of Business Services	09-30-05	11-07-05
4	Department of Health – Environmental Planning Office	09-30-05	11-04-05
5	Department of Health – Office of Environmental Quality Control	09-30-05	11-04-05
6	Department of Land and Natural Resources	09-30-05	--
7	Department of Land and Natural Resources – Historic Preservation Division	09-30-05	--
8	Department of Land and Natural Resources – Historic Preservation Division, Kauai Archaeologist	09-30-05	10-03-05
9	Department of Transportation	09-30-05	--
10	Office of Hawaiian Affairs	09-30-05	11-03-05
County			
11	Department of Public Works	09-30-05	--
12	Department of Water	09-30-05	11-04-05
13	Fire Department	09-30-05	10-31-05
14	Planning Department	09-30-05	--
15	Police Department	09-30-05	--
Other Organizations			
16	Kauai Island Utility Cooperative	09-30-05	--
17	Sandwich Isles Communications, Inc.	09-30-05	10-13-05
18	Anahola Hawaiian Homes Association	09-30-05	--
19	Anahola Homestead Native Hawaiian Association	09-30-05	--
Libraries			
20	Kapaa Public Library	09-30-05	--



STATE OF HAWAII
DEPARTMENT OF BUSINESS, ECONOMIC DEVELOPMENT & TOURISM
LAND USE COMMISSION

Room 104, Old Federal Building
335 Merchant Street
Honolulu, Hawaii 96813
Telephone: 587-3822

January 11, 1995

SUBJECT: Director's Referral No. 95-002-Q
Draft Environmental Assessment (EA) for
Anahola Residence Lots, Unit 6, Anahola,
Kauai

We have reviewed the subject draft EA and have the following
comments to offer:

- 1) The project site as shown on exhibit 5 appears to be
located within the State Land Use Urban and
Agricultural Districts.
- 2) We would like to note that the State Land Use District
Boundaries as depicted on exhibit 5 are inaccurately
represented, and should be amended in the final EA.

We have no other comments to offer at this time.

EU:KY:th

WALTER J. CAYETANO
GOVERNOR

BENJAMIN J. CAYETANO
GOVERNOR
SELI F. NAYA
DIRECTOR
RICK EGGER
DEPUTY DIRECTOR

DEPARTMENT OF BUSINESS,
ECONOMIC DEVELOPMENT & TOURISM

Central Pacific Plaza, 220 South King Street, 11th Floor, Honolulu, Hawaii 96813
Mailing Address: P.O. Box 2399, Honolulu, Hawaii 96804

Telephone: (808) 536-2355
Fax: (808) 536-2377

January 18, 1995

RECEIVED

JAN 21 1995

AKINAKA & ASSOCIATES, LTD.

Mr. Henry S. Morita
Executive Vice President
Akinaka & Associates, Ltd.
Consulting Engineers
250 North Beretania Street, Suite 300
Honolulu, Hawaii 96817-4716


Dear Mr. Morita:

The Department of Business, Economic Development, and Tourism is pleased to submit
the enclosed comments on the Draft Environmental Assessment (EA) for Anahola Residence
Lots, Unit 6, Kawaihau, Kauai.

The comments were provided by the Land Use Commission. Questions regarding these
comments may be directed to Esther Ueda, LUC Executive Officer at 587-3826.

Thank you for the opportunity to comment.

Sincerely,


Rick Egger
Interim Director

Enclosure



DEPARTMENT OF BUSINESS,
ECONOMIC DEVELOPMENT & TOURISM

BENJAMIN J. CALETANO
Director
SEIJE NAYA
Director
RICK EGGERD
Deputy Director

ENERGY DIVISION, 395 MERCHANT ST., RM. 110, HONOLULU, HAWAII 96813 PHONE: (808) 587-3800 FAX: (808) 587-3820

EIS 003

January 10, 1995

SUBJECT: Anahola Residence Lots, Unit 6
Tax Map Key: (4)4-8-03: Por 19
A&A Job No: DHHL 93-01
Environment Assessment (Preliminary Draft)

The Energy Division has no comments to offer on the subject Environmental Assessment Preliminary Draft (EAPD). We are returning the EAPD with no comments.



WM. FRANK BRANDT, FASLA
CHAIRMAN

THOMAS S. WITTEN, ASLA
PRESIDENT

R. STAN DUNCAN, ASLA
EXECUTIVE VICE-PRESIDENT

RUSSELL Y.J. CHUNG, ASLA
EXECUTIVE VICE-PRESIDENT

VINCENT SHIGEKUNI
PRINCIPAL

JAMES LEONARD, AICP
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HILO OFFICE

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TEL: (808) 242-2878
FAX: (808) 242-2902
E-MAIL: jormita@lava.net

August 12, 2005

Mr. Anthony Ching
Land Use Commission
Department of Business, Economic Development and Tourism
State of Hawaii
P.O. Box 2359
Honolulu, Hawaii 96804-2359

SUBJECT: ANAHOLA RESIDENCE LOTS UNIT 6 - NOTICE OF REVISED
DRAFT ENVIRONMENTAL ASSESSMENT

Dear Mr. Ching:

Thank you for your letter dated January 11, 1995 regarding the Anahola Residence Lots Unit 6 Draft Environmental Assessment (DEA). A revised DEA is being prepared for the project, which is now proposing 181 single-family residential lots on a 71.3-acre site.

Thank you for your participation in the environmental assessment process. We will provide you with a copy of the revised DEA. If you have any questions, please do not hesitate to contact me.

Sincerely,

PBR HAWAII

Vincent Shigekuni
Vincent Shigekuni
Vice President

cc Henry Morita/Akinaka & Associates, Ltd.

Sam J. Cayetano
GOVERNOR OF HAWAII



STATE OF HAWAII
DEPARTMENT OF HEALTH
KAAUI DISTRICT HEALTH OFFICE
3040 UMI STREET
LILUUE, HAWAII 96765

Lawrence Milke, M.D.
DIRECTOR OF HEALTH

RON METLER, M.D.
DISTRICT HEALTH SERVICES ADMINISTRATOR

RECEIVED

January 19, 1995

JAN 20 1995

AKINAKA & ASSOCIATES, LTD.

Mr. Henry S. Morita
Executive Vice President
Akinaka & Associates, Ltd.
250 North Beretania Street, Suite 300
Honolulu, Hawaii 96817-4716

Dear Mr. Morita:

Subject: Preliminary Draft Environmental Assessment (EA)
for Anahola Residence Lots, Unit 6
Department of Hawaiian Home Lands
A&A Job No: DHHL 93-01
TMK: (4) 4-8-03: Por. 19
Anahola, Kauai, Hawaii

As requested, the subject draft EA has been reviewed by the Kauai District Health Office. We provide the following comments for your consideration.

1. The proposed 250 residential lots subdivision shall be serviced by an on-site or off-site sewage treatment work. The DHHL Anahola - Kamalomalo and Moloaa Development Plan (December 1987) states that "in areas where cesspools are not allowed, the recommended sewer system ... is a primary treatment plant and underground injection well disposal." The use of individual wastewater systems as proposed will not be allowed in accordance with the provisions of Chapter 11-62, Wastewater Systems, Hawaii Administrative Rules. Although the site is designated as Non-Critical Wastewater Disposal Area wherein cesspools and other individual wastewater systems may be utilized, the proposed subdivision does not comply with the 10,000 square feet minimum lot size and the 50 residential lots maximum number of residential lots requirements of Chapter 11-62.

2. Impact to the groundwater quality is listed as one of the probable long term impacts the proposed development may cause. To mitigate the impact, the draft EA states

that "A sewage treatment plant to service the Anahola area is planned for the near future". The document also states that "A variance from stipulations of the Department of Health's Chapter 62 has been requested to increase the number of lots served by individual wastewater systems from 50 units to 250 units." The sewage treatment plant should be installed and made operational prior to or at the completion of the 250 lots development to mitigate the impact to the groundwater. The use of individual wastewater systems may further impact the quality of the groundwater and should not be considered.

3. The application for variance from Chapter 11-62, if sought, should be submitted to the Department of Health for review and action prior to finalizing the EA for submittal to the Office of Environmental Quality Control. The EA should address the possible impacts the individual wastewater systems may cause if the variance is granted.

4. The cleared and grubbed material will be disposed of the landfills according to the draft EA. To minimize or reduce the solid waste stream to the Kekaha landfill, the material should be disposed of at a permitted greenwaste composting facility.

5. Impacts caused by soil erosion and stormwater runoff from the development should be addressed in the EA.

Should you have any questions, please call me at 241-3323.

Sincerely,

Clyde Takekuma

Clyde Takekuma
Chief Sanitarian, Kauai



WM. FRANK BRANDT, FASLA
CHAIRMAN

THOMAS S. WITTEN, ASLA
PRESIDENT

R. STAN DUNCAN, ASLA
EXECUTIVE VICE-PRESIDENT

RUSSELL Y.I. CHUNG, ASLA
EXECUTIVE VICE-PRESIDENT

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PRINCIPAL

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SENIOR ASSOCIATE

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August 12, 2005

Mr. John Hunt, Acting District Health Officer
State of Hawaii
Department of Health
District Health Office
3040 Umi Street
Lihue, Kauai, Hawaii 96766

SUBJECT: ANAHOLA RESIDENCE LOTS UNIT 6 - NOTICE OF REVISED
DRAFT ENVIRONMENTAL ASSESSMENT

Dear Mr. Hunt:

Thank you for your letter dated January 19, 1995 regarding the Anahola Residence Lots Unit 6 Draft Environmental Assessment (DEA). A revised DEA is being prepared for the project, which is now proposing 181 single-family residential lots on a 71.3-acre site.

Thank you for your participation in the environmental assessment process. We will provide you with a copy of the revised DEA. If you have any questions, please do not hesitate to contact me.

Sincerely,

PBR HAWAII


Vincent Shigekuni
Vice President

cc Henry Morita/Akinaka & Associates, Ltd.

BENJAMIN C. VIETANO
GOVERNOR



STATE OF HAWAII
DEPARTMENT OF TRANSPORTATION
869 PUNCHBOWL STREET
HONOLULU, HAWAII 96813-5097

February 27, 1995

IN REPLY REFER TO:
STP 8.6621

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MAR 4 1995

AKINAKA & ASSOCIATES, LTD.

Mr. Henry S. Morita
Executive Vice-President
Akinaka and Associates, Ltd.
250 North Beretania Street, Suite 300
Honolulu, Hawaii 96817-4716

Dear Mr. Morita:

Subject: Draft Environmental Assessment (DEA)
Anahola Residence Lots, Unit 6
A&A Job No. DHIL 93-01

Thank you for your transmittal of January 20, 1995, requesting our review of the subject DEA.

We have the following comments:

1. The developer should be required to submit a Traffic Impact Analysis Report (TIAR) for our review and approval. This report should identify the traffic impacts attributable to the development and any required mitigation measures, particularly at the intersection of the project's access to Kuhio Highway.

The intersection analysis should include, but not be limited to, the provision of ample left-turn storage, acceleration and deceleration, and traffic signalization.
2. Construction of required roadway improvements shall be provided by the developer and completed prior to the implementation of the proposed development.
3. Plans for construction work within the State Highway right-of-way shall be submitted to our Highways Division for review and approval.

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Mr. Henry S. Morita
Page 2
February 27, 1995

STP 8.6621

We appreciate the opportunity to provide comments.

Very truly yours,



KAZU HAYASHIDA
Director of Transportation



WM. FRANK BRANT, FASLA
CHAIRMAN

THOMAS S. WITTEN, ASLA
PRESIDENT

R. STAN DUNCAN, ASLA
EXECUTIVE VICE-PRESIDENT

RUSSELL Y.J. CHUNG, ASLA
EXECUTIVE VICE-PRESIDENT

VINCENT SHIGEKUNI
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August 12, 2005

Mr. Rodney Haraga, Director
State of Hawaii
Department of Transportation
869 Punchbowl Street, Room 509
Honolulu, Hawaii 96813

SUBJECT: ANAHOLA RESIDENCE LOTS UNIT 6 - NOTICE OF REVISED
DRAFT ENVIRONMENTAL ASSESSMENT

Dear Mr. Haraga:

Thank you for your letter dated February 27, 1995 regarding the Anahola Residence Lots Unit 6 Draft Environmental Assessment (DEA). A revised DEA is being prepared for the project, which is now proposing 181 single-family residential lots on a 71.3-acre site.

Thank you for your participation in the environmental assessment process. We will provide you with a copy of the revised DEA. If you have any questions, please do not hesitate to contact me.

Sincerely,

PBR HAWAII


Vincent Shigekuni
Vice President

cc Henry Morita/Akinaka & Associates, Ltd.

MARYANNE W. KUSAKA
MAYOR



COPY
STEVE OLIVER
COUNTY ENGINEER
TELEPHONE 241-6600

EDMOND P.K. RENAUD
DEPUTY COUNTY ENGINEER
TELEPHONE 241-6640

AN EQUAL OPPORTUNITY EMPLOYER
COUNTY OF KAUAI
DEPARTMENT OF PUBLIC WORKS
3021 UMI STREET
LIHUE, KAUAI, HAWAII 96766

PW1.052

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JAN 14 1995

ANAKA & ASSOCIATES, LTD.

January 12, 1995

Mr. Henry Morita
Akinaka and Associates
250 N. Beretania St., Suite 300
Honolulu, Hawaii 96817-4716

Dear Mr. Morita:

RE: PRELIMINARY DRAFT ENVIRONMENTAL ASSESSMENT
ANAHOLA RESIDENCE LOTS UNIT 6

We reviewed your preliminary draft environment assessment for the Anahola Residence Lots Unit 6 as requested by your letter dated December 30, 1994. We would like to offer the following comments:

1. We will at the time the subdivision is submitted to the County offer our comments on the proposed roadway layout and conformance to our roadway design criterias. Our concern would be driveway and intersection sight distance, intersection on curvatures, tangents between curvatures and intersection, curve length, and design speed & curve radius.
2. The subdivision and subsequent development of residences and impermeable surfacing will increase storm runoff. We are presuming that storm flowages will be kept within their existing drainage basin. Additionally, the flowages will drain into lands downstream of the project site which is owned by Hawaiian Homes. However, a study on the impacts of the increased flowages should be made and mitigation measure proposed and constructed if adverse drainage conditions is expected.

Mr. Henry Morita
January 12, 1995
Page 2

3. Existing Ehukai and Kakuihale Road should be evaluated to determine if it is required to be upgraded to meet present County Roadway Standards. Also, consideration should also include the extension of Ehukai Road to connect to Kuhio Highway which will provide a second access for the proposed subdivision and existing residences.

4. While the County of Kauai provides refuse collection and disposal of Solid Wastes, the development of about 280 residential lots will impose additional costs to the County for collection and disposal of solid waste. The County's once a week collection of residential refuse will require an additional one-half crew/day each week to collect the refuse in the proposed subdivision. Additionally, the subdivision will generate an estimated 1200 tons of waste per year, while amounting to only about 1.5% of our yearly collection, will add to the volumes of wastes and the depletion of capacity at the County landfill.

5. Exhibit 4 shows a school and park site. The County presently operates and maintains three parks in the Anahola area. The issue of who will operate and maintain the park site shown on Exhibit 4 needs to be discussed. We would like to see the park be available for public usage but fall under the jurisdiction of the school.

Thank you for the opportunity to offer our comments.

Very truly yours,

STEVE OLIVER
County Engineer

KK/mc



August 12, 2005

Mr. Donald M. Fujimoto, County Engineer
County of Kauai
Department of Public Works
4444 Rice Street, Suite 175
Lihue, Kauai, Hawaii 96766-1340

**SUBJECT: ANAHOLA RESIDENCE LOTS UNIT 6 - NOTICE OF REVISED
DRAFT ENVIRONMENTAL ASSESSMENT**

Dear Mr. Fujimoto:

Thank you for your letter dated January 12, 1995 regarding the Anahola Residence Lots Unit 6 Draft Environmental Assessment (DEA). A revised DEA is being prepared for the project, which is now proposing 181 single-family residential lots on a 71.3-acre site.

Thank you for your participation in the environmental assessment process. We will provide you with a copy of the revised DEA. If you have any questions, please do not hesitate to contact me.

Sincerely,

PBR HAWAII

Vincent Shigekuni
Vince Shigekuni
Vice President

cc Henry Morita/Akinaka & Associates, Ltd.

WM. FRANK BRANDT, FASLA
CHAIRMAN

THOMAS S. WITTEN, ASLA
PRESIDENT

R. STAN DUNCAN, ASLA
EXECUTIVE VICE-PRESIDENT

RUSSELL Y. J. CHUNG, ASLA
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VINCENT SHIGEKUNI
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JAMES LEONARD, AICP
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August 12, 2005

Mr. Edward Tschupp, Manager and Chief Engineer
County of Kauai
Department of Water
3498 Pualoke Street
Lihue, Kauai, Hawaii 96766

**SUBJECT: ANAHOLA RESIDENCE LOTS UNIT 6 - NOTICE OF REVISED
DRAFT ENVIRONMENTAL ASSESSMENT**

Dear Mr. Tschupp:

This is to inform you that a revised Draft Environmental Assessment (DEA) for the Anahola Residence Lots Unit 6 is being prepared. The project is now proposing 181 single-family residential lots on a 71.3-acre site.

We will provide you with a copy of the revised DEA. If you have any questions, please do not hesitate to contact me.

Sincerely,

PBR HAWAII

Vincent Shigekuni
Vince Shigekuni
Vice President

cc Henry Morita/Akinaka & Associates, Ltd.

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August 12, 2005

Mr. Ian Costa, Director
County of Kauai
Planning Department
4444 Rice Street, Suite A473
Lihue, Kauai, Hawaii 96766

**SUBJECT: ANAHOLA RESIDENCE LOTS UNIT 6 – NOTICE OF REVISED
DRAFT ENVIRONMENTAL ASSESSMENT**

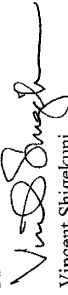
Dear Mr. Costa:

This is to inform you that a revised Draft Environmental Assessment (DEA) for the Anahola Residence Lots Unit 6 is being prepared. The project is now proposing 181 single-family residential lots on a 71.3-acre site.

We will provide you with a copy of the revised DEA. If you have any questions, please do not hesitate to contact me.

Sincerely,

PBR HAWAII


Vincent Shigekuni
Vice President

cc Henry Morita/Akinaka & Associates, Ltd.

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OUOBL161682.16EAREvised Draft EA NoticeBL03 Planning Dept.doc



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PBR HAWAII

**DEPARTMENT OF BUSINESS,
ECONOMIC DEVELOPMENT & TOURISM**

OFFICE OF PLANNING

235 South Beretania Street, 6th Floor, Honolulu, Hawaii 96813
Mailing Address: P.O. Box 2359, Honolulu, Hawaii 96804

Telephone: (808) 587-2846
Fax: (808) 587-2824

LINDA LINGLE
GOVERNOR
THEODORE E. LU
DIRECTOR
MARK K. ANDERSON
DEPUTY DIRECTOR
THOMAS ARIZUMI
LAURA H. THIEL
DIRECTOR
OFFICE OF PLANNING

Ref. No. P-111161

November 4, 2005

Ms. Lacey Kazama
PBR Hawaii
ASB Tower, Suite 650
1001 Bishop Street
Honolulu, Hawaii 96813

Dear Ms. Kazama:

Subject: Anahola Residence Lots Unit 6
Draft Environmental Assessment

The subject project is proposed on 71.3 acres in the makai portion of the Department of Hawaiian Home Lands (DHHL) Anahola/Kamalomaloo planning area. DHHL is planning for 181 single-family residential lots with approximately 12 acres reserved for a potential school.

The DHHL is proposing to expand or improve infrastructure facilities such as roads, drainage systems, water distribution lines, dry sewer lines and power/communication transmission lines.

The State Department of Health requires developments of 50 or more residential lots to be serviced by a wastewater treatment facility. It is our understanding that the DHHL has applied for a variance to allow the use of individual waste disposal systems for each residential lot.

The Draft Environmental Assessment (DEA) states that DHHL properties are not subject to land use controls by the State or County under the provisions of the Hawaiian Homes Commission Act (HHCA), 1920, as amended. Most of the Petition Area is within the State Agricultural District with a small portion adjacent to the existing residential neighborhood within the Urban District.

The DEA states that the proposed project is in compliance with the Kauai General Plan which designates the area as Residential Community.

Ms. Lacey Kazama
November 4, 2005
Page 2

The zoning map provided in the DEA shows most of the subject property zoned Agricultural in general conformity to the State Agricultural District with a strip of Open zone and a small portion of R-4 Residential adjacent to the existing Residential Community.


Anahola is described in the DEA as the largest Hawaiian homestead community on Kauai. Basic infrastructure includes asphalt concrete roads without curbs or sidewalks and overhead power and telephone lines.

The Final Environmental Assessment (FEA) should describe in more detail the existing adjacent residential development constructed in the mid-1970's and how it will be integrated with the proposed development in terms of infrastructure such as drainage and traffic improvements. The impacts of individual wastewater systems for the proposed development should also be discussed on a regional basis since the Petitioner will seek a variance to allow an exemption from building a wastewater treatment facility for the project.

Project impacts and mitigation measures should be more clearly described in terms of proposed solutions on a proportional basis with other developments in the region.

Thank you for the opportunity to comment. Should you have any questions, please call the Land Use Division at 587-2842.

Sincerely,


Laura H. Thiel
Director

c: Anthony Ching, LUC
Rodney Haraga, DOT
Thomas Arizumi, DOH



LINDA LINGLE
GOVERNOR
STATE OF HAWAII

MICAH A. KANE
GOVERNOR
HAWAIIAN HOMES COMMISSION

BEN HENDERSON
DIRECTOR
KAILANA H. PARK
EXECUTIVE ASSISTANT

STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS

P.O. BOX 1879

HONOLULU, HAWAII 96805

November 29, 2005

Ms. Laura H. Thielen

Director

State of Hawaii

Department of Business, Economic Development & Tourism

Office of Planning

P.O. Box 2359

Honolulu, Hawaii 96804-2359

Dear Ms. Thielen:

SUBJECT: Department of Hawaiian Home Lands (DHHL) Anahola
Residence Lots, Unit 6 Draft Environmental Assessment

Thank you for your letter dated November 4, 2005. We offer the following responses to your comments:

1. The Final EA will include the following discussion:

Anahola Residence Lots, Unit 1 includes residential lots located west of the project site, adjacent to Kuhio Highway.

Anahola Residence Lots, Unit 2 includes 58 residential lots located adjacent to and west of the project site.

Anahola Residence Lots, Unit 3 includes 48 residential lots located adjacent and northwest of the project site.

Anahola Residence Lots, Unit 4 includes 90 residential lots located west of the project site and Kuhio Highway.

Anahola Residence Lots, Unit 5 includes 39 residential lots located adjacent and northwest of the project site.

As noted in Section 2.4 of the Draft EA, infrastructure improvements for the proposed project include the extension of Ehuakai Road to provide secondary access to the site and new water transmission lines, drainage facilities, electrical and communication systems, and dry sewer lines. DHHL developments and infrastructure are guided by master plans developed in the 1980s and updated as necessary. The Final EA will note that

such infrastructure is available in adjacent subdivisions and will be extended to the proposed project site.

2. The Anahola region is not currently serviced by a municipal wastewater system. Individual wastewater systems are used in the existing subdivisions with variances granted by the Department of Health. An application for a variance to allow more than 50 individual wastewater systems within the project site has been submitted. Since the surrounding area uses such systems and no new cesspools will be used, no significant impact on existing wastewater systems in the region are anticipated. To assure proper use and operation, the systems will be designed by a licensed engineer and constructed by a licensed contractor. As noted in the Draft EA, the development will connect to a municipal or private sewer system, should one become available to the area. In its comment letter on the Draft EA, the Department of Health Wastewater Branch wrote, "We are pleased to see that dry sewer lines will be put in place for future connection to the County sewer service system."

3. To date, we have received relatively few comments regarding proposed projects and other developments in the region. Comments received to date include:

- A question regarding the source of water;
- A comment on the proposed school site and its suitability to the Department of Education; and
- A few questions on the proposed method of sewage treatment and disposal (such as in your comment letter).

Based on the comments received, the project's potential impact on the areas listed above and mitigation measures will be updated in the Final EA.

Thank you again for your participation in the Environmental Assessment process. If you have any questions regarding this project, please call Kamuela Cobb-Adams of our Land Development Division at 586-3844.

Aloha and mahalo,

Micah A. Kane, Chairman
Hawaiian Homes Commission

cc Henry Morita, Akinaka & Associates, Inc.
Lacey Kazama, PBR HAWAII

LINDA LINGLE
GOVERNOR



STATE OF HAWAII
DEPARTMENT OF BUSINESS, ECONOMIC DEVELOPMENT & TOURISM
LAND USE COMMISSION

P.O. Box 2359
Honolulu, Hawaii 96804-2359
Telephone: 686-587-3822
Fax: 686-587-3827

October 25, 2005

Ms. Lacy Kazama
PBR Hawaii
ASB Tower, Suite 650
1001 Bishop Street
Honolulu, Hawaii 96813

Dear Ms. Kazama:

Subject: Draft Environmental Assessment (DEA) for Anahola Residence Lots, Unit 6

We have reviewed the subject DEA and confirm that the project site, as represented on Figure 4, is designated within the State Land Use Urban and Agricultural Districts.

We have no further comments to offer at this time. Thank you for the opportunity to comment on the subject DEA. Please feel free to contact Bert Saruwatari of my office at 587-3822, should you require clarification or any further assistance.

Sincerely,


ANTHONY J.H. CHING
Executive Officer

c: Office of Environmental Quality Control
Department of Hawaiian Home Lands

ANTHONY J.H. CHING
EXECUTIVE OFFICER

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OCT 27 2005

PBR HAWAII

LINDA LINGLE
GOVERNOR
STATE OF HAWAII



STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS

P.O. BOX 1879
HONOLULU, HAWAII 96805

November 29, 2005

Mr. Anthony J.H. Ching
Executive Officer
State of Hawaii
Department of Business, Economic Development & Tourism
Land Use Commission
P.O. Box 2359
Honolulu, Hawaii 96804-2359

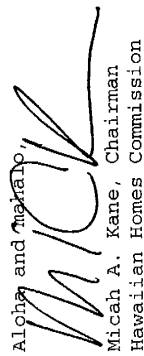
Dear Mr. Ching:

Subject: Department of Hawaiian Home Lands (DHHL) Anahola Residence Lots, Unit 6 Draft Environmental Assessment

Thank you for your letter dated October 25, 2005, confirming that the project site is designated within the State Land Use Urban and Agricultural Districts. We acknowledge that the Land Use Commission has no further comments to offer.

Thank you again for your participation in the Environmental Assessment process. If you have any questions regarding this project, please call Kamuela Cobb-Adams of our Land Development Division at 586-3844.

Aloha and Mahalo,


Micah A. Kane, Chairman
Hawaiian Homes Commission

cc Henry Morita, Akinaka & Associates, Inc.
Lacey Kazama, PBR HAWAII

LINDA LINGLE
GOVERNOR



STATE OF HAWAII
DEPARTMENT OF EDUCATION
P.O. BOX 2960
HONOLULU, HAWAII 96804

PATRICIA HAMAKOTO
SUPERINTENDENT

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NOV 09 2005

PBR HAWAII

OFFICE OF BUSINESS SERVICES

November 7, 2005

Ms. Lacey Kazama
PBR Hawaii
1001 Bishop Street
ASB Tower, Suite 650
Honolulu, Hawaii 96813

Dear Ms. Kazama:

The Department of Education (DOE) has reviewed the Draft Environmental Assessment (DEA) for Anahola Residence Lots, Unit 6 in Anahola. The DOE understands that it is unable to request any mitigation for the school enrollment impact of developing 181 new residential lots. The DOE estimates that approximately 104 students will live in the project when it is complete.

Although the DEA mentions that a 12-acre site has been reserved for a school, there has been no communication on this matter with the DOE. The DOE would be required to pay market rent for a school site owned by the Department of Hawaiian Home Lands, so it would not be a likely site for a new school.

Students living in the proposed Anahola Unit 6 project would attend Kapa'a Elementary, Kapa'a Middle, and Kapa'a High School. The DEA has transposed the enrollment figures for Kapa'a Middle and Kapa'a High School. The middle school had an enrollment last year of 732 students and the high school had an enrollment of 1133.

In analyzing the expected impact of the development of Anahola Unit 6, the DEA mistakenly assumes there would be less impact from the 181 new units because some of the students who will live in Unit 6 already live in the Kapa'a complex of schools. Unless those students' original homes are destroyed, we assume new residents, with children, will inhabit these new homes.

The DEA also assumes that Unit 6 impacts will be reduced because some students will attend schools outside of the Kapa'a complex or will attend private or charter schools. The DOE will be responsible for educating all of the students who will live in Unit 6 for as long as it is habitable. Students may choose to attend other schools, but in the end, only the DOE is required to provide a space for the students anytime it is needed.

We appreciate the opportunity to comment on the DEA. If you have any questions, please call me at 586-3444 or Heidi Meeker of the Facilities Development Branch at 733-4862.

Sincerely,

Rae M. Loui
Rae M. Loui
Assistant Superintendent

RML:ly

cc: Daniel Hamada, CAS, Kapa'a/Kauai/Waimea Complex Area
Genevieve Salmonson, OEQC
Kamuela Cobb-Adams, DHHL

AN AFFIRMATIVE ACTION AND EQUAL OPPORTUNITY EMPLOYER

LINDA LINGLE
STATE OF HAWAII



STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS
P.O. BOX 1879
HONOLULU, HAWAII 96805

November 29, 2005

Ms. Rae M. Loui
State of Hawaii
Department of Education
Office of Business Services
P.O. Box 2360
Honolulu, Hawaii 96804

Dear Ms. Loui:

Subject: Department of Hawaiian Home Lands (DHHL) Anahola Residence Lots, Unit 6 Draft Environmental Assessment

Thank you for your letter dated November 7, 2005. We offer the following responses to your comments:

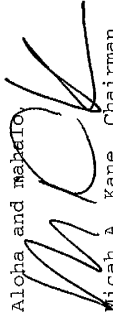
1. The DOE estimates that approximately 104 students will live in the project when it is complete. This estimation was included in the Section 4.2.24 of the Draft EA.
2. A 12-acre school/residential expansion site is proposed in the project. Our staff has previously spoken to the DOE regarding the proposed school. We acknowledge your statement that the proposed site would not be a likely site for a new school if the DOE is required to pay market rent. However, the DHHL is weighing the use of this site by a smaller charter school and residential expansion.
3. The Draft EA inadvertently transposed the enrollment figures for Kapa'a Middle and Kapa'a High School. The Final EA will show that the enrollment of Kapa'a Middle School was 732 students and that of Kapa'a High School was 1,133 students last year.
4. As noted in your letter, new residents may be introduced to the area and enroll at Kapa'a Elementary, Middle, and High

Schools after DHHL beneficiaries move out of their homes and into the Anahola Residence Lots, Unit 6. However, project build-out is expected to occur over five years, and enrollment at these schools has declined since 2001.

5. We acknowledge that the DOE is required to provide space for all students; therefore, we set aside a 12-acre school site on the property. As previously noted, the DHHL is considering use of this site by a smaller charter school and residential expansion. Students living in Anahola Residence Lots, Unit 6 will attend Kapaa Elementary, Middle, and High Schools, private schools, charter schools, or other schools in Kauai.

Thank you again for your participation in the Environmental Assessment process. If you have any questions regarding this project, please call Kamuela Cobb-Adams of our Land Development Division at 586-3844.

Aloha and Mahalo,


Micah A. Kane, Chairman
Hawaiian Homes Commission

cc Henry Morita, Akinaka & Associates, Inc.
Lacey Kazama, PBR HAWAII

LINDA LINGLE
GOVERNOR OF HAWAII



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PBR HAWAII

CHYONGE L. FUKINO, M.D.
DIRECTOR OF HEALTH

STATE OF HAWAII
DEPARTMENT OF HEALTH
P.O. Box 3378
HONOLULU, HAWAII 96801-3378

In reply, please refer to:
EPO-05-098

November 4, 2005

Ms. Lacey Kazama
PBR HAWAII
ASB Tower, Suite 650
1001 Bishop Street
Honolulu, Hawaii 96813

Dear Ms. Kazama:

SUBJECT: Draft Environmental Assessment for the Anahola Residence Lots Unit 6 at
Anahola, Kauai, Hawaii; TMK: 4-8-003: 019, 21, and 03

Thank you for allowing us to review and comment on the subject document. The document was routed to the various branches of the Environmental Health Administration. We have the following Wastewater Branch and Environmental Planning Office comments.

Wastewater Branch

We have reviewed the subject document which proposes to develop 71.3 acres of land in the makai portion of the DHHL's Anahola/Kamalomalo'o planning area. The proposal includes 181 single-family residential lots which include but not limited to drainage systems, water distribution lines and dry sewer lines.

Page 7 states the following:

2.4.2 Wastewater Collection and Transmission

The Anahola region is not currently serviced by a County wastewater treatment system. For development of 50 or more residential lots, the State DOH requires a wastewater treatment facility to service the subdivision. However, the DHHL has applied for variance (Docket No. 04-VWW-02) to allow the use of individual waste disposal systems.

Wastewater Branch's Application for Variance Docket No. 04-VWW-02 refers to Keokea Farm Lots on Maui (WW 150). We have on file Application for Variance WW200, Docket No. 05-VWW-34, Anahola Residence Lots Unit 6 submitted on August 18, 2005 and is currently

pending. A previous Application for Variance was submitted but was withdrawn May 1996 (WW 101 95-VWW-03 Anahola Residence Lots Unit 6).

Our comments are as follow:

The subdivision,consists of 50 lots/dwelling units or more with size of each lot less than an acre. The use of individual wastewater systems is not allowed under provisions of Hawaii Administrative Rules, Chapter 11-62; and

The property is located in the critical wastewater disposal area as determined by the Kauai County Wastewater Advisory Committee. No new cesspools will be allowed in the subject area. Therefore, we concur with the variance request provided that non cesspool individual wastewater systems (IWS) are utilized. Each IWS shall be designed by a licensed engineer, constructed by a licensed contractor and serve no more than five (5) bedrooms or bedroom like rooms.

Therefore, at this writing, we will offer our tentative approval of the said project provided final review is conducted after the ruling for the Application for Variance WW200, Docket No. 05-VWW-34 is decided. We are pleased to see that dry sewer lines will be put in place for future connection to the County sewer service system. We hope that use of recycled wastewater should be encouraged and utilized in major common areas such as parks, golf courses and other open spaces.

All wastewater plans must conform to applicable provisions of the Department of Health's Administrative Rules, Chapter 11-62, "Wastewater System." We do reserve the right to review the detailed wastewater plans for conformance to applicable rules. Should you have any questions, please contact the Planning & Design Section of the Wastewater Branch at (808) 586-4294.

Environmental Planning Office

To facilitate TMDL development and implementation, and to assist with our assessment of the potential impact of proposed actions upon water quality, pollutant loading, and biological resources in receiving waters, we suggest that environmental review documents, permit applications, and related submittals include the following standard information and analyses. Please note that these comments are also listed on our website: www.state.hi.us/health/environmental/env-planning/anduse/anduse.html. We suggest that you also review other Standard Comments on this website.

Waterbody type and class

1. Identify the waterbody type and class, as defined in Hawaii Administrative Rules Chapter 11-54 (<http://www.state.hi.us/health/about/rules/11-54.pdf>), of all potentially affected water bodies. Potentially affected water bodies means those in which proposed project activity would take place and any others that could receive water discharged by the proposed project activity or water flowing down from the proposed site. These waterbodies can be presented as a chain of receiving waters whose top link is the project site upslope and whose bottom link is in Pacific Ocean "oceanic waters," with all receiving waters named according to conventions established by Chapter 11-54 and the *List of Impaired Waters in Hawaii Prepared under Clean Water Act § 303(d)*. For example, a recent project proposed for Nuhelewai Stream, Oahu (a tributary of Kapalama Canal) might potentially affect Nuhelewai Stream, Kapalama Canal, Honolulu Harbor and Shore Areas, and the Pacific Ocean.

Existing water quality management actions

2. Identify any existing National Pollutant Discharge Elimination System (NPDES) permits and related connection permits (issued by permittees) that will govern the management of water that runs off or is discharged from the proposed project site or facility. Please include NPDES and other permit numbers; names of permittees, permitted facilities, and receiving waters (including waterbody type and class as in 1. above); diagrams showing drainage/discharge pathways and outfall locations; and note any permit conditions that may specifically apply to the proposed project.
3. Identify any planning documents, groups, and projects that include specific prescriptions for water quality management at the proposed project site and in the potentially affected waterbodies. Please note those prescriptions that may specifically apply to the proposed project.

Pending water quality management actions

4. Identify all potentially affected water bodies that appear on the current *List of Impaired Waters in Hawaii Prepared under Clean Water Act §303(d)* including the listed waterbody, geographic scope of listing, and pollutant(s) (See Table 5 at <http://www.hawaii.gov/health/environmental/env-planning/wqjm/303dpcfinal.pdf>).
5. If the proposed project involves potentially affected water bodies that appear on the current *List of Impaired Waters in Hawaii Prepared under Clean Water Act §303(d)*, identify and quantify expected changes in the following site and watershed conditions and characteristics
 - surface permeability

Ms. Kazama
November 4, 2005
Page 4

- hydrologic response of surface (timing, magnitude, and pathways)
- receiving water hydrology
- runoff and discharge constituents
- pollutant concentrations and loads in receiving waters
- aquatic habitat quality and the integrity of aquatic biota

Where TMDLs are already established they include pollutant load allocations for the surrounding lands and point source discharges. In these cases, we suggest that the submittal specify how the proposed project would contribute to achieving the applicable load reductions.

Where TMDLs are yet to be established and implemented, a first step in achieving TMDL objectives is to prevent any project-related increases in pollutant loads. This is generally accomplished through the proper application of suitable best management practices in all phases of the project and adherence to any applicable ordinances, standards, and permit conditions. In these cases we suggest that the submittal specify how the proposed project would contribute to reducing the polluted discharge and runoff entering the receiving waters, including plans for additional pollutant load reduction practices in future management of the surrounding lands and drainage/discharge systems.

Proposed Action and Alternatives Considered

We suggest that each submittal identify and analyze potential project impacts at a watershed scale by considering the potential contribution of the proposed project to cumulative, multi-project watershed effects on hydrology, water quality, and aquatic and riparian ecosystems.

We also suggest that each submittal broadly evaluate project alternatives by identifying more than one engineering solution for proposed projects. In particular, we suggest the consideration of "alternative," "soft," and "green" engineering solutions for channel modifications that would provide a more environmentally friendly and aesthetically pleasing channel environment and minimize the destruction of natural landscapes.

Ms. Kazama
November 4, 2005
Page 5

If there are any questions about these comments please contact Jiakai Liu with the Environmental Planning Office at 586-4346.

Sincerely,



HAROLD LAO, ACTING MANAGER
Environmental Planning Office

c: WWB
EPO



LINDA LINGLE
GOVERNOR
STATE OF HAWAII

MICHAEL A. KANE
GOVERNOR
HAWAIIAN HOMES COMMISSION
HENRI HENDERSON
DEPUTY TO THE GOVERNOR
KALIANA HILIPARK
EXECUTIVE ASSISTANT

STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS

P.O. BOX 1879
HONOLULU, HAWAII 96805

November 29, 2005

Mr. Harold Lao
Acting Manager
State of Hawaii
Department of Health
Environmental Planning Office
P.O. Box 3378
Honolulu, Hawaii 96801-3378

Dear Mr. Lao:

Subject: Department of Hawaiian Home Lands (DHHL) Anahola
Residence Lots, Unit 6 Draft Environmental Assessment

Thank you for your letter dated November 4, 2005. We offer
the following responses to the comments from the Wastewater
Branch and your office:

Wastewater Branch

1. The Final EA will list the wastewater variance application
as Docket No. 05-VWM-34.
2. We acknowledge that the property is located in the critical
wastewater disposal area determined by the Kauai County
Wastewater Advisory Committee and that the Wastewater
Branch concurs with the variance request, provided that no
cesspools are utilized. Each individual wastewater system
will be designed by a licensed engineer and constructed by
a licensed contractor. The system will serve no more than
five bedrooms or bedroom-like rooms.
3. We acknowledge your tentative approval of the project,
provided that final review is conducted after the ruling
for the variance application. If R-1 recycled wastewater
is available, it will be used in major common areas and

open spaces where it will not pose risks to health and
safety.

4. All wastewater plans will be prepared by a licensed
engineer and will conform to applicable provisions of the
Department of Health's Administrative Rules, Chapter 11-62,
"Wastewater System". We acknowledge that the Wastewater
Branch reserves the right to review the detailed wastewater
plans for conformance with applicable rules.

Environmental Planning Office

1. Coastal waters and Anahola Stream (perennial) and
Kamalomaloo Stream (intermittent) are located near the
project site. None of these are listed in Chapter 11-54 as
water areas to be protected.
2. An NPDES permit application will be prepared for this
project's construction activity. The application will
include drainage pathways, discharge diagrams, and outfall
locations. Section 3.3 of the Draft EA listed the required
permits and approvals, including building/grading permits,
construction plan approval for water and electrical, and a
variance to allow individual wastewater systems.
3. The Wastewater Branch stated that the project site is
located in the critical wastewater disposal area determined
by the Kauai County Wastewater Advisory Committee. No new
cesspools are allowed in this area, and none are proposed
by this project.
4. Anahola Stream, Kamalomaloo Stream, and coastal waters are
potentially affected water bodies; however, none of these
appear on the List of Impaired Waters in Hawaii Prepared
under Clean Water Act §303(d).
5. The proposed project will not affect any water bodies that
appear on the List of Impaired Waters in Hawaii Prepared
under Clean Water Act §303(d).
6. TMDLs are yet to be established and implemented. During
construction, best management practices will be implemented
to prevent any project-related increases in pollutant
loads. Such practices include the early construction of
drainage control features, construction of temporary and
permanent sediment basins, use of temporary berms and cut-
off ditches, and use of temporary silt fences and sediment


control devices.

7. The project's impact on groundwater resources/hydrology was discussed in Section 4.2.6 of the Draft EA.

8. Section 5.0 of the Draft EA included five project alternatives, including alternative sites, no-action, different designs or details that would present different environmental impacts, actions of a significantly different nature that would provide similar benefits with different environmental impacts, and postponing the action pending further study. Anahola is the largest Hawaiian homestead community in Kauai, and the proposed project would enable the DHHL to develop and deliver land to native Hawaiians.

Thank you again for your participation in the Environmental Assessment process. If you have any questions regarding this project, please call Kamuela Cobb-Adams of our Land Development Division at 586-3844.

Aloha and mahalo,


Micah K. Kane, Chairman
Hawaiian Homes Commission

cc Henry Morita, Akinaka & Associates, Inc.
Lacey Kazama, PBR HAWAII

LINDA LINGLE
GOVERNOR OF HAWAII



GENEVIEVE SALMONSON
DIRECTOR

STATE OF HAWAII
OFFICE OF ENVIRONMENTAL QUALITY CONTROL

235 SOUTH BERETANIA STREET
SUITE 702
HONOLULU, HAWAII 96813
TELEPHONE: (808) 586-4185
FACSIMILE: (808) 586-4186
E-mail: oeq@hawaii.state.hi.us

November 4, 2005

Mr. Micah Kane, Director
Department of Hawaiian Homelands
P.O. Box 1879
Honolulu, Hawaii 96805

Dear Mr. Kane:


Subject: Draft Environmental Assessment Anahola Residence Unit 6

Thank you for the opportunity to review the subject document. We have the following comments.

1. Please describe the reasons for the wastewater variance application to the Department of Health.
2. Please describe mitigation measures to minimize polluted runoff from entering the ocean and nearby streams.
3. Please consult with the Kauai Fire Department.

Should you have any questions, please call Jeyan Thirugnanam at 586-4185.

Sincerely,


Genevieve Salmonson
Director

LINDA LINGLE
GOVERNOR
STATE OF HAWAII



STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS

P.O. BOX 1879
HONOLULU, HAWAII 96805

November 29, 2005

Ms. Genevieve Salmonson
Director
State of Hawaii
Office of Environmental Quality Control
235 South Beretania Street, Suite 702
Honolulu, Hawaii 96813

Dear Ms. Salmonson:

Subject: Department of Hawaiian Home Lands (DHHL) Anahola
Residence Lots, Unit 6 Draft Environmental Assessment

Thank you for your letter dated November 4, 2005. We offer
the following responses to your comments:

1. Although collector sewer lines will be constructed for the
subject project, currently the Anahola region is not
served by a municipal wastewater treatment system. A
wastewater variance is being requested from the Department
of Health to allow individual wastewater systems to be
used, because the development is larger than 50 units which
makes it ineligible to use Individual Wastewater Systems
without a waste water variance.
2. During construction, best management practices will be
implemented to prevent polluted runoff from entering the
ocean and nearby streams. Such practices include the early
construction of drainage control features, construction of
temporary sediment basins, use of temporary berms and cut-
off ditches, and use of temporary silt fences or straw bale
barriers.
3. The County of Kauai Fire Department has been consulted. In
a letter commenting on the Draft EA (letter dated October
31, 2005), the Fire Department stated that it has no
objections to the proposed project and that inspections

MICAH A. KANE
CHAIRMAN
HAWAIIAN HOMES COMMISSION

BENJAMINSON
DEPUTY TO THE CHAIRMAN
KAILANA H. PARK
EXECUTIVE ASSISTANT

would be required in the building phase.

Thank you again for your participation in the Environmental
Assessment process. If you have any questions regarding this
project, please call Kamuela Cobb-Adams of our Land Development
Division at 586-3844.

Aloha and mahalo,

Micah A. Kane, Chairman
Hawaiian Homes Commission

cc Henry Morita, Akinaka & Associates, Inc.
Lacey Kazama, PBR HAWAII

LINDA LINGLE
GOVERNOR OF HAWAII

STATE OF HAWAII
DEPARTMENT OF LAND AND NATURAL RESOURCES

POST OFFICE BOX 621
HONOLULU, HAWAII 96809

HAWAII HISTORIC PRESERVATION
DIVISION REVIEW

Log #: 2005.2058
Doc #: 0510NM05

Applicant/Agency: Lacey Kazama,
For: DDHL,

Address: PBR Hawaii
1001 Bishop Street,
Honolulu, HI 96813-3484

SUBJECT: Chapter 6E-42 Historic Preservation Review - DEA Anahola Residence Lots
Unit 6

Ahupua'a: Anahola
District, Island: Kaula, Kauai
TMK: (4) 4-8-03: 19, 21, 03

1. We believe there are no historic properties present, because:

- ☒ a) intensive cultivation has altered the land
☒ b) residential development/urbanization has altered the land
☒ c) previous grubbing/grading has altered the land
☒ d) an acceptable archaeological assessment or inventory survey found no historic properties
☐ e) other:

2. This project has already gone through the historic preservation review process, and mitigation has been completed.

☒ Thus, we believe that "no historic properties will be affected" by this undertaking

Staff: Nancy McMahon Date: 10/09/05

Title: Archaeologist for Kauai

Cc: OEQC 1808-586-4186
DDHL 1808-586-3923

LINDA LINGLE
GOVERNOR
STATE OF HAWAII

STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS

P.O. BOX 1879
HONOLULU, HAWAII 96805

November 29, 2005

Ms. Nancy McMahon
State of Hawaii
Department of Land and Natural Resources
Historic Preservation Division
P.O. Box 621
Honolulu, Hawaii 96809

Dear Ms. McMahon:

Subject: Department of Hawaiian Home Lands (DHHL) Anahola
Residence Lots, Unit 6 Draft Environmental Assessment

Thank you for your letter dated October 3, 2005. We acknowledge that the Historic Preservation Division believes that there are no historic properties present, and that no historic properties will be affected by this undertaking.

Thank you again for your participation in the Environmental Assessment process. If you have any questions regarding this project, please call Kamuela Cobb-Adams of our Land Development Division at 586-3844.

Aloha and mahalo,

Micah A. Kane
Micah A. Kane, Chairman
Hawaiian Homes Commission

cc Henry Morita, Akinaka & Associates, Inc.
Lacey Kazama, PBR HAWAII

MICAH A. KANE
CHAIRMAN
HAWAIIAN HOMES COMMISSION
BEN HENDERSON
DEPUTY TO THE CHAIRMAN
KAULANA H. PARK
EXECUTIVE ASSISTANT

PHONE (808) 594-1885

FAX (808) 594-1885



STATE OF HAWAII
OFFICE OF HAWAIIAN AFFAIRS
711 KAPIOLANI BOULEVARD, SUITE 500
HONOLULU, HAWAII 96813

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NOV 08 2005

PBR HAWAII



LINDA LINGLE
STATE OF HAWAII

MICHAEL A. KANE
HAWAIIAN HOMES COMMISSION
BENJAMIN HENDERSON
DEPUTY TO THE CHAIRMAN
KAULANA H. PARK
EXECUTIVE ASSISTANT

STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS

P.O. BOX 1879
HONOLULU, HAWAII 96805

November 3, 2005

Lacey Kazama
PBR Hawaii
ASB Tower, Suite 650
1001 Bishop Street
Honolulu, HI 96813

RE: Draft Environmental Assessment for the Proposed Anahola Residence Lots, Unit 6,
Anahola, Kaua'i, TMK 4-8-03: 03(por.), 19(por.), and 21(por.).

Dear Lacey Kazama,

The Office of Hawaiian Affairs (OHA) is in receipt of your September 30, 2005 request for comment on the above listed proposed project, TMK 4-8-03: 03(por.), 19(por.), and 21(por.). OHA offers the following comments:

Subsurface archaeological features, including human burials, have been encountered even in heavily developed areas in the State of Hawai'i. Our staff recommends that some form of subsurface testing take place prior to ground altering activities on the parcel. The potential adverse effects could also be mitigated through archaeological monitoring of ground altering activities. Thank you for your correspondence, our staff looks forward to reviewing the Final Environmental Assessment when completed.

OHA further requests your assurances that if the project goes forward, should iwi or Native Hawaiian cultural or traditional deposits be found during ground disturbance, work will cease, and the appropriate agencies will be contacted pursuant to applicable law.

Thank you for the opportunity to comment. If you have further questions or concerns, please contact Jesse Yoreck at (808) 594-0239 or jessy@oha.org.

'O wau iho nō,

Clyde W. Namu'o

Clyde W. Namu'o
Administrator

CC: Office of Environmental Quality Control
235 South Beretania Street, Suite 702
Honolulu, HI 96813

Kamuela Cobb-Adams
Department of Hawaiian Home Lands
P.O. Box 1879
Honolulu, HI 96805

November 29, 2005

Mr. Clyde W. Namu'o
Administrator
State of Hawaii
Office of Hawaiian Affairs
711 Kapiolani Boulevard, Suite 500
Honolulu, Hawaii 96813

Dear Mr. Namu'o:


Subject: Department of Hawaiian Home Lands (DHHL) Anahola
Residence Lots, Unit 6 Draft Environmental Assessment

Thank you for your letter dated November 3, 2005. We offer the following responses to your comments:

1. The site was used in the past for sugarcane production, which disturbed the land. An archaeological field inspection and report (Appendix A of the Draft EA) concluded that there is little or no potential for subsurface properties. The State Historic Preservation Division (SHPD) has reviewed the Anahola Residence Lots, Unit 6 Draft Environmental Assessment and Subdivision Application. SHPD has made initial recommendations in response to the Subdivision Application and DHHL intends to comply with all SHPD comments and recommendations throughout the Subdivision approval and development of the subject project.

2. Should iwi or Native Hawaiian cultural or traditional deposits be found during ground disturbance, work will cease and the appropriate agencies will be contacted.

Thank you again for your participation in the Environmental Assessment process. If you have any questions regarding this project, please call Kamuela Cobb-Adams of our Land Development Division at 586-3844.

Aloha and mahalo,

Micah A. Kane, Chairman
Hawaiian Homes Commission

cc Henry Morita, Akinaka & Associates, Inc.
Lacey Kazama, PBR HAWAII



Water has no substitute.....Conserve it

RECEIVED

NOV 08 2005

PBR HAWAII

November 4, 2005

PBR HAWAII
ASB Tower, Suite 650
1001 Bishop Street
Honolulu, HI 96813

Dear PBR Hawaii:

Subject: Draft Environmental Assessment, Anahola Residence Lots, Unit 6
Subdivision, TMK: 4-8-03:003, 019; and Por. 021, Anahola, Kaua'i,
Hawai'i

Please revise section 2.4.1, titled "Water Supply and Distribution" of the Draft Environmental Assessment dated September 2005, to reflect that the County currently operates the Anahola Water System which includes two wells and two storage tanks.

Currently, the existing well source facilities are at capacity. Additional source facilities must be provided for the proposed subdivision.

If you have any questions, please contact Mr. Keith Aoki at (808) 245-5418.

Sincerely,



Gregg Fujikawa
Chief of Water Resources and Planning

Kauai
Anahola residence lots unit 6

c: Office of Environmental Quality Control



LINDA LINGLE
DEPUTY CHIEF OF BUREAU
STATE OF HAWAII

MICAH A. KANE
HAWAIIAN HOMES COMMISSION
DEPUTY TO THE CHAIRMAN
KAILASHA B. PARK
EXECUTIVE ASSISTANT

STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS

P.O. BOX 1879
HONOLULU, HAWAII 96805

November 29, 2005

Mr. Greg Fujikawa
Chief of Water Resources and Planning
County of Kauai
Department of Water
P.O. Box 1706
Lihue, Hawaii 96766

Dear Mr. Fujikawa:

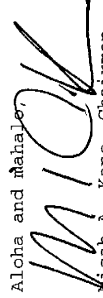
Subject: Department of Hawaiian Home Lands (DHHL) Anahola
Residence Lots, Unit 6 Draft Environmental Assessment

Thank you for your letter dated November 4, 2005. We offer the following responses to your comments:

1. Section 2.4.1 will be revised to reflect that the County currently operates the Anahola water system, which includes two DHHL wells covered under prior agreements.
2. We understand that existing well source facilities are currently at capacity and additional source facilities are being considered by the County.

Thank you again for your participation in the Environmental Assessment process. If you have any questions regarding this project, please call Kamuela Cobb-Adams of our Land Development Division at 586-3844.

Aloha and Mahalo,


Micah A. Kane, Chairman
Hawaiian Homes Commission

cc Henry Morita, Akinaka & Associates, Inc.
Lacey Kazama, PBR HAWAII

Bryan J. Baptiste
Mayor



COUNTY OF KAUAI
Fire Department
Mo'ikeha Building
4444 Rice Street, Suite 255
Lihue, Hawaii 96766

October 31, 2005

PBR Hawaii
ASB Tower, Suite 650
1001 Bishop Street
Honolulu, Hawaii 96813

Ms. Lacey Kazama,

Re: Anahola Residence Lots, Unit 6. TMK 4-8-03:03(portion), 19(portion), and 21(portion).

The Kauai Fire Department has reviewed the Draft Environmental Assessment prepared by PBR Hawaii. We have no objections to this Project. There will be required inspections in the building phase of the project. We look forward to being of assistance.

If you have any questions, you can reach me at the Prevention Bureau. Our number is 808-241-6511.

Respectfully,



David Bukoski
Fire Prevention Captain



Robert Westerman
Fire Chief

Robert Westerman
Fire Chief

RECEIVED

NOV 08 2005

PBR HAWAII

An Equal Opportunity Employer



LINDA LINGLE
GOVERNOR
STATE OF HAWAII

MICAH A. KANE
HAWAIIAN HOMES COMMISSION
CHAIRMAN
IDENTITY TO THE CHAIRMAN
KAILASHA M. PARKS
EXECUTIVE ASSISTANT

STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS

P.O. BOX 1879
HONOLULU, HAWAII 96803

November 29, 2005

Mr. Robert Westerman, Fire Chief
Mr. David Bukoski, Fire Prevention Captain
County of Kauai
Fire Department
Moikeha Building
4444 Rice Street, Suite 295
Lihue, Hawaii 96766


Dear Chief Westerman and Captain Bukoski:

SUBJECT: Department of Hawaiian Home Lands (DHHL) Anahola
Residence Lots, Unit 6 Draft Environmental Assessment

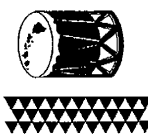
Thank you for your letter dated October 31, 2005. We acknowledge that the Fire Department has no objections to the project and that inspections will be required in the building phase.

Thank you again for your participation in the Environmental Assessment process. If you have any questions regarding this project, please call Kamuela Cobb-Adams of our Land Development Division at 586-3844.

Aloha and mahalo,


Micah A. Kane, Chairman
Hawaiian Homes Commission

cc Henry Morita, Akinaka & Associates, Inc.
Lacey Kazama, PBR HAWAII



Sandwich Isles
Communications, Inc.

A Waipuna Company

To: Lacey Kazama
Fax:
From: Rodney Kaulupali
Phone: 808-524-8400
Date: October 13, 2005
Fax: 808-599-4653
Subject: Comments to Anahola Residence Lots, Unit 6
Draft EA
Pages: 1

Lacey:

I would like to provide minor comments to the section on Communications Facilities:

Communications Facilities: *Sandwich Isles Communications, Inc.* (SIC) has an exclusive license to provide telecommunication services to new developments on Hawaiian Home Lands. All telecommunication infrastructure (i.e., underground conduits, handholes, and cabling) will be installed by SIC, at no cost to the DHHL and will be connected to SIC's Anahola Central Office Building (which is located mauka of the project site and Kuhio Highway). SIC will run ~~fiber-optic~~ cabling to each home to provide telephone and high-speed internet service. SIC will coordinate with Oceanic Cable to provide cable television service through the same underground conduits. The proposed project is not expected to adversely affect SIC or other SIC service areas.

LINDA LINGLE
GOVERNOR
STATE OF HAWAII



STATE OF HAWAII
DEPARTMENT OF HAWAIIAN HOME LANDS

P.O. BOX 1879

HONOLULU, HAWAII 96805

MICAH A. KANE
CHAIRMAN
HAWAIIAN HOMES COMMISSION
BEN HENDERSON
DEPUTY TO THE CHAIRMAN
KAULANA K. PARK
EXECUTIVE ASSISTANT

November 29, 2005

Mr. Rodney Kaulupali
Sandwich Isles Communications, Inc.
1001 Bishop Street
Paahā Tower, 27th Floor
Honolulu, Hawaii 96813

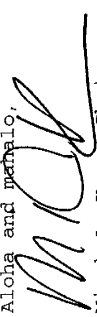
Dear Mr. Kaulupali:

Subject: Department of Hawaiian Home Lands (DHHL) Anahola
Residence Lots, Unit 6 Draft Environmental Assessment

Thank you for your letter dated October 13, 2005. Your
suggested revisions to the Communications Facilities section
will be made in the Final EA.

Thank you again for your participation in the Environmental
Assessment process. If you have any questions regarding this
project, please call Kamuela Cobb-Adams of our Land Development
Division at 586-3844.

Aloha and mahalo.


Micah A. Kane, Chairman
Hawaiian Homes Commission

cc Henry Morita, Akinaka & Associates, Inc.
Lacey Kazama, PBR HAWAII

8.0 REFERENCES

- Baker, H.L. et al. (1965). *Detailed Land Classification, Island of Hawaii*. L.S. Land Study Bureau, University of Hawai'i. Honolulu, Hawai'i.
- County of Kaua'i Planning Department. (November 2000). *Kaua'i General Plan*. Lihu'e, Kaua'i.
- Group 70. (May 2004). *Kaua'i Island Plan*. Report prepared for the State of Hawai'i Department of Hawaiian Home Lands. Honolulu, Hawai'i.
- Hawai'i, State of. Department of Agriculture. (1977). *Agricultural Lands of Importance to the State of Hawaii*. Honolulu, Hawai'i.
- Office of Hawaiian Affairs. (June 2002). *Native Hawaiian Data Book*. Honolulu, Hawai'i.
- PBR Hawaii. (September 2005). *Anahola Residence Lots, Unit 6 Draft Environmental Assessment*. Report prepared for the State of Hawai'i Department of Hawaiian Home Lands. Honolulu, Hawai'i.
- PBR Hawaii. (April 2005). *DHHL East Kapolei Development Parcel B Final Environmental Assessment*. Report prepared for the State of Hawai'i Department of Hawaiian Home Lands. Honolulu, Hawai'i.
- PBR Hawaii. (September 2000). *Sandwich Isles Communications, Inc. Anahola Central Office Building Final Environmental Assessment*. Report prepared for Sandwich Isles Communications, Inc. Honolulu, Hawai'i.
- PBR Hawaii. (June 2005). *Waiohuli Homestead Community Draft Environmental Assessment*. Report prepared for the State of Hawai'i Department of Hawaiian Home Lands. Honolulu, Hawai'i.
- SMS Research & Marketing Services, Inc. (2004) *DHHL Applicant Survey, 2003*. Report prepared for the State of Hawai'i Department of Hawaiian Home Lands. Honolulu, Hawai'i.
- SMS Research & Marketing Services, Inc. (2003) *Beneficiaries Surveys 2003 – Island of Kaua'i*. Report prepared for the State of Hawai'i Department of Hawaiian Home Lands. Honolulu, Hawai'i.

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APPENDIX | A

ARCHAEOLOGICAL FIELD INSPECTION AND LETTER REPORT

Cultural Surveys Hawai'i Inc.

Archaeological and Cultural Impact Studies
Hallett H. Hammatt, Ph.D., President



Providing Excellence in Cultural Resource Management

September 20, 2005

Mr. Vincent Shigekuni
PBR Hawaii
1001 Bishop Street, Suite 650
Honolulu HI 96813

Subject: Archaeological letter report concerning the Anahola
Residence Lots, Unit 6, Anahola Ahupua'a, Ko'olau
District, Island of Kaua'i [TMK (4) 4-8-003; Por. 3, 19, &
21]

Dear Mr. Shigekuni:

At the request of PBR Hawaii, Cultural Surveys Hawai'i, Inc. has completed this letter report on archaeological concerns for the Anahola Residence Lots, Unit 6, a 71.3-acre project site in Anahola Ahupua'a, Ko'olau District, on the Island of Kaua'i (TMK: (4) 4-8-003; Por. 3, 19, & 21). Procedures undertaken for this letter report include brief reviews of historic documentation and previous archaeological investigation of Anahola Ahupua'a, and a field inspection of the project site.

Although this level of research is not intended to fulfill the DLNR/SHPD requirements for archaeological inventory surveys (per Hawai'i Administrative Rules Chapter 13-276), the information in this letter should assist in project planning and project related historic preservation consultation.

A. Historic Documentation of Anahola Ahupua'a

Mid-19th century Māhele documents suggest that traditional Hawaiian settlement of Anahola focused on the delta plains of Anahola Valley where Anahola Stream supplied water for taro *lo'i* that stretched from the coast to over two miles inland. Following the Māhele, private land ownership began to change land usages. In 1877 Makee Sugar Company moved into Anahola as the sugar industry was beginning to take off. The Makee fields in Anahola were located on the southern side of Anahola stream and in the delta areas. In 1934, the Lihue Plantation Company absorbed Makee Sugar Company. Lihue Plantation itself ceased operating at the end of the 20th century. The plantation's fields in Anahola that were formerly Crown Lands reverted to the Department of Hawaiian Home Lands.

Vincent Shigekuni, PBR Hawaii

9/20/2005

Page 2

B. Previous Archaeological Investigation of Anahola

The archaeological investigation most relevant to the present project site is Wendell Bennett's survey of Kaua'i Island completed during the early decades of the 20th century (*The Archaeology of Kaua'i*, Bishop Museum Bulletin 80, Honolulu, HI., 1931). Of Bennett's five sites in the Anahola area, only Aikanaka Heiau, as located and described by Bennett, is in any proximity to the present project site. Bennett describes the heiau as:

Site 113: Aikanaka heiau, at Anahola Point near the end of the bluff on the south side of the bay. Described by Thrum as "A small heiau, about 40 feet in size. All destroyed." One large rock marks the spot of this heiau in the cane field. (Bennett 1931: 129)

C. Field Inspection Results

The project site was inspected by Cultural Surveys Hawai'i, Inc. on September 13, 2005. The inspection involved a walk through of the project site and an examination of the project site boundaries by vehicle. Visibility of the ground surface throughout the project site was excellent as the vegetation is low grass and much of it is in active pasture.

No surface historic properties related to traditional Hawaiian culture were located during the inspection and there is little or no potential for subsurface properties as the entire area was in long term use for sugarcane cultivation and was plowed repeatedly. Evidence of the former use for cane cultivation is indicated in the remnants of plastic irrigation tubing. (No plantation-era structures – such as ditches, wells, flumes – were noted).

It has been noted that area residents have referred to a heiau on or near the project site. This heiau would appear to be Aikanaka heiau identified by Wendell Bennett early in the 20th century, located on the south point of Anahola Bay, i.e. Kahala Point. This heiau site is nearly 2000 feet north of the project site.

D. Conclusions

Based on the results of the background research and field inspection, the project site has no archaeological potential and no further investigation is warranted.

Sincerely,

Hallett H. Hammatt, Ph.D.

9/20/2005



Figure 1. Project Site showing low grass and adjacent houses; view to north

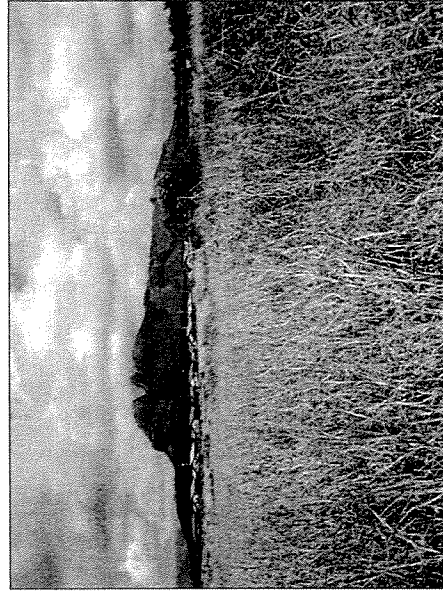


Figure 2. Project site showing Pu'u Konanae in background; view to northwest

9/20/2005

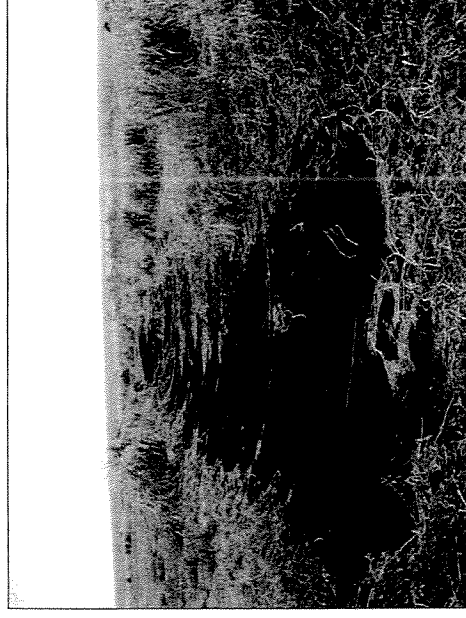


Figure 3. Project site showing drainage between fields; view to east

APPENDIX | B

CORRESPONDENCE WITH THE U.S. FISH AND WILDLIFE SERVICE



LAND PLANNING
LANDSCAPE ARCHITECTURE
ENVIRONMENTAL STUDIES

WM. FRANK BRANDT, FASLA
CHAIRMAN

THOMAS S. WITTEN, ASLA
PRESIDENT

R. STAN DUNCAN, ASLA
EXECUTIVE VICE-PRESIDENT

RUSSELL Y.J. CHUNG, ASLA
EXECUTIVE VICE-PRESIDENT

VINCENT SHIGEKIMI
PRINCIPAL

JAMES LEONARD, AICP
PRINCIPAL
Hilo Office

GRANT MURAKAMI, AICP
SENIOR ASSOCIATE

TOM SCHNEEL, AICP
ASSOCIATE

RAYMOND T. HIO, ASLA
ASSOCIATE

KEVIN NISHIKAWA, ASLA
ASSOCIATE

HONOLULU OFFICE
1001 KIRIA STREET
SUITE 200
HONOLULU, HAWAII 96813-3484
TEL: (808) 521-5631
FAX: (808) 523-1402
E-MAIL: syadtime@pbhawaii.com

Hilo Office
101 ALAN STREET
SUITE 310
HILO, HAWAII 96720-4262
TEL: (808) 961-3333
FAX: (808) 961-4999
E-MAIL: pbhilo@lva.net

WAILUKU OFFICE
2125 KAOHI STREET
WAILUKU, HAWAII 96793-2204
TEL: (808) 242-2876
FAX: (808) 242-2902
E-MAIL: pbmaui@lva.net

August 23, 2005

Mr. Patrick Leonard, Field Supervisor
United States Fish and Wildlife Service
300 Ala Moana Boulevard, Room 3-122
Honolulu, Hawaii 96850

**SUBJECT: DEPARTMENT OF HAWAIIAN HOME LANDS ANAHOLA
RESIDENCE LOTS UNIT 6 - ENVIRONMENTAL
ASSESSMENT**

Dear Mr. Leonard:

The State of Hawaii Department of Hawaiian Home Lands (DHHL) proposes a single-family residential development in Anahola, Kauai. The project site is identified as TMK 4-8-03: 19 (portion), 21 (portion), and 03 (portion) and shown in the enclosed maps.

Using the State GIS database based on USFWS surveys, we have determined that the project site is not a critical habitat. Please verify the accuracy of the enclosed map of critical habitats and the absence/presence of any endangered species.

Thank you for your assistance. If you have any questions on the project, please contact me at 521-5631.

Sincerely,

PBR HAWAII

Lacey Kazama
Lacey Kazama
Planner

Enclosures:

- Location Map
- Tax Map Key
- Critical Habitats Map

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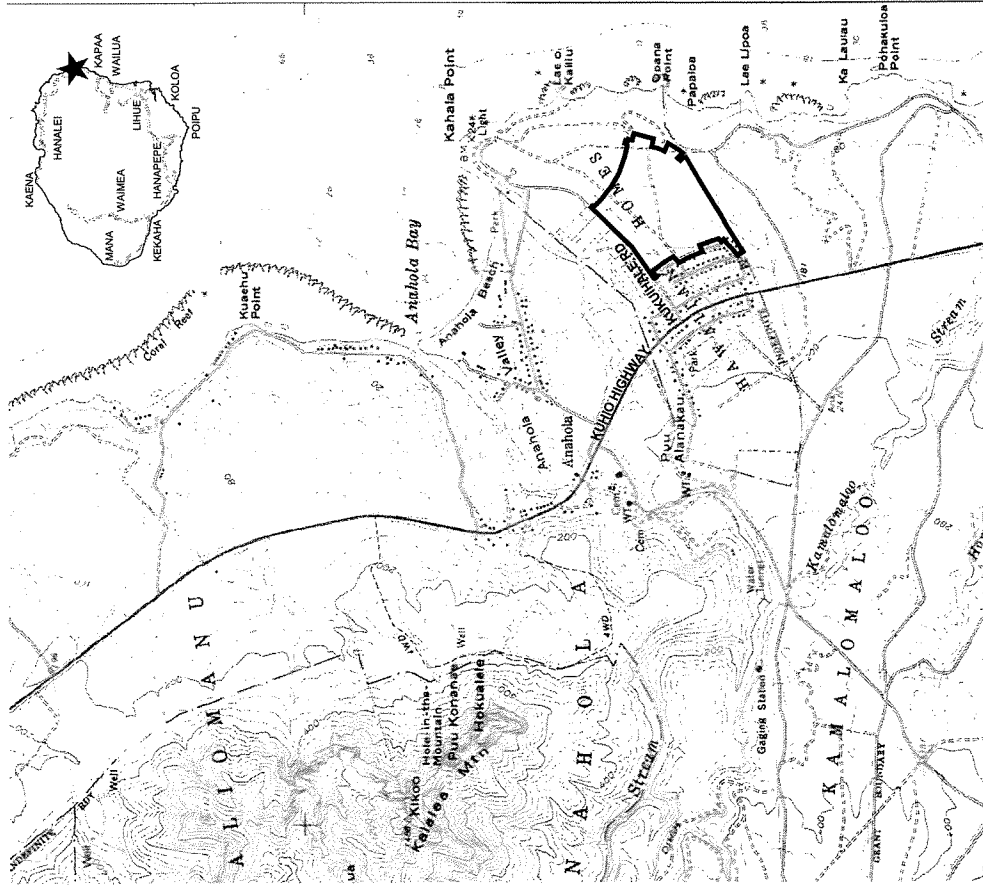
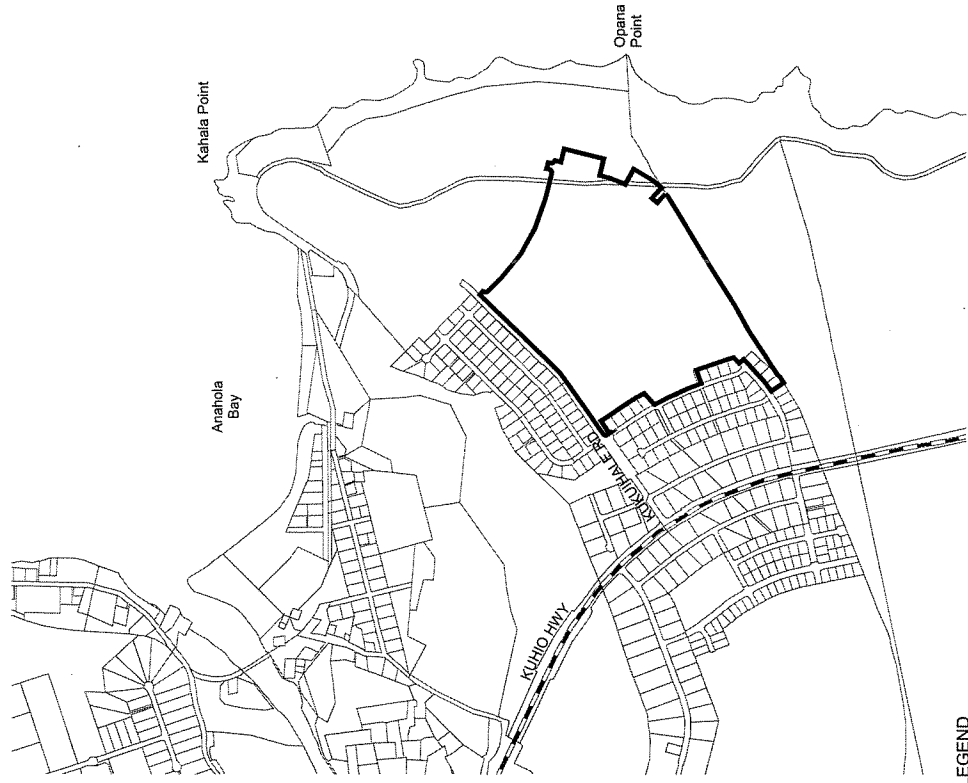
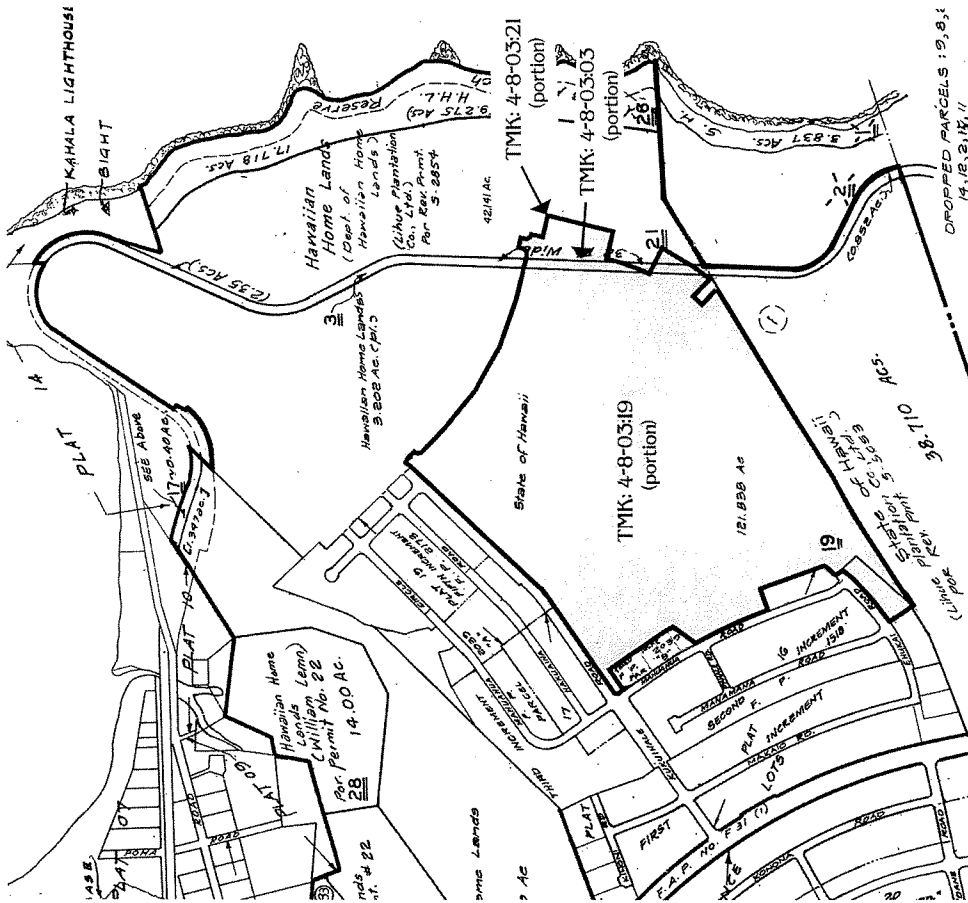


Figure 1
Location Map
Anahola Residence Lots, Unit 6
DEPARTMENT OF HAWAIIAN HOME LANDS
ISLAND OF KAUAI
GRAPHIC SCALE (FEET)
0 1000 2000 4000
PBR
HAWAII





United States Department of the Interior

FISH AND WILDLIFE SERVICE
Pacific Islands Fish and Wildlife Office
300 Ala Moana Boulevard, Room 3-122, Box 50088
Honolulu, Hawaii 96850



SEP 13 2005

SEP 12 2005

In Reply Refer To:
1-2-2005-TA-364

Ms. Lacey Kazama
PBR Hawaii
1001 Bishop Street
ASB Tower, Suite 650
Honolulu, Hawaii 96813-3484

Dear Ms. Kazama:

Thank you for your letter dated August 23, 2005, requesting verification of the absence of listed species or designated critical habitat in the vicinity of the proposed project to develop single-family residences on portions of TMK #s (4) 4-8-03:03, :19, and :21 in Anahola, Hawaii. We received your letter on August 24, 2005.

Based on our review of the information you provided, and pertinent information in our files, including data compiled by the Hawaii Biodiversity and Mapping Program, to the best of our knowledge no endangered, threatened, or candidate species occur in the project area. There is no proposed or final critical habitat in the project area.

We appreciate your efforts to conserve listed species. If you have any questions, please contact Christa Russell, Plant Conservation Program Coordinator (phone: 808/792-9400; fax 808/792-9580).

Sincerely,

Patrick Leonard
Field Supervisor

TAKE PRIDE
IN AMERICA

APPENDIX | C

ENVIRONMENTAL DATA RESOURCES RADIUS MAP REPORT

The EDR Radius Map™ Report

TMK 4-8-3:19 Portion
TMK 4-8-3:19 Portion
KAPAA, HI 96746

Inquiry Number: 1493576.1s

August 22, 2005



The Standard in Environmental Risk Management Information

440 Wheelers Farms Road
Milford, Connecticut 06460

Nationwide Customer Service

Telephone: 1-800-352-0050
Fax: 1-800-231-6802
Internet: www.edrnet.com

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GEOCHECK ADDENDUM

GeoCheck - Not Requested

Thank you for your business.
Please contact EDR at 1-800-352-0050
with any questions or comments.

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EXECUTIVE SUMMARY

A search of available environmental records was conducted by Environmental Data Resources, Inc. (EDR). The report meets the government records search requirements of ASTM Standard Practice for Environmental Site Assessments, E 1527-00. Search distances are per ASTM standard or custom distances requested by the user.

TARGET PROPERTY INFORMATION

ADDRESS

TMK 4-8-3:19 PORTION
KAPAA, HI 96746

COORDINATES

Latitude (North): 22° 13' 30.00" - 22° 8' 17.9"
Longitude (West): 159° 29' 20.00" - 159° 17' 57.1"
Universal Transverse Mercator: Zone 4
UTM X (Meters): 469145.8
UTM Y (Meters): 2448022.0
Elevation: 94 ft. above sea level

USGS TOPOGRAPHIC MAP ASSOCIATED WITH TARGET PROPERTY

Target Property: N/A
Source: USGS 7.5 min quad index

TARGET PROPERTY SEARCH RESULTS

The target property was not listed in any of the databases searched by EDR.

DATABASES WITH NO MAPPED SITES

No mapped sites were found in EDR's search of available ("reasonably ascertainable") government records either on the target property or within the ASTM E 1527-00 search radius around the target property for the following databases:

FEDERAL ASTM STANDARD

NPL..... National Priority List
Proposed NPL..... Proposed National Priority List Sites
CERCLIS..... Comprehensive Environmental Response, Compensation, and Liability Information System
CERC-NFRAP..... CERCLIS No Further Remedial Action Planned
CORRATS..... Corrective Action Report
RCRA-TSDF..... Resource Conservation and Recovery Act Information
RCRA-LQG..... Resource Conservation and Recovery Act Information
RCRA-SQG..... Resource Conservation and Recovery Act Information
ERNS..... Emergency Response Notification System

STATE ASTM STANDARD

SHWS..... Sites List

EXECUTIVE SUMMARY

SWF/ILF..... Permitted Landfills in the State of Hawaii
LUST..... Leaking Underground Storage Tank Database
UST..... Underground Storage Tank Database
VCP..... Voluntary Response Program Sites

FEDERAL ASTM SUPPLEMENTAL

CONSENT..... Superfund (CERCLA) Consent Decrees
ROD..... Records Of Decision
Delisted NPL..... National Priority List Deletions
FINDS..... Facility Index System/Facility Registry System
HMIRS..... Hazardous Materials Information Reporting System
MLTS..... Material Licensing Tracking System
MINES..... Mines Master Index File
NPL Liens..... Federal Superfund Liens
PADS..... PCB Activity Database System
US ENG CONTROLS..... Engineering Controls Sites List
ODL..... Open Dump Inventory
UNITRA..... Uranium Mill Tailings Sites
FUDS..... Formerly Used Defense Sites
INDIAN RESERV..... Indian Reservations
DOD..... Department of Defense Sites
RAATS..... RCRA Administrative Action Tracking System
TRIS..... Toxic Chemical Release Inventory System
TSCA..... Toxic Substances Control Act
SSTS..... Section 7 Tracking Systems
FTTS INSP..... FIFRA/TSCA Tracking System - FIFRA (Federal Insecticide, Fungicide, & Rodenticide Act)/TSCA (Toxic Substances Control Act)

STATE OR LOCAL ASTM SUPPLEMENTAL

SPILLS..... Release Notifications

EDR PROPRIETARY HISTORICAL DATABASES

Coal Gas..... Former Manufactured Gas (Coal Gas) Sites

BROWNFIELDS DATABASES

US BROWNFIELDS..... A Listing of Brownfields Sites
US INST CONTROL..... Sites with Institutional Controls
BROWNFIELDS..... Brownfields Sites
INST CONTROL..... Sites with Institutional Controls
VCP..... Voluntary Response Program Sites

SURROUNDING SITES: SEARCH RESULTS

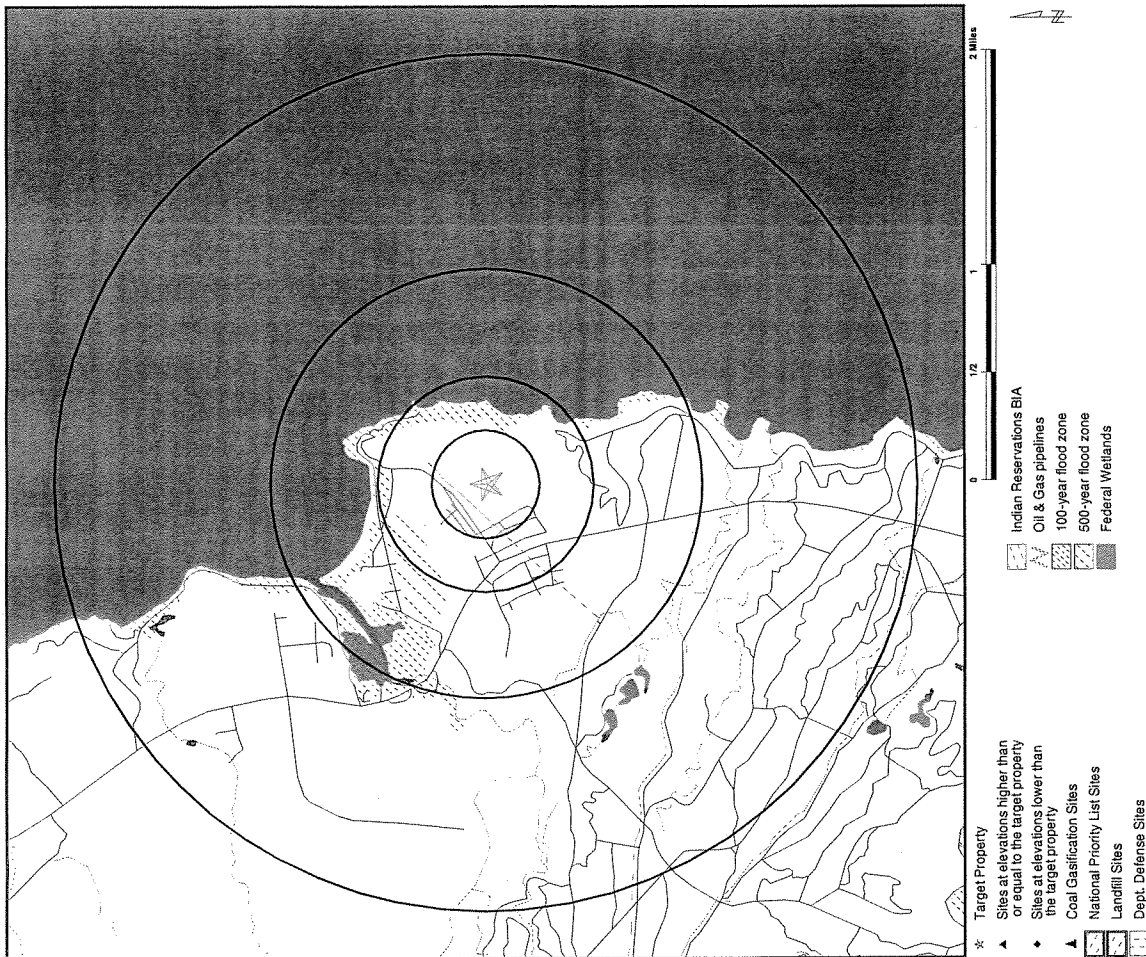
Surrounding sites were not identified.
Unmappable (orphan) sites are not considered in the foregoing analysis.

EXECUTIVE SUMMARY

Due to poor or inadequate address information, the following sites were not mapped:

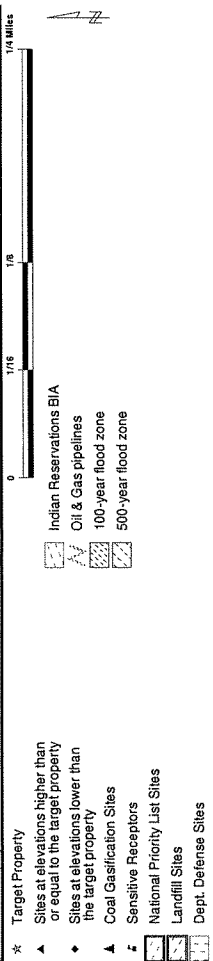
Site Name	Database(s)
KAUAI COAST RESORT AT THE BEACHBOY	SHWS
NONOU WELLS 9-1-A & 9-1-B	SHWS, FINDS
COUNTY OF KAUAI, PW KAPAA BASEYARD	SHWS, FINDS
MAKALEHA TANK	SHWS
KAWAIHAU ROAD	SHWS
WAILUA HOMESTEAD WELLS 0421-01 & 02	SHWS, FINDS
KAUAI ELECTRIC, TRANSFORMER KAPAA	SHWS, FINDS
KAPAA SUPER SERVICE	SHWS
CHEVRON LEONARD'S KAPAA	SHWS
COCO PALMS RESORT	SHWS
KAPAA POST OFFICE	SHWS
KAUAI ELECTRIC, TRANSFORMER MOAKEA CANAL	SHWS
KUHIO HIGHWAY OFF SCENIC POINT, UNKNOWN BROWN SHEE	SHWS
LEONARD'S, INC	SHWS
NO-DELAY SERVICE STATION WAIPOULI	SHWS
NON SITE SPECIFIC	SHWS
RAINBOW GAS MART	SHWS, SPILLS
KAPAA HIGH SCHOOL GASOLINE SPILL	SHWS, FINDS
NONOU WELL 9-1-C - 0321-01	SHWS
WAIPOLE (WAIPOULI?) FUGITIVE DUMPING	SHWS, SPILLS
ALAMAMU BEACHKAPAA FIRE STATION C	SHWS
KAUAI AGRICULTURAL RESEARCH CENTER (AGENT ORANGE/P	SHWS
WAILUA WASTEWATER TREATMENT PLANT	SHWS
KAUAI AGRICULTURAL RESEARCH CENTER	CERCLIS
KODANI SERVICE STATION	LUST
KOOL KUTZ III	LUST
SHELL SERVICE STATION	RCRA-SQG, FINDS

OVERVIEW MAP - 1493576.1s - PBR Hawaii



TARGET PROPERTY: TMK 4-8-3:19 Portion
ADDRESS: TMK 4-8-3:19 Portion
CITY/STATE/ZIP: KAPAA HI 96746
LAT/LONG: 22.1383 / 159.2992

CUSTOMER: PBR Hawaii
CONTACT: Audrey Taniamjarik
INQUIRY #: 1493576.1s
DATE: August 22, 2005 7:19 pm

[illegible]

TARGET PROPERTY:	TMK 4-8-3:19 Portion	CUSTOMER:	PBR Hawaii
ADDRESS:	TMK 4-8-3:19 Portion	CONTACT:	Audrey Tantamjarik
CITY/STATE/ZIP:	KAPAA HI 96746	INQUIRY #:	1493576.1s
LAT/LONG:	22.1383 / 159.2992	DATE:	August 22, 2005 7:19 pm

TC1493576.1s Page 4

MAP FINDINGS SUMMARY

Database	Target Property	Search Distance (Miles)	< 1/8	1/8 - 1/4	1/4 - 1/2	1/2 - 1	> 1	Total Plotted
FEDERAL ASTM STANDARD								
NPL	Proposed NPL	1,500	0	0	0	0	0	0
	CEROLIS	1,000	0	0	0	0	0	0
	CERC-NFRAP	1,000	0	0	0	0	NR	0
	CORRACTS	1,500	0	0	0	0	0	0
	RCRA TSD	1,000	0	0	0	0	NR	0
	RCRA Lg. Quan. Gen.	0,750	0	0	0	0	NR	0
	RCRA Sm. Quan. Gen.	0,750	0	0	0	0	0	0
	ERNS	0,500	0	0	0	NR	NR	0
STATE ASTM STANDARD								
SHWS	State Landfill	1,500	0	0	0	0	0	0
LUST	LUST	1,000	0	0	0	0	NR	0
UST	UST	0	0	0	0	0	NR	0
VCP	VCP	1,000	0	0	0	0	NR	0
FEDERAL ASTM SUPPLEMENTAL								
CONSENT		1,500	0	0	0	0	0	0
ROD		1,500	0	0	0	0	0	0
Delisted NPL		1,500	0	0	0	0	0	0
FINDS		0,500	0	0	0	NR	NR	0
HMIRS		0,500	0	0	0	NR	NR	0
MLTS		0,500	0	0	0	NR	NR	0
MINES		0,750	0	0	0	0	NR	0
NPL Liens		0,500	0	0	0	NR	NR	0
PADS		0,500	0	0	0	NR	NR	0
US ENG CONTROLS		1,000	0	0	0	0	NR	0
ODI		1,000	0	0	0	0	NR	0
UMTRA		1,000	0	0	0	0	NR	0
FURS		1,500	0	0	0	0	0	0
INDIAN RESERV		1,500	0	0	0	0	0	0
DOD		1,500	0	0	0	0	0	0
RAATS		0,500	0	0	0	NR	NR	0
TRIS		0,500	0	0	0	NR	NR	0
TSCA		0,500	0	0	0	NR	NR	0
SSTS		0,500	0	0	0	NR	NR	0
FTTS		0,500	0	0	0	NR	NR	0

STATE OR LOCAL ASTM SUPPLEMENTAL

SPILLS	0.5
<u>EDR PROPRIETARY HISTORICAL DATABASES</u>	
Coal Gas	1.5

MAP FINDINGS SUMMARY

Database	Target Property	Search Distance (Miles)	< 1/8	1/8 - 1/4	1/4 - 1/2	1/2 - 1	> 1	Total Plotted
BROWNFIELDS DATABASES								
US BROWNFIELDS		1,000	0	0	0	0	NR	0
US INST CONTROL		1,000	0	0	0	0	NR	0
BROWNFIELDS		1,000	0	0	0	0	NR	0
INST CONTROL		1,000	0	0	0	0	NR	0
VCP		1,000	0	0	0	0	NR	0

NOTES:

TP = Target Property

NR = Not Requested at this Search Distance

Sites may be listed in more than one database

MAP FINDINGS

Map ID
Direction
Distance
Elevation

Database(s)

EDR ID Number
EPA ID Number

Coal Gas Site Search: No site was found in a search of Real Property Scan's ENVIROHAZ database.

NO SITES FOUND

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

To maintain currency of the following federal and state databases, EDR contacts the appropriate governmental agency on a monthly or quarterly basis, as required.

Elapsed ASTM days: Provides confirmation that this EDR report meets or exceeds the 90-day updating requirement of the ASTM standard.

FEDERAL ASTM STANDARD RECORDS

NPL: National Priority List

Source: EPA

Telephone: N/A

National Priorities List (Superfund). The NPL is a subset of CERCLIS and identifies over 1,200 sites for priority cleanup under the Superfund Program. NPL sites may encompass relatively large areas. As such, EDR provides polygon coverage for over 1,000 NPL site boundaries produced by EPA's Environmental Photographic Interpretation Center (EPIC) and regional EPA offices.

Date of Government Version: 07/01/05

Date Made Active at EDR: 08/22/05

Database Release Frequency: Quarterly

Date of Data Arrival at EDR: 08/03/05

Elapsed ASTM days: 19

Date of Last EDR Contact: 05/04/05

NPL Site Boundaries

Sources:

EPA's Environmental Photographic Interpretation Center (EPIC)

Telephone: 202-564-7333

EPA Region 1

Telephone: 617-918-1143

EPA Region 3

Telephone: 215-814-5418

EPA Region 4

Telephone: 404-562-8033

EPA Region 6

Telephone: 214-655-6659

EPA Region 8

Telephone: 303-312-6774

Proposed NPL: Proposed National Priority List Sites

Source: EPA

Telephone: N/A

Date of Government Version: 04/27/05

Date Made Active at EDR: 05/16/05

Database Release Frequency: Quarterly

Date of Data Arrival at EDR: 05/04/05

Elapsed ASTM days: 12

Date of Last EDR Contact: 05/04/05

CERCLIS: Comprehensive Environmental Response, Compensation, and Liability Information System

Source: EPA

Telephone: 703-413-0223

CERCLIS contains data on potentially hazardous waste sites that have been reported to the USEPA by states, municipalities, private companies and private persons, pursuant to Section 103 of the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA). CERCLIS contains sites which are either proposed to or on the National Priorities List (NPL) and sites which are in the screening and assessment phase for possible inclusion on the NPL.

Date of Government Version: 06/27/05

Date Made Active at EDR: 08/17/05

Database Release Frequency: Quarterly

Date of Data Arrival at EDR: 07/22/05

Elapsed ASTM days: 26

Date of Last EDR Contact: 07/22/05

CERCLIS-NFRAP: CERCLIS No Further Remedial Action Planned

Source: EPA

Telephone: 703-413-0223

As of February 1995, CERCLIS sites designated "No Further Remedial Action Planned" (NFRAP) have been removed from CERCLIS. NFRAP sites may be sites where, following an initial investigation, no contamination was found, contamination was removed quickly without the need for the site to be placed on the NPL, or the contamination was not serious enough to require Federal Superfund action or NPL consideration. EPA has removed approximately 25,000 NFRAP sites to lift the unintended barriers to the redevelopment of these properties and has archived them as historical records so EPA does not needlessly repeat the investigations in the future. This policy change is part of the EPA's Brownfields Redevelopment Program to help cities, states, private investors and affected citizens to promote economic redevelopment of unproductive urban sites.

ORPHAN SUMMARY

City	EDR ID	Site Name	Site Address	Zip	Database(s)
KAPAA	S106818243	KAUAI COAST RESORT AT THE BEACHBOY	520 ALEKA LOOP	96746	SHWS
KAPAA	1006819157	NONOU WELLS 9-1-A & 9-1-B	HALEILIO RD	96746	SHWS, FINDS
KAPAA	S106816795	COUNTY OF KAUAI, PW KAPAA BASEYARD	4900 KAHAU ST	96746	SHWS
KAPAA	1006819357	MAKALEHA TANK	KAHUNA RD	96746	SHWS, FINDS
KAPAA	S106818302	KAWAIHAU ROAD	KAWAIHAU RD	96746	SHWS
KAPAA	S106821034	WAILUA HOMESTEAD WELLS 0421-01& 02	KIOWAI PL	96746	SHWS
KAPAA	1005415817	SHELL SERVICE STATION	4 350 KUHIO HWY	96746	RCRA-SQG, FINDS
KAPAA	1006819267	KAUAI ELECTRIC, TRANSFORMER KAPAA	1065 KUHIO HWY	96746	SHWS, FINDS
KAPAA	1006820066	KAPAA SUPER SERVICE	1125 KUHIO HWY	96746	SHWS, FINDS
KAPAA	S106816704	CHEVRON LEONARD'S KAPAA	994 KUHIO HIGHWAY	96746	SHWS
KAPAA	S106816751	COCO PALMS RESORT	4-241 KUHIO HWY	96746	SHWS
KAPAA	S106818203	KAPAA POST OFFICE	4-1101 KUHIO HWY	96746	SHWS
KAPAA	S106818253	KAUAI ELECTRIC, TRANSFORMER MOAKEA CANAL	1477 KUHIO HWY	96746	SHWS
KAPAA	S106818626	KUHIO HIGHWAY OFF SCENIC POINT, UNKNOWN BROWN SHEE	KUHIO HWY	96746	SHWS
KAPAA	S106818758	LEONARD'S, INC	994 KUHIO HWY	96746	SHWS
KAPAA	S106819331	NO-DELAY SERVICE STATION WAIPOULI	746 KUHIO HWY	96746	SHWS
KAPAA	S106819335	NON SITE SPECIFIC	994 KUHIO HIGHWAY	96746	SHWS
KAPAA	S106820197	RAINBOW GAS MART	4-350 KUHIO HWY	96746	SHWS
KAPAA	U001237343	KODANI SERVICE STATION	1191 KUHIO HWY	96746	LUST
KAPAA	U003155355	KOOL KUTZ III	1467 KUHIO HWY #A	96746	UST
KAPAA	S105263869	KAPAA HIGH SCHOOL GASOLINE SPILL	MAILIHUA RD		SHWS, SPILLS
KAPAA	1006819147	NONOU WELL 9-1-C - 0321-01	NONOU RD	96746	SHWS, FINDS
KAPAA	S106821089	WAIPOLE (WAIPOULI?) FUGITIVE DUMPING	OLOHANA RD	96746	SHWS
KAPAA	S105264663	ALIAMANU BEACH/KAPAA FIRE STATION C	WAIPOULI ST	96746	SHWS, SPILLS
WAILUA	S106818241	KAUAI AGRICULTURAL RESEARCH CENTER (AGENT ORANGE/P	7370-A KUAMOO ROAD	96746	SHWS
WAILUA	S106821038	WAILUA WASTEWATER TREATMENT PLANT	4460 NALU RD	96746	SHWS
WAILUA	1001814617	KAUAI AGRICULTURAL RESEARCH CENTER	NEAR UNIV. OF HI WAILUA AG. STATION	96746	CERCLIS

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

Date of Government Version: 05/17/05
Date Made Active at EDR: 08/17/05
Database Release Frequency: Quarterly

CORRECTS: Corrective Action Report

Source: EPA
Telephone: 800-424-9346

CORRECTS identifies hazardous waste handlers with RCRA corrective action activity.

Date of Government Version: 06/29/05
Date Made Active at EDR: 08/08/05
Database Release Frequency: Quarterly

RCRA: Resource Conservation and Recovery Act Information

Source: EPA
Telephone: 800-424-9346

RCRAInfo is EPA's comprehensive information system, providing access to data supporting the Resource Conservation and Recovery Act (RCRA) of 1976 and the Hazardous and Solid Waste Amendments (HSWA) of 1984. RCRAInfo replaces the data recording and reporting abilities of the Resource Conservation and Recovery Information System (RCRIS). The database includes selective information on sites which generate, transport, store, treat and/or dispose of hazardous waste as defined by the Resource Conservation and Recovery Act (RCRA). Conditionally exempt small quantity generators (CESQGs) generate less than 100 kg of hazardous waste, or less than 1 kg of acutely hazardous waste per month. Small quantity generators (SQGs) generate between 100 kg and 1,000 kg of hazardous waste per month. Large quantity generators (LQGs) generate over 1,000 kilograms (kg) of hazardous waste, or over 1 kg of acutely hazardous waste per month. Transporters are individuals or entities that move hazardous waste from the generator off-site to a facility that can recycle, treat, store, or dispose of the waste. TSD's treat, store, or dispose of the waste.

Date of Government Version: 05/20/05
Date Made Active at EDR: 06/09/05
Database Release Frequency: Quarterly

ERNS: Emergency Response Notification System

Source: National Response Center, United States Coast Guard
Telephone: 202-260-2342

Emergency Response Notification System: ERNS records and stores information on reported releases of oil and hazardous substances.

Date of Government Version: 12/31/04
Date Made Active at EDR: 03/24/05
Database Release Frequency: Annually

FEDERAL ASTM SUPPLEMENTAL RECORDS

BRS: Biennial Reporting System

Source: EPA/NTIS

Telephone: 800-424-9346

The Biennial Reporting System is a national system administered by the EPA that collects data on the generation and management of hazardous waste. BRS captures detailed data from two groups: Large Quantity Generators (LQG) and Treatment, Storage, and Disposal Facilities.

Date of Government Version: 12/31/03
Database Release Frequency: Biennially

CONSENT: Superfund (CERCLA) Consent Decrees

Source: Department of Justice, Consent Decree Library
Telephone: Varies

Major legal settlements that establish responsibility and standards for cleanup at NPL (Superfund) sites. Released periodically by United States District Courts after settlement by parties to litigation matters.

Date of Data Arrival at EDR: 06/20/05
Elapsed ASTM days: 58
Date of Last EDR Contact: 06/20/05

Date of Data Arrival at EDR: 07/05/05
Elapsed ASTM days: 34
Date of Last EDR Contact: 06/05/05

Date of Data Arrival at EDR: 05/24/05
Elapsed ASTM days: 16
Date of Last EDR Contact: 05/24/05

Date of Data Arrival at EDR: 01/27/05
Elapsed ASTM days: 56
Date of Last EDR Contact: 07/25/05

Date of Last EDR Contact: 06/17/05
Date of Next Scheduled EDR Contact: 09/12/05

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

Date of Government Version: 12/14/04
Database Release Frequency: Varies

Date of Last EDR Contact: 07/25/05
Date of Next Scheduled EDR Contact: 10/24/05

ROD: Records Of Decision

Source: EPA

Telephone: 703-416-0223

Record of Decision, ROD documents mandate a permanent remedy at an NPL (Superfund) site containing technical and health information to aid in the cleanup.

Date of Government Version: 06/08/05
Database Release Frequency: Annually

Date of Last EDR Contact: 07/06/05
Date of Next Scheduled EDR Contact: 10/03/05

DELISTED NPL: National Priority List Deletions

Source: EPA

Telephone: N/A

The National Oil and Hazardous Substances Pollution Contingency Plan (NCP) establishes the criteria that the EPA uses to delete sites from the NPL. In accordance with 40 CFR 300.425.(e), sites may be deleted from the NPL where no further response is appropriate.

Date of Government Version: 07/01/05
Database Release Frequency: Quarterly

Date of Last EDR Contact: 05/04/05
Date of Next Scheduled EDR Contact: 08/01/05

FINDS: Facility Index System/Facility Registry System

Source: EPA

Telephone: (415) 947-8000

Facility Index System: FINDS contains both facility information and pointers to other sources that contain more detail. EDR includes the following FINDS databases in this report: PCS (Permit Compliance System), AIRS (Aerometric Information Retrieval System), DOCKET (Enforcement Docket used to manage and track information on civil judicial enforcement cases for all environmental statutes), FURS (Federal Underground Injection Control), C-DOCKET (Criminal Docket System used to track criminal enforcement actions for all environmental statutes), FFIS (Federal Facilities Information System), STATE (State Environmental Laws and Statutes), and PADS (PCB Activity Data System).

Date of Government Version: 07/11/05
Database Release Frequency: Quarterly

Date of Last EDR Contact: 07/05/05
Date of Next Scheduled EDR Contact: 10/03/05

HMIRS: Hazardous Materials Information Reporting System

Source: U.S. Department of Transportation

Telephone: 202-366-4555

Hazardous Materials Incident Report System: HMIRS contains hazardous material spill incidents reported to DOT.

Date of Government Version: 12/31/04
Database Release Frequency: Annually

Date of Last EDR Contact: 07/22/05
Date of Next Scheduled EDR Contact: 10/17/05

MLTS: Material Licensing Tracking System

Source: Nuclear Regulatory Commission

Telephone: 301-415-7169

MLTS is maintained by the Nuclear Regulatory Commission and contains a list of approximately 8,100 sites which possess or use radioactive materials and which are subject to NRC licensing requirements. To maintain currency, EDR contacts the Agency on a quarterly basis.

Date of Government Version: 07/14/05
Database Release Frequency: Quarterly

Date of Last EDR Contact: 07/05/05
Date of Next Scheduled EDR Contact: 10/03/05

MINES: Mines Master Index File

Source: Department of Labor, Mine Safety and Health Administration

Telephone: 303-231-3559

Contains all mine identification numbers issued for mines active or opened since 1971. The data also includes violation information.

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

Date of Government Version: 05/13/05
Database Release Frequency: Semi-Annually
Date of Last EDR Contact: 06/27/05
Date of Next Scheduled EDR Contact: 09/26/05

NPL LIENS: Federal Superfund Liens

Source: EPA
Telephone: 202-564-4267
Federal Superfund Liens. Under the authority granted the USEPA by the Comprehensive Environmental Response, Compensation and Liability Act (CERCLA) of 1980, the USEPA has the authority to file liens against real property in order to recover remedial action expenditures or when the property owner receives notification of potential liability. USEPA compiles a listing of filed notices of Superfund Liens.

Date of Government Version: 10/15/91
Database Release Frequency: No Update Planned
Date of Last EDR Contact: 05/23/05
Date of Next Scheduled EDR Contact: 08/22/05

PADS: PCB Activity Database System

Source: EPA
Telephone: 202-564-3887
PCB Activity Database. PADS identifies generators, transporters, commercial storers and/or brokers and disposers of PCB's who are required to notify the EPA of such activities.

Date of Government Version: 03/30/05
Database Release Frequency: Annually
Date of Last EDR Contact: 05/10/05
Date of Next Scheduled EDR Contact: 08/08/05

DOD: Department of Defense Sites

Source: USGS
Telephone: 703-692-8801
This data set consists of federally owned or administered lands, administered by the Department of Defense, that have any area equal to or greater than 640 acres of the United States, Puerto Rico, and the U.S. Virgin Islands.

Date of Government Version: 10/01/03
Database Release Frequency: Semi-Annually
Date of Last EDR Contact: 05/13/05
Date of Next Scheduled EDR Contact: 08/08/05

UMTRA: Uranium Mill Tailings Sites

Source: Department of Energy
Telephone: 505-945-0011
Uranium ore was mined by private companies for federal government use in national defense programs. When the mills shut down, large piles of the sand-like material (mill tailings) remain after uranium has been extracted from the ore. Levels of human exposure to radioactive materials from the piles are low; however, in some cases tailings were used as construction materials before the potential health hazards of the tailings were recognized. In 1978, 24 inactive uranium mill tailings sites in Oregon, Idaho, Wyoming, Utah, Colorado, New Mexico, Texas, North Dakota, South Dakota, Pennsylvania, and on Navajo and Hopi tribal lands, were targeted for cleanup by the Department of Energy.

Date of Government Version: 12/29/04
Database Release Frequency: Varies
Date of Last EDR Contact: 07/05/05
Date of Next Scheduled EDR Contact: 09/19/05

ODI: Open Dump Inventory

Source: Environmental Protection Agency
Telephone: 800-424-9346
An open dump is defined as a disposal facility that does not comply with one or more of the Part 257 or Part 258 Subtitle D Criteria.

Date of Government Version: 06/30/85
Database Release Frequency: No Update Planned
Date of Last EDR Contact: 05/23/95
Date of Next Scheduled EDR Contact: N/A

FUDS: Formerly Used Defense Sites

Source: U.S. Army Corps of Engineers
Telephone: 202-528-4285
The listing includes locations of Formerly Used Defense Sites properties where the US Army Corps of Engineers is actively working or will take necessary cleanup actions.

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

Date of Government Version: 12/31/04
Database Release Frequency: Varies
Date of Last EDR Contact: 08/29/05
Date of Next Scheduled EDR Contact: 10/03/05

INDIAN RESERV: Indian Reservations

Source: USGS
Telephone: 202-208-3710
This map layer portrays Indian administered lands of the United States that have any area equal to or greater than 640 acres.

Date of Government Version: 10/01/03
Database Release Frequency: Semi-Annually
Date of Last EDR Contact: 05/13/05
Date of Next Scheduled EDR Contact: 08/08/05

US ENG CONTROLS: Engineering Controls Sites List

Source: Environmental Protection Agency
Telephone: 703-603-8867
A listing of sites with engineering controls in place. Engineering controls include various forms of caps, building foundations, liners, and treatment methods to create pathway elimination for regulated substances to enter environmental media or effect human health.

Date of Government Version: 01/10/05
Database Release Frequency: Varies
Date of Last EDR Contact: 07/05/05
Date of Next Scheduled EDR Contact: 10/03/05

RAATS: RCRA Administrative Action Tracking System

Source: EPA
Telephone: 202-564-4104
RCRA Administration Action Tracking System. RAATS contains records based on enforcement actions issued under RCRA pertaining to major violations and includes administrative and civil actions brought by the EPA. For administration actions after September 30, 1995, data entry in the RAATS database was discontinued. EPA will retain a copy of the database for historical records. It was necessary to terminate RAATS because a decrease in agency resources made it impossible to continue to update the information contained in the database.

Date of Government Version: 04/17/95
Database Release Frequency: No Update Planned
Date of Last EDR Contact: 06/06/05
Date of Next Scheduled EDR Contact: 09/05/05

TRIS: Toxic Chemical Release Inventory System

Source: EPA
Telephone: 202-566-0250
Toxic Release Inventory System. TRIS identifies facilities which release toxic chemicals to the air, water and land in reportable quantities under SARA Title III Section 313.

Date of Government Version: 12/31/03
Database Release Frequency: Annually
Date of Last EDR Contact: 07/13/05
Date of Next Scheduled EDR Contact: 09/19/05

TSCA: Toxic Substances Control Act

Source: EPA
Telephone: 202-260-5521
Toxic Substances Control Act. TSCA identifies manufacturers and importers of chemical substances included on the TSCA Chemical Substance Inventory list. It includes data on the production volume of these substances by plant site.

Date of Government Version: 12/31/02
Database Release Frequency: Every 4 Years
Date of Last EDR Contact: 07/18/05
Date of Next Scheduled EDR Contact: 10/17/05

FTTS INSP: FIFRA/TSCA Tracking System - FIFRA (Federal Insecticide, Fungicide, & Rodenticide Act)/TSCA (Toxic Substances Control Act)

Source: EPA
Telephone: 202-566-1667
Date of Government Version: 07/15/05
Database Release Frequency: Quarterly
Date of Last EDR Contact: 06/20/05
Date of Next Scheduled EDR Contact: 09/19/05

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

SSTS: Section 7 Tracking Systems
Source: EPA
Telephone: 202-564-4203
Section 7 of the Federal Insecticide, Fungicide and Rodenticide Act, as amended (92 Stat. 823) requires all registered pesticide-producing establishments to submit a report to the Environmental Protection Agency by March 1st each year. Each establishment must report the types and amounts of pesticides, active ingredients and devices being produced, and those having been produced and sold or distributed in the past year.
Date of Government Version: 12/31/03
Database Release Frequency: Annually
Date of Last EDR Contact: 07/18/05
Date of Next Scheduled EDR Contact: 10/17/05

FTTS: FIFRA/TSCA Tracking System - FIFRA (Federal Insecticide, Fungicide, & Rodenticide Act)/TSCA (Toxic Substances Control Act)
Source: EPA/Office of Prevention, Pesticides and Toxic Substances
Telephone: 202-566-1687
FTTS tracks administrative cases and pesticide enforcement actions and compliance activities related to FIFRA, TSCA and EPCRA (Emergency Planning and Community Right-to-Know Act). To maintain currency, EDR contacts the Agency on a quarterly basis.
Date of Government Version: 07/15/05
Database Release Frequency: Quarterly
Date of Last EDR Contact: 08/20/05
Date of Next Scheduled EDR Contact: 09/19/05

STATE OF HAWAII ASTM STANDARD RECORDS

SHWS: Sites List
Source: Department of Health
Telephone: 808-586-4249
Facilities, sites or areas in which the Office of Hazard Evaluation and Emergency Response has an interest, has investigated or may investigate under HRS 128D (includes CERCLIS sites).
Date of Government Version: 02/15/05
Date Made Active at EDR: 04/13/05
Database Release Frequency: Semi-Annually
Date of Data Arrival at EDR: 03/22/05
Elapsed ASTM days: 22
Date of Last EDR Contact: 07/08/05

SWFLF: Permitted Landfills in the State of Hawaii
Source: Department of Health
Telephone: 808-586-4245
Solid Waste Facilities/Landfill Sites. SWFLF type records typically contain an inventory of solid waste disposal facilities or landfills in a particular state. Depending on the state, these may be active or inactive facilities or open dumps that failed to meet RCRA Subtitle D Section 4004 criteria for solid waste landfills or disposal sites.
Date of Government Version: 05/19/04
Date Made Active at EDR: 08/22/04
Database Release Frequency: Varies
Date of Data Arrival at EDR: 05/20/04
Elapsed ASTM days: 33
Date of Last EDR Contact: 05/04/05

LUST: Leaking Underground Storage Tank Database
Source: Department of Health
Telephone: 808-586-4228
Leaking Underground Storage Tank Incident Reports. LUST records contain an inventory of reported leaking underground storage tank incidents. Not all states maintain these records, and the information stored varies by state.
Date of Government Version: 02/01/05
Date Made Active at EDR: 03/29/05
Database Release Frequency: Semi-Annually
Date of Data Arrival at EDR: 02/15/05
Elapsed ASTM days: 42
Date of Last EDR Contact: 06/29/05

UST: Underground Storage Tank Database
Source: Department of Health
Telephone: 808-586-4228
Registered Underground Storage Tanks. UST's are regulated under Subtitle I of the Resource Conservation and Recovery Act (RCRA) and must be registered with the state department responsible for administering the UST program. Available information varies by state program.

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

Date of Government Version: 02/01/05
Date Made Active at EDR: 03/25/05
Database Release Frequency: Semi-Annually
Date of Data Arrival at EDR: 02/15/05
Elapsed ASTM days: 38
Date of Last EDR Contact: 06/29/05

VCP: Voluntary Response Program Sites
Source: Department of Health
Telephone: 808-586-4249
Date of Government Version: 01/05/05
Date Made Active at EDR: 02/08/05
Database Release Frequency: Varies
Date of Data Arrival at EDR: 01/06/05
Elapsed ASTM days: 33
Date of Last EDR Contact: 07/25/05

STATE OF HAWAII ASTM SUPPLEMENTAL RECORDS

SPILLS: Release Notifications
Source: Department of Health
Telephone: 808-586-4249
Releases of hazardous substances to the environment reported to the Office of Hazard Evaluation and Emergency Response since 1988.
Date of Government Version: 09/01/00
Database Release Frequency: Varies
Date of Last EDR Contact: 07/08/05
Date of Next Scheduled EDR Contact: 09/19/05

EDR PROPRIETARY HISTORICAL DATABASES

Former Manufactured Gas (Coal Gas) Sites: The existence and location of Coal Gas sites is provided exclusively to EDR by Real Property Scan, Inc. ©Copyright 1993 Real Property Scan, Inc. For a technical description of the types of hazards which may be found at such sites, contact your EDR customer service representative.

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BROWNFIELDS DATABASES

US BROWNFIELDS: A Listing of Brownfields Sites
Source: Environmental Protection Agency
Telephone: 202-566-2777

GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

Included in the listing are brownfields properties addresses by Cooperative Agreement Recipients and brownfields properties addressed by Targeted Brownfields Assessments. Targeted Brownfields Assessments-EPA's Targeted Brownfields Assessments (TBA) program is designed to help states, tribes, and municipalities-especially those without EPA Brownfields Assessment Demonstration Pilots-minimize the uncertainties of contamination often associated with brownfields. Under the TBA program, EPA provides funding and/or technical assistance for environmental assessments at brownfields sites throughout the country. Targeted Brownfields Assessments supplement and work with other efforts under EPA's Brownfields Initiative to promote cleanup and redevelopment of brownfields. Cooperative Agreement Recipients-States, political subdivisions, territories, and Indian tribes become Brownfields Cleanup Revolving Loan Fund (BCRLF) cooperative agreement recipients when they enter into BCRLF cooperative agreements with the U.S. EPA. EPA selects BCRLF cooperative agreement recipients based on a proposal and application process. BCRLF cooperative agreement recipients must use EPA funds provided through BCRLF cooperative agreement for specified brownfields-related cleanup activities.

Date of Last EDR Contact: 06/13/05
Date of Next Scheduled EDR Contact: 09/12/05

Date of Government Version: 01/10/05
Database Release Frequency: Semi-Annually

US INST CONTROL: Sites with Institutional Controls

Source: Environmental Protection Agency

Telephone: 703-603-8867

A listing of sites with institutional controls in place. Institutional controls include administrative measures, such as groundwater use restrictions, construction restrictions, property use restrictions, and post remediation care requirements intended to prevent exposure to contaminants remaining on site. Deed restrictions are generally required as part of the institutional controls.

Date of Government Version: 01/10/05
Database Release Frequency: Varies

Date of Last EDR Contact: 07/05/05
Date of Next Scheduled EDR Contact: 10/03/05

BROWNFIELDS: Brownfields Sites

Source: Department of Health

Telephone: 808-586-4249

Date of Government Version: 01/05/05
Database Release Frequency: Varies

Date of Last EDR Contact: 07/25/05
Date of Next Scheduled EDR Contact: 09/19/05

INST CONTROL: Sites with Institutional Controls

Source: Department of Health

Telephone: 808-586-4249

Voluntary Remediation Program and Brownfields sites with institutional controls in place.

Date of Government Version: 01/05/05
Database Release Frequency: Varies

Date of Last EDR Contact: 07/25/05
Date of Next Scheduled EDR Contact: 09/19/05

VCP: Voluntary Response Program Sites

Source: Department of Health

Telephone: 808-586-4249

Date of Government Version: 01/05/05
Database Release Frequency: Varies

Date of Last EDR Contact: 07/25/05
Date of Next Scheduled EDR Contact: 09/19/05

OTHER DATABASE(S)

Depending on the geographic area covered by this report, the data provided in these specialty databases may or may not be complete. For example, the existence of wetlands information data in a specific report does not mean that all wetlands in the area covered by the report are included. Moreover, the absence of any reported wetlands information does not necessarily mean that wetlands do not exist in the area covered by the report.

Oil/Gas Pipelines: This data was obtained by EDR from the USGS in 1994. It is referred to by USGS as GeoData Digital Line Graphs from 1:100,000-Scale Maps. It was extracted from the transportation category including some oil, but primarily gas pipelines.

Electric Power Transmission Line Data

Source: PennWell Corporation

Telephone: (800) 823-6277

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GOVERNMENT RECORDS SEARCHED / DATA CURRENCY TRACKING

Sensitive Receptors: There are individuals deemed sensitive receptors due to their fragile immune systems and special sensitivity to environmental discharges. These sensitive receptors typically include the elderly, the sick, and children. While the location of all sensitive receptors cannot be determined, EDR indicates those buildings and facilities - schools, daycares, hospitals, medical centers, and nursing homes - where individuals who are sensitive receptors are likely to be located.

AHA Hospitals:

Source: American Hospital Association, Inc.

Telephone: 312-280-5591

The database includes a listing of hospitals based on the American Hospital Association's annual survey of hospitals.

Medical Centers: Provider of Services Listing

Source: Centers for Medicare & Medicaid Services

Telephone: 410-786-3000

A listing of hospitals with Medicare provider number, produced by Centers of Medicare & Medicaid Services, a federal agency within the U.S. Department of Health and Human Services.

Nursing Homes

Source: National Institutes of Health

Telephone: 301-594-6248

Information on Medicare and Medicaid certified nursing homes in the United States.

Public Schools

Source: National Center for Education Statistics

Telephone: 202-502-7300

The National Center for Education Statistics' primary database on elementary

and secondary public education in the United States. It is a comprehensive, annual, national statistical database of all public elementary and secondary schools and school districts, which contains data that are comparable across all states.

Private Schools

Source: National Center for Education Statistics

Telephone: 202-502-7300

The National Center for Education Statistics' primary database on private school locations in the United States.

Flood Zone Data: This data, available in select counties across the country, was obtained by EDR in 1999 from the Federal Emergency Management Agency (FEMA). Data depicts 100-year and 500-year flood zones as defined by FEMA.

NWI: National Wetlands Inventory. This data, available in select counties across the country, was obtained by EDR in 2002 from the U.S. Fish and Wildlife Service.

STREET AND ADDRESS INFORMATION

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APPENDIX | D

CULTURAL ASSESSMENT

Anahola Residence Lots, Unit 6

Cultural Assessment



Tax Map Keys: 4-8-03: 03 (por), 19 (por), and 21 (por)
Anahola, Kaua'i, Hawai'i

Prepared by:



September 2005

Anahola Residence Lots, Unit 6

Cultural Assessment

Tax Map Keys: 4-8-03: 03 (por), 19 (por), and 21 (por)
Anahola, Kaua'i, Hawai'i

Prepared by:



September 2005

Introduction:

The Anahola Residence Lots, Unit 6 project site lies on 71.3 acres on the east shore of the island of Kaua'i, within the ahupua'a of Anahola (see Figures 1 and 2). Anahola is the largest ahupua'a within the Ko'olau district, containing some 6,327 acres. According to Wichman (1998), Anahola is named after a mo'o (lizard) that appeared on land as a man and in the sea as a merman. The ahupua'a of 'Aliomani (*lit.* "scar made by birds") lies to the north and the ahupua'a of Kamalomalo'o (*lit.* "dry loincloth") to the south. The northern boundary of the ahupua'a is at Kuahuhu Point (*lit.* "silent, still, lonely"), and the southern boundary of the ahupua'a is at Lae Lipoa (*lit.* "lipoa seaweed point").

Natural Resources:

Natural resources within the ahupua'a include Anahola Stream, two prominent mountain peaks known as Hōkū'alele peak (*lit.* "star messenger, shooting star, or comet") and Kalalea Mountain (*lit.* "prominent, protruding"), fertile land and abundant ocean resources. Historically, the upper portion of the valley contained taro terraces, but it is the flatlands along the river mouth that were heavily cultivated (Wichman, 1998). Hōkū'alele Peak and Kalalea Mountain are very prominent throughout the community; the mountains can be seen from various locations in Anahola as shown in Photographs 1 through 5.

Known Archaeological Sites:

An Archaeological Field Inspection was conducted by Cultural Surveys Hawaii. The letter report states that the results of the background research and field inspection conclude that the project site has no archaeological potential and no further investigation is warranted. Information on regional archaeological resources was gathered from Wendell Clark Bennett's (1931) archaeological survey of the island of Kaua'i. Bennett listed several sites in the Anahola area, including:

'Aikanaka Heiau (State Site No. 30:04:0113). Bennett located this heiau at Anahola Point, near the end of the bluff on the south side of the bay. The heiau was described by Thurum (1907) as "a small heiau, about 40 feet in size, all destroyed." One large rock marked the spot of this heiau in the old sugar cane field. It is not clear what type of heiau this was. According to the Kaua'i District Office of the Department of Hawaiian Home Lands (DHHL), 'Aikanaka Rock is possibly located in the general area of DHHL Unit 7 (Personal Interview, August 18, 2005).

Paeaea Heiau (State Site No. 30:04:0114). Bennett located this heiau at the back of Anahola Bay, inland from the government road on the north side of the valley. He described the site as low, giving one a poor view of the area. Thurum described the heiau as "a small round heiau, walls 8 feet high not thick; class not known." The site has not been relocated nor has it been inspected since Bennett's survey in the early 1930s (Belt Collins, 1987).

Kuhua Heiau (State Site No. 30:04:0115). Bennett located this heiau on the northern bluff of Anahola Valley, halfway between the government road and the sea bluff. Bennett noted that the view of the valley from the heiau was excellent. However, when

he recorded the site, there were only scattered stones left which were part of the original wall structure. The heiau was presumed destroyed by land clearing for pineapple fields (Belt Collins, 1987).

Dune Burials (State Site No. 30:04:0116). Bennett located the dune burials in the dunes around Anahola Bay. He noted that many bones had been found as burials were uncovered by the shifting sand.

Taro Terraces (State Site No. 30:04:0117). Bennett located the terraces on the inland part of Anahola Valley, noting that the edges of the valley were too steep for much cultivation.

The five archaeological sites described above are not located directly on the project site. However, the sites can be considered significant in the regional context of their location in relation to the project site. Due to the long history of ground disturbance as a result of past agricultural activities on the project site, it is highly unlikely that any significant historic sites would be found/remain intact on the subject property. However, many of the kupuna interviewed during the cultural assessment process stated that a heiau is located either on or near the project site. The archaeological letter report states that this heiau appears to be 'Aikanaka Heiau, located on the south point of Anahola Bay. This heiau site is nearly 2,000 feet north of the project site. Should any archaeological, cultural, or historic sites be uncovered during construction, proper procedure should be followed with the State Office of Historic Preservation.

Legends:

There are several legends associated with Anahola, some of which were retold in variation by the kupuna that were interviewed for this project. Legends from the area include:

- Alaweo pond at the mouth of **Anahola River** is said to be the home of a mo'o, Pehuiki, who is the guardian of the pond. Pehuiki is said to have three daughters who were often seen sitting on the banks of Alaweo pond, combing their long hair. The four mo'o are said to sleep in the cave of Hāhālima (Wichman, 1998).
- Lā'ieikawai and her twin sister Lā'ielohelohe were born in Ko'olau, O'ahu, where their father was a great chief. Lā'ieikawai and sister were separated at birth and hidden because their father had sworn to kill all of his daughters that were born before he had a son. It is said that there was a prayer tower on the peak of **Hōkū'alele** from which the prophet Hulumānani announced that Lā'ieikawai would eventually settle on Kaua'i (Wichman, 1998).
- A large rectangular rock on the slopes of **Hōkū'alele** is said to have once been a man who was punished by being turned to stone. The punishment was served to the man for spying on Lahemānu, the daughter of a chief, while she took a bath (Armitage, 1944).
- Kawelo was a young chief of Kaua'i whom had many adventures, some which associate him with Anahola (Thompson, 1991).

Some of the names mentioned above are prevalent throughout the community today. For example, the Anahola Clubhouse is located near the intersection of Kalalea Road and Kawelo Street.

Previous Land Use:

Prior to western contact, the Hawaiian people of Anahola lived a traditional life of subsistence. In the 1870s, a Honolulu firm of Chinese rice planters moved into the area and began to buy the kuleana land of Hawaiians who wished to sell. What followed was the start of commercial sugar cane in 1880 by the Makee Sugar Company. Makee Sugar, together with inter-island shipping companies, developed a small landing at Anahola and built a rail line to the landing. By the early 1920s, Anahola Landing was phased out with commercial freight and passengers utilizing Ahukiri Landing in Hananā'ulu. By the 1930s, Lihue Plantation absorbed Makee Sugar Company and continued sugar cane cultivation in Anahola until the early 1990s. After the last cane harvest, the lands were returned to the State Department of Hawaiian Home Lands (KHHS, 2005). The project site is former pineapple and sugar cane land. A map at the Kaua'i District Office of the Department of Hawaiian Home Lands shows the area under cultivation as early as 1904 (Newton, 1906). Today, the land lies vacant and overgrown.

The shift from a subsistence lifestyle to a commercial agriculture community took its toll on the Hawaiian population of Anahola. A document from the Kaua'i Historical Society entitled: "Anahola." An Experiment in Turning Back the Clock" was written in 1939 by an unnamed source. The document describes the lost cultural traits as experienced by a Hawaiian woman born in 1860: The woman recalled that only grass houses were in the community before, that there was a loss of old Hawaiian arts, canoe making, tapa making, even the Hawaiian kinds of chickens and pigs, even poi and fishing. The woman stated that they (Hawaiians) had their own things, and that "nobody had to go out to work and everyone had plenty." For example, she cited a Hui Lawai'a (community fishing), in which nets were shared, they were not owned by just one. The same document also noted that fishing declined with the death of the expert fisherman, kilokilo (*lit.* "magic, fortune telling").

Interviews:

The following individuals were contacted via telephone and/or personal interview during the months of August and September 2005 for the purposes of this cultural assessment: Mr. Roland Licona (District Supervisor of the Department of Hawaiian Home Lands, Kaua'i District Office), Ms. Erna Manini-Kamibayashi (Homestead Assistant of the DHHL, Kaua'i District Office; also has relatives living in Anahola), Ms. LaFrance Arboleda (Office of Hawaiian Affairs, Kaua'i-Ni'ihau Islands Burial Council and Anahola resident), Ms. Healani Trembath (Alu Like Kupuna Program), Mr. Brian Yamamoto (descendant of first generation Japanese farmers from Anahola), Dr. Paul Esaki (descendant of first generation Japanese farmers from Anahola and current Chair of the Anahola Japanese Community Association), Ms. Mary Requilman (Managing Director of the Kaua'i Historical Society), Mr. Hosea and Jane Lovell (fisherman and Anahola residents), Mr. William Kulia Mokumia Lenn Sr. (Anahola Resident), Ms. Lenora Inanod Kelekoma (Anahola Resident), Ms. Alice Dabin (Wailua Resident) and Mr. Castro "Sonny" Lovell (Anahola Resident).

Mr. Licona provided some background history on the DHHL project and information about the possible location of 'Aikanaka rock in DHHL Unit 7. Ms. Manini-Kamibayashi provided the contact information for some of the kupuna living in Anahola. She also noted that many residents in Anahola are aware that the Anahola Residences, Unit 6 are going to be built and that she has not heard any complaints from the community regarding the subject project.

Ms. Arboleda provided contact information for some of the kupuna living in Anahola and also gave possible location information of 'Aikanaka rock. She stated her concerns for finding potential burials at the project site. Ms. Arboleda expressed that unearthed burials should be reinterred within the same ahupua'a from which they are found.

Ms. Healani Trembath coordinated the visit with the kupuna of the Alu Like Program and also suggested that the heiau possibly located on/near the project site may have been a fishing heiau and may still be spiritually 'alive'. According to the archaeological letter report, this heiau appears to be 'Aikanaka Heiau, which is located nearly 2,000 feet north of the project site.

Mr. Brian Yamamoto's grandparents were first generation Japanese farmers in Anahola whom returned their land to DHHL when their lease expired. His grandparents farmed watermelons, tomatoes and other vegetable crops near 'Smith Corner' (children's swimming beach). Mr. Yamamoto noted that the community was a scattered coastal settlement, with steamships that came into Anahola landing to transport materials. Mr. Yamamoto also noted that there are a number of fishing sites all along the Anahola coast.

Dr. Paul Esaki is also a descendant of first generation Japanese farmers in Anahola; he is currently the Chair of the Anahola Japanese Community Association (AJCA). Dr. Esaki was born and raised in Anahola, leaving the area as a teenager. Currently, the AJCA is trying to document the history of the Japanese community in Anahola, but does not have anything recorded to date.

Mr. Hosea Lovell was born in Anahola on March 15, 1926 and has lived there ever since. Mr. Lovell's father was a forest ranger on Kaua'i, appointed in 1919. Mr. Lovell's great-grandfather was David Kahano and his great-grandmother was Kealikuauaina. David Kahano was known to frequently walk (up) the Kalalea Mountains. Mr. Lovell mentioned that there was a trail along Kalalea Mountain that went around the mountain to a place with a lot of mountain apples. On a given weekend, families would get together and go to the mountains to pick the mountain apples, wrapping the fruit in ti leaf to carry home. Mr. Lovell said that you could also walk down from Kalalea Mountain, along Anahola stream to a really nice swimming spot.

Mr. Lovell described Anahola as he knew it growing up: everybody in Anahola fished. His father had an akule net that was used during hukilau. This would involve a lookout on the hill that would spot the schools of akule, the lookout would then whistle and everyone would head down to the beach to hukilau. Mr. Lovell has fished all along the Anahola coast his entire life, between Ahini Point and Kahala Point. He fishes everyday in the morning and in the late afternoon. He uses various methods to fish: a throw net, spear diving, and line fishing. He feels that Anahola has some of the best fishing and limu gathering spots that can be found.

Mr. Lovell also recalled that there were no pine trees along the beach like there are today. There were a few coconut trees in yards, which made for a bare beachfront. However, the bare

beachfront exacerbated the problem of exposed burials; he recalled finding a lot of bones as a child playing on the beach. Mr. Lovell stated that there are burials all along Anahola Beach Park that run all the way to the Anahola river mouth. As far as the project site is concerned, Mr. Lovell pointed out that sugar cane and pineapple used to grow along Kukuhihale Road.

Mr. William Kulia Mokumaiia Lemn Sr. was born and raised in Moanalua, O'ahu. He has lived on Kaula'i for 67 years and will be 91 years-old in November. Mr. Lemn's wife's family was from Anahola. He told a story of Kalalea Mountain:

There are stone walls at the base of the mountain; they were used for animals, a place for worship, and for burials. There are two stones there that husbands and wives would go to and sit on when they were having problems. He said when you sit there, you only hear three things: first the birds, second the chickens digging around, then lastly the wild pigs that come down. Once the pigs leave, there is only the makani (wind) that hits your back. Mr. Lemn said that wind is akua (god). In the quiet time spent there, problems are solved.

Ms. Lenora Inanod Kelekoma, Ms. Alice Dabin and Mr. Castro "Sonny" Lovell contributed to a group conversation about several legends of Anahola. The trio retold many of the legends that were found during background research for this assessment. Ms. Kelekoma recalled that a number of people used to climb Kalalea Mountain to go over to the other side for goat hunting.

Anahola Japanese Community:

Prior to the establishment of the leased homesteads, some of the DHHL land was leased out to farmers, many of whom were first generation Japanese immigrants. These Japanese families established a school in Anahola. The first building of the Anahola Japanese School was erected in 1907. The land for the school (1.5 acres) was bought from the head bookkeeper of McBride Sugar Co., Mr. Takitani. There is also a Japanese graveyard located above the school. The second school building was erected in 1941, just before World War II, replacing the first building because the student population was growing.

Because Japanese property was taken up by the government during WWII, the Japanese community voted to give the school's land to Hawaiian Canneries and American Factors for safe keeping. There was an understanding that the land would be returned after the war if the Japanese community formed an association. The land was returned in 1960, and the Anahola Japanese Community Association (AJCA) was formed.

Records from the AJCA 50th reunion show that prior to 1947, there were 70 Japanese families living in the Anahola area as farmers. In 1991, there were just 19 families living in the area, although 45 Japanese families were part of the AJCA (KHS, 2005).

The Anahola Baptist Church currently congregates at the AJCA Hall (see Photograph 2), this space also serves as the main gathering place for the last remaining members of the Japanese community in Anahola (Personal Interview, August 30, 2005). The AJCA is currently working to document the history of their existence in Anahola.

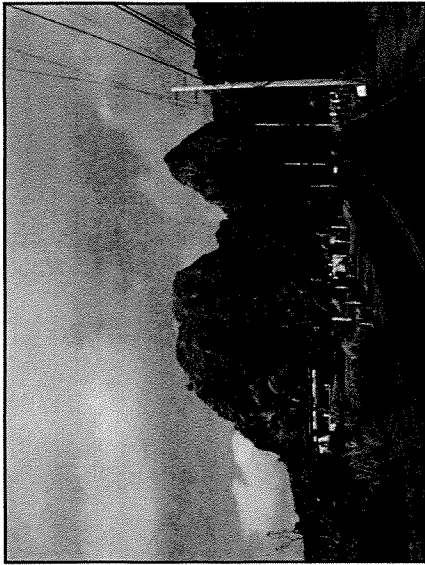
Conclusion:

Although the landscape of Anahola, and more specifically the project site, has been changed by years of cultivation, there are still many cultural resources available in Anahola in the form of oral history, archaeological sites, as well as subsistence fishing. Programs such as the Alu Like Kupuna Program help to preserve these cultural resources by providing a venue for the kupuna to share their knowledge. The efforts of the AJCA also ensure that the historic culture of Anahola will be preserved for generations to come.

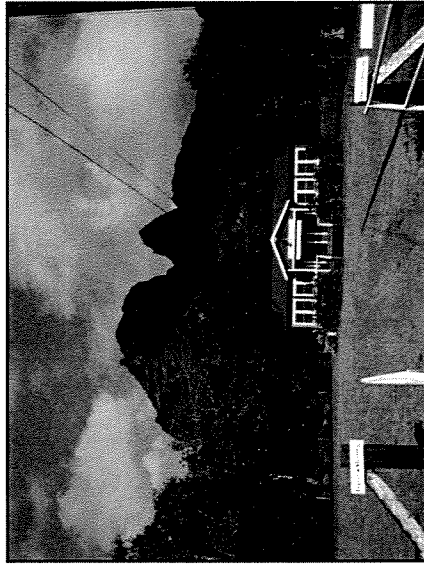
Hōkū'alele Peak and Kalalea Mountain prove to be important landmarks in the history of Anahola as told through legends and first hand accounts. Therefore, view planes towards those mountains should be maintained as their place in the history of Anahola is significant.

Should any archaeological, cultural, or historic sites be uncovered at the project site, proper procedure should be followed with the State Office of Historic Preservation.

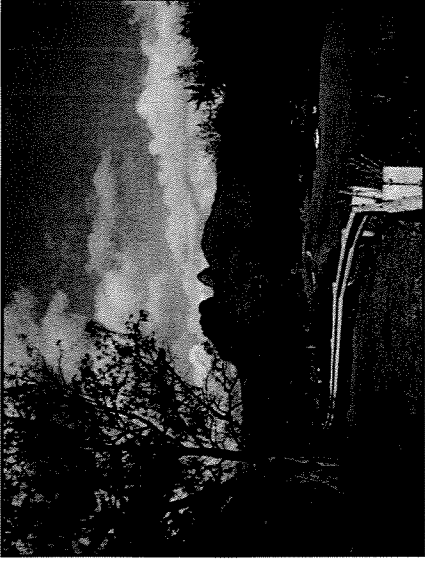
<i>Anahola Residence Lots, Unit 6</i>	<i>Cultural Assessment</i>
References	<p>Armitage, George Thomas. 1944. <i>Ghost Dog and Other Hawaiian Legends</i>. Advertiser Publishing, Honolulu.</p> <p>Belt Collins Hawaii. 1987. <i>Anahola-Kamalomalo and Moloaa Development Plan</i>. Prepared for the Department of Hawaiian Home Lands.</p> <p>Bennet, Wendell Clark. 1931. <i>Archeology of Kauai</i>. Bishop Museum Bulletin 80. Bishop Museum Press, Honolulu.</p> <p>Clark, John R. K. 1990. <i>Beaches of Kauai and Niihau</i>. University of Hawai'i Press, Honolulu.</p> <p>Clark, John R. K. 2002. <i>Hawai'i Place Names: Shores, Beaches, and Surf Sites</i>. University of Hawai'i Press, Honolulu.</p> <p>Esaki, Dr. Paul. Personal Interview. August 30, 2005.</p> <p>Gutmanis, June. 1986? <i>Pohaku: Hawaiian Stones</i>. Institute for Polynesian Studies, Brigham Young University Hawai'i, Lā'ie.</p> <p>Hale'ole, S.N. Translated by Martha Warren Beckwith. 1997. <i>Ka Mo'olelo o Lā'ieikawai: The Hawaiian Romance of Lā'ieikawai</i>. First People's Productions, Honolulu.</p> <p>Kaua'i Historical Society (KHS). Review of various paper files related to Anahola, Kaua'i. September 6, 2005.</p> <p>Lenn, William Kulia Mokumaia (sp?). Personal Interview. September 6, 2005.</p> <p>Licona, Roland. Personal Interview. August 18, 2005.</p> <p>Lovell, Hosea and Jane. Personal Interview. September 6, 2005.</p> <p>Newton, H.E. 1906. <i>Hawaii Territory Survey: Anahola-Kamalomalo Kaua'i</i>. Survey by F.E. Harvey and G.F. Wright December 1904. Government Survey Registered Map No 2282</p> <p>Pukui, Mary Kawena. 1983. <i>'Ōlelo No 'eau: Hawaiian Proverbs and Poetical Sayings</i>. Bishop Museum Press, Honolulu.</p> <p>Pukui, Mary Kawena and Samuel H. Elbert. 1986. <i>Hawaiian Dictionary</i>. University of Hawai'i Press, Honolulu.</p> <p>Pukui, Mary Kawena, Samuel H. Elbert and Esther T. Mookini. 1974. <i>Place Names of Hawai'i</i>. University of Hawai'i Press, Honolulu.</p> <p>Rice, William Hyde. 1923. <i>Hawaiian Legends</i>. Bishop Museum Bulletin 3. Bishop Museum Press, Honolulu.</p>
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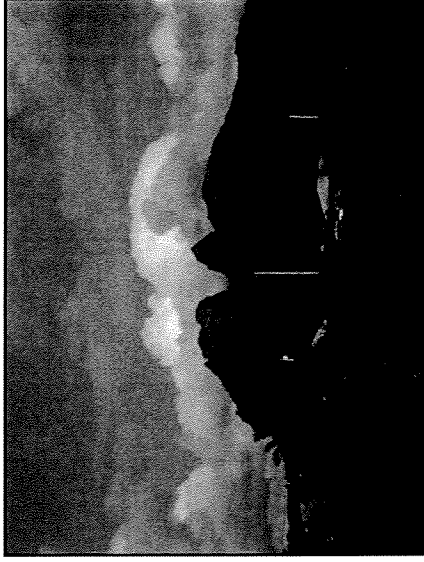
Photograph 1: Hōkū'alele and Kalalea as seen from Hōkū'alele Road.



Photograph 2: Hōkū'alele and Kalalea as seen behind the Anahola Japanese Community Association Hall on Pu'u Hale Loop.



Photograph 3: Hōkū'alele and Kalalea as seen from the lookout above Anahola Beach Park.



Photograph 4: Hōkū'alele and Kalalea as seen from Kukuhihale Road.



Photograph 5: Hōkū 'ālele and Kalalea as seen from the Anahola Clubhouse Park.

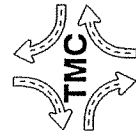
APPENDIX | E

TRAFFIC IMPACT ANALYSIS REPORT

FINAL TRAFFIC IMPACT ANALYSIS REPORT
FOR THE PROPOSED

ANAHOLA RESIDENCE LOTS, UNIT 6

PREPARED FOR
AKINAKA & ASSOCIATES, LTD.
January 8, 1996



PREPARED BY
THE TRAFFIC MANAGEMENT CONSULTANT
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FINAL TRAFFIC IMPACT ANALYSIS REPORT FOR THE PROPOSED

ANAHOLA RESIDENCE LOTS, UNIT 6

I. Introduction

A. Purpose of the Study

The purpose of this study is to analyze the traffic impacts resulting from the development of the proposed Anahola Residence Lots, Unit 6 in Anahola, Kauai, Hawaii. This report presents the findings and recommendations of the study.

B. Scope of the Study

1. Description of the proposed project.
2. Description of the study area.
3. Relationship to previous studies in the Anahola area.
4. Evaluation of existing roadway and traffic conditions.
5. Estimation of future traffic without the project traffic.
6. Analysis of future traffic including the project traffic.
7. The identification and analysis of traffic impacts resulting from the proposed project.
8. Recommendation of traffic improvements that would mitigate the impacts identified in this study.

II. Project Description

A. Location and Access

The project site is located in Anahola, Kauai. The project site is identified as Tax Map Key (4) 4-08-03:Por. 19. Access is proposed on Kukuhihale Road. Figure 1 shows the project location.

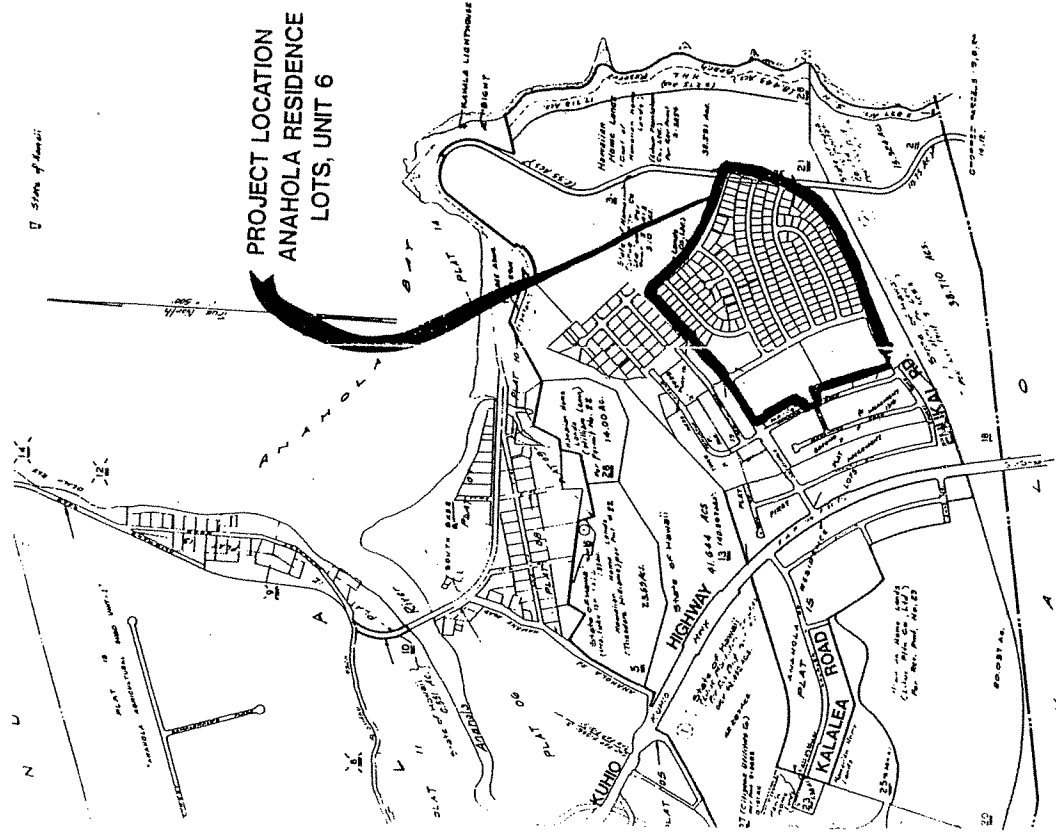


Figure 1 - Location Map

B. Land Use and Intensity

The proposed Anahola Residence Lots, Unit 6 would contain 250 single family residential lots. The proposed project also includes two school sites: a 200-student public elementary school and an 80-student private school. The proposed project is expected to be fully developed and built out by 1999. The school site plans have not been developed at this writing. Figure 2 shows the preliminary subdivision plan.

III. Study Area Conditions

A. Study Area

The study area includes the Kuhio Highway intersections at Kalalea Road, Kukuihale Road, and Ioane Road. The existing land use in the study area is primarily rural residential.

B. Anticipated Future Development

Future development in the Anahola area is documented in the "Traffic Impact Assessment Report for the Proposed Anahola Residence Lots, Unit 4" (TIAR), dated February 15, 1990, and its Supplemental TIAR, dated August 26, 1991, prepared by The Traffic Management Consultant. The Unit 4 TIAR includes the analysis of the 39-unit lot, Unit 5, which would also access Kukuihale Road.

IV. Existing Traffic Conditions

A. Site Accessibility

1. Area Roadway System

Kuhio Highway is a two way, two lane arterial highway providing access to the region. Kuhio Highway is unsignalized at Kukuihale Road. The posted speed limit in the vicinity of the project site is 35 miles per hour (mph).

Kukuihale Road is a two lane, two way paved roadway, which leads to Anahola Beach Park and connects to Anahola Beach Road. Kukuihale Road intersects Kuhio Highway at a stop-controlled Tee-intersection.

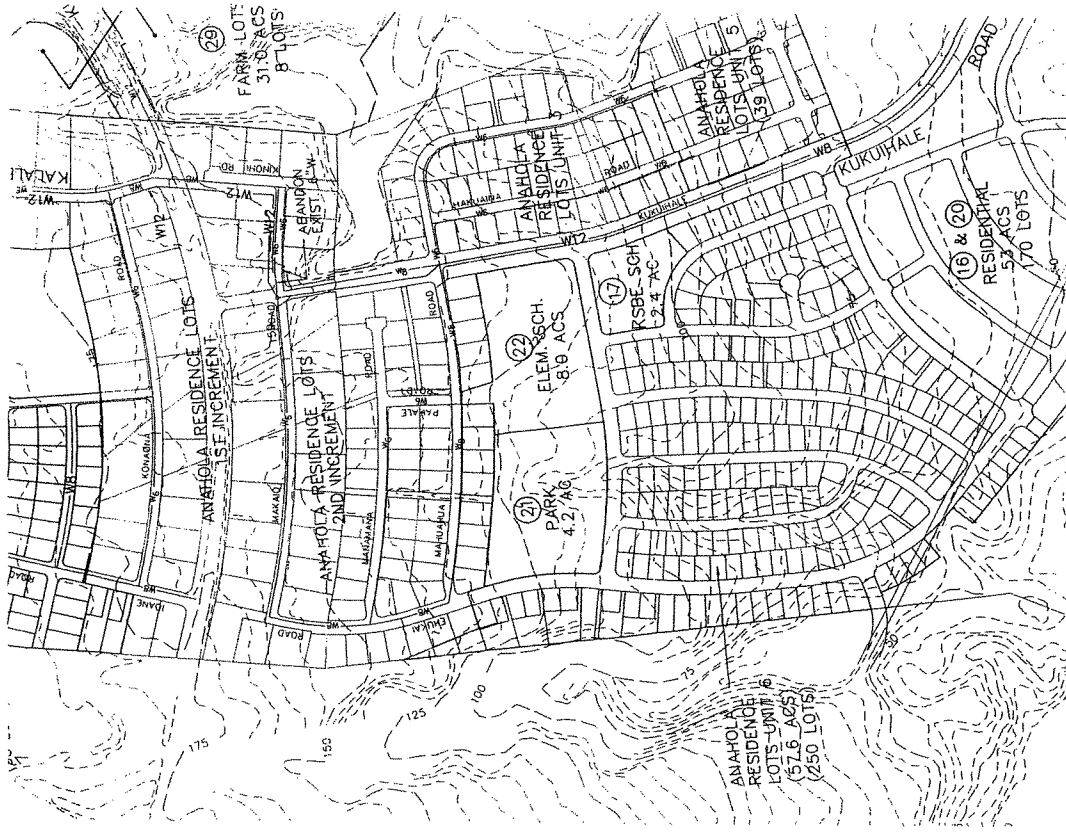


Figure 2 - Site Plan

B. Traffic Volumes and Conditions

1. General

a. Field Investigation

The existing traffic count data, collected in the 1990 TIAR, is updated to 1995 conditions, using more recent data obtained from the State Department of Transportation (DOT).

b. Capacity Analysis Methodology

The highway capacity analysis performed for this study is based upon procedures presented in the "Highway Capacity Manual" (HCM), Special Report 209, Transportation Research Board, 1985 and the "Highway Capacity Software", Federal Highways Administration.

Level of Service (LOS) is "defined as a qualitative measure describing operational conditions within a traffic stream". Several factors are included in determining LOS such as: speed, delay, vehicle density, freedom to maneuver, traffic interruptions, driver comfort, and safety. LOS "A", "B", and "C" are considered satisfactory levels of service. LOS "D" is generally considered a "desirable minimum" operating level of service. LOS "E" is an undesirable condition and LOS "F" is an unacceptable condition.

"Volume-to-capacity" (v/c) ratio is another measure indicating the relative traffic demand to the road's traffic carrying ability. A v/c ratio of 0.50 indicates that the traffic demand is utilizing 50% of the roadway's capacity.

2. Existing Peak Hour Traffic Analysis

The AM peak hour of weekday traffic on Kuhio Highway occurs between 7:15 AM and 8:15 AM. Kukuihale Road operates at satisfactory LOS. Kuhio Highway, south of the project site, operates at LOS "D" with a v/c ratio of 0.41. An exclusive left turn lane on southbound Kuhio Highway is not warranted at the intersection during the existing AM peak hour of traffic. Traffic signals are not warranted during the existing AM peak hour of traffic. Figure 3 illustrates the existing AM peak hour traffic.

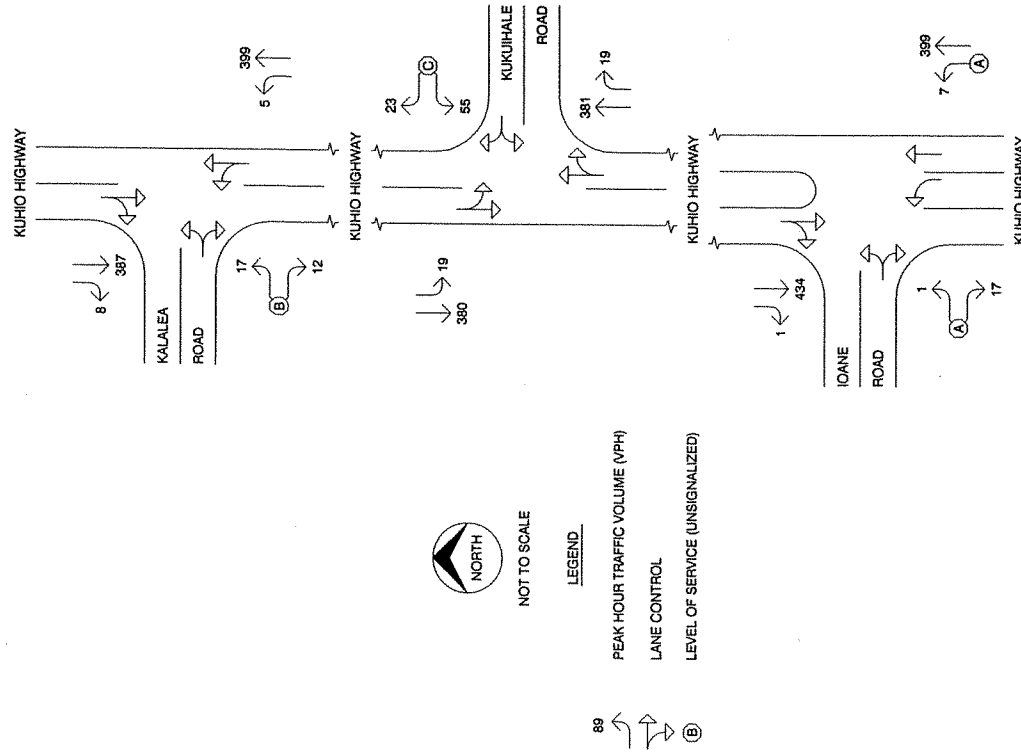


Figure 3 - Existing AM Peak Hour Traffic

The PM peak hour of weekday traffic on Kuhio Highway occurs between 3:45 PM and 4:45 PM. Kukuihale Road again operates at satisfactory LOS. Kuhio Highway, south of the project site, operates at LOS "D" with a v/c ratio of 0.55. An exclusive left turn lane and traffic signals are not warranted at the intersection during the existing PM peak hour of traffic. Figure 4 depicts the existing PM peak hour traffic.

V. Projected Traffic

A. Site Traffic

1. Trip Generation

The trip generation methodology, used in this study, is based upon generally accepted techniques developed by the Institute of Transportation Engineers (ITE) and published in "Trip Generation", 5th Edition, 1991. The ITE trip rates for single family residential subdivision are developed by correlating the vehicle trip generation data with various land use characteristics, such as vehicle trips per dwelling unit. Table 1 summarizes the trip generation characteristics.

Table 1. Trip Generation Summary					
Single Family Lots - 250 Units		Residential Trips		School Trips	Total Trips
Peak Hour of Adjacent Street Traffic	AM	Enter	46	50	96
		Exit	132	34	166
		Total	178	84	262
	PM	Enter	160	12	172
		Exit	86	24	110
		Total	246	36	282

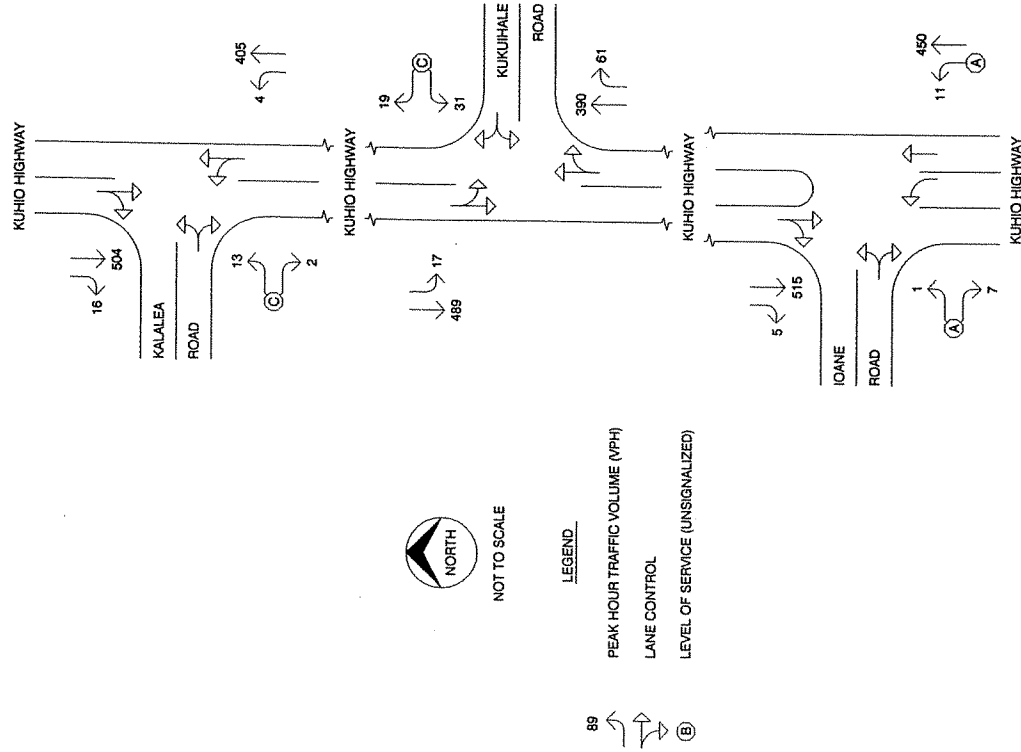


Figure 4 - Existing PM Peak Hour Traffic

The proposed 250-unit subdivision is expected to generate 178 vehicles per hour (vph) during the AM peak hour of adjacent street traffic, 46 vph entering and 132 vph exiting the site; and 246 vph during the PM peak hour of adjacent street traffic, 160 vph entering and 86 exiting the site.

The future development of the school sites are expected to generate a total of 84 vph during the AM peak hour, 50 vph entering and 34 vph exiting the site; and 36 vph during the PM peak hour, 12 vph entering and 24 exiting the site.

2. Trip Distribution

The distribution of site generated traffic is based upon existing patterns of traffic observed in the study area. During the AM peak hour of traffic, the directional split of traffic exiting the existing subdivision was 68% southbound and 32% northbound. During the PM peak hour of traffic, the directional split of traffic entering the existing subdivision was 67% from the south and 33% from the north.

B. External Traffic

Historic traffic count data between 1969 and 1993, obtained from the State DOT, indicates an average 3.28 percent annual growth in traffic on Kuhio Highway in the vicinity of the project. For the purposes of this study, this trend is anticipated to continue to the Year 1999. The growth represents a 13.12 percent increase in traffic over 1995 conditions.

C. 1999 Traffic Volumes Without Project

Figures 5 and 6 depict the 1999 AM and PM peak hour traffic conditions without project, respectively. Kukuihale Road is expected to operate at LOS "D" during both the AM and PM peak hours of traffic without project. Kalalea Road is expected to operate at LOS "D" during the PM peak hour without project. Kuhio Highway, south of the project site, is expected to continue to operate at LOS "D", however the v/c ratios increase to 0.45 and 0.53 during the AM and PM peak hours, respectively. A left turn lane on southbound Kuhio Highway is warranted under 1999 PM peak hour traffic without project.

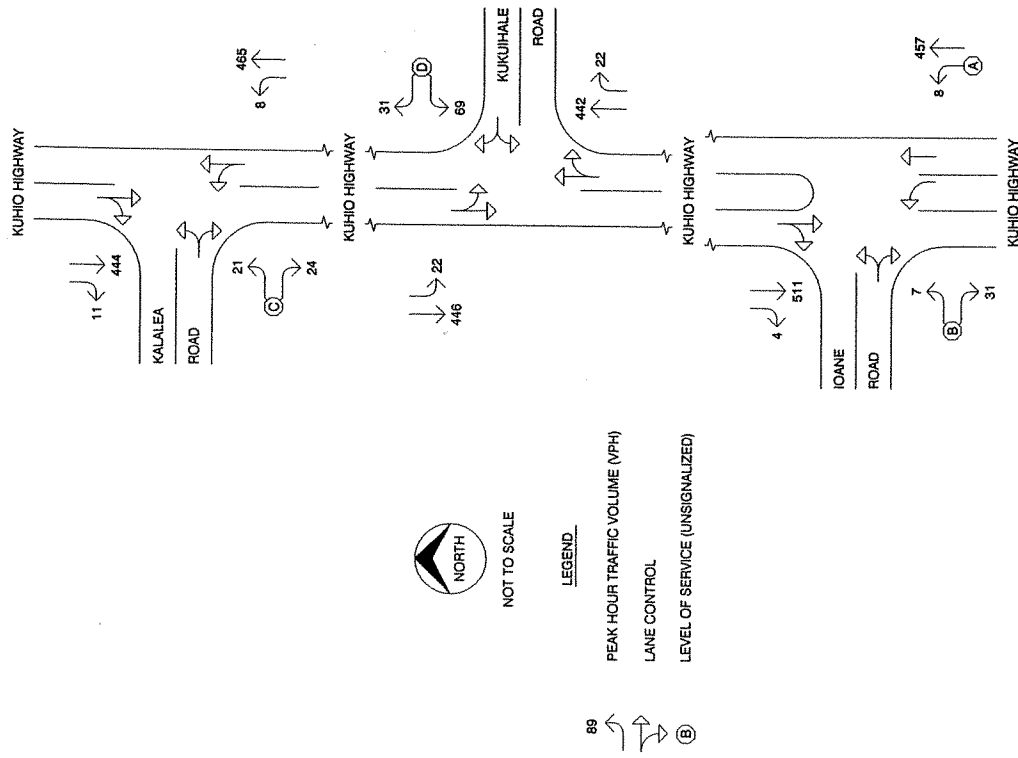


Figure 5 - 1999 AM Peak Hour Traffic Without Project

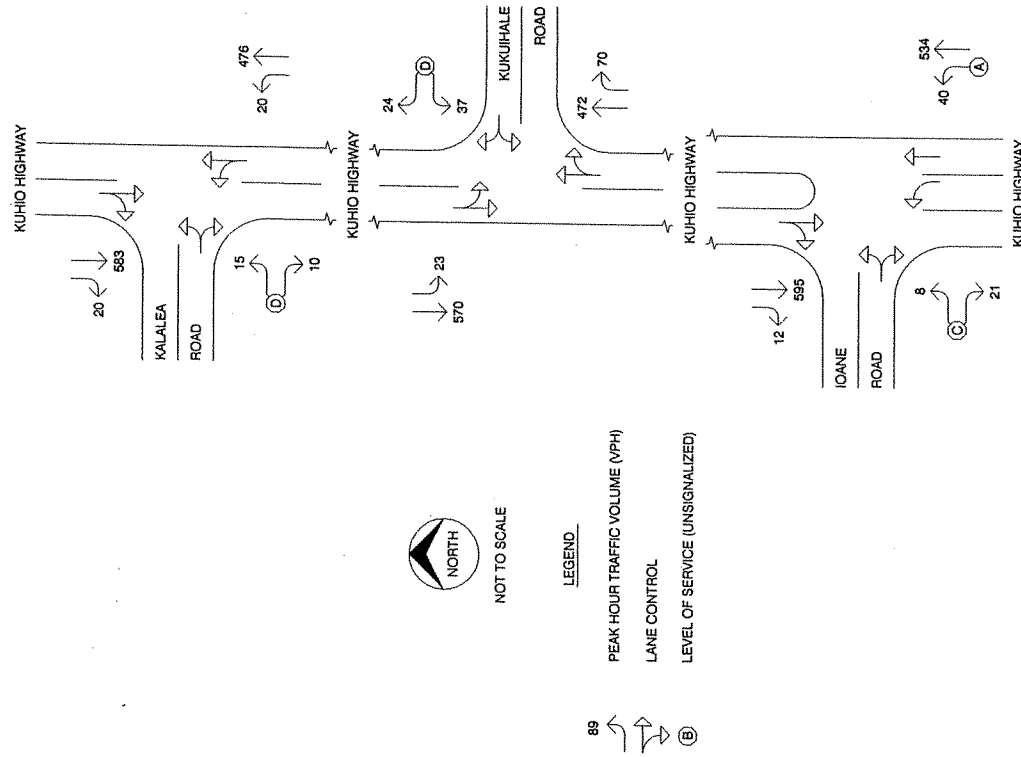


Figure 6 - 1999 PM Peak Hour Traffic Without Project

VI. Traffic Impact Analysis

A. General

Figures 7 and 8 depict the site-generated traffic in the study area superimposed over the 1999 AM and PM peak hour traffic conditions, respectively. A left turn deceleration/storage lane on Kuhio Highway at the Kukuhihale Road intersection is warranted under 1999 traffic conditions and is assumed to be constructed for the purposes of this analysis. Furthermore, it is assumed that Kukuhihale Road at Kuhio Highway is widened to provide separate left and right turn lanes.

B. 1999 Peak Hour Traffic With Project

During both the AM and PM peak hours with project, the left turn movement from Kukuhihale Road to southbound Kuhio Highway deteriorates to LOS "F". Kalalea Road continues to operate at LOS "D" during the PM peak hour with project. Ioane Road also operates at LOS "D" during the PM peak hour with project. The other traffic movements in the study area operate at satisfactory LOS.

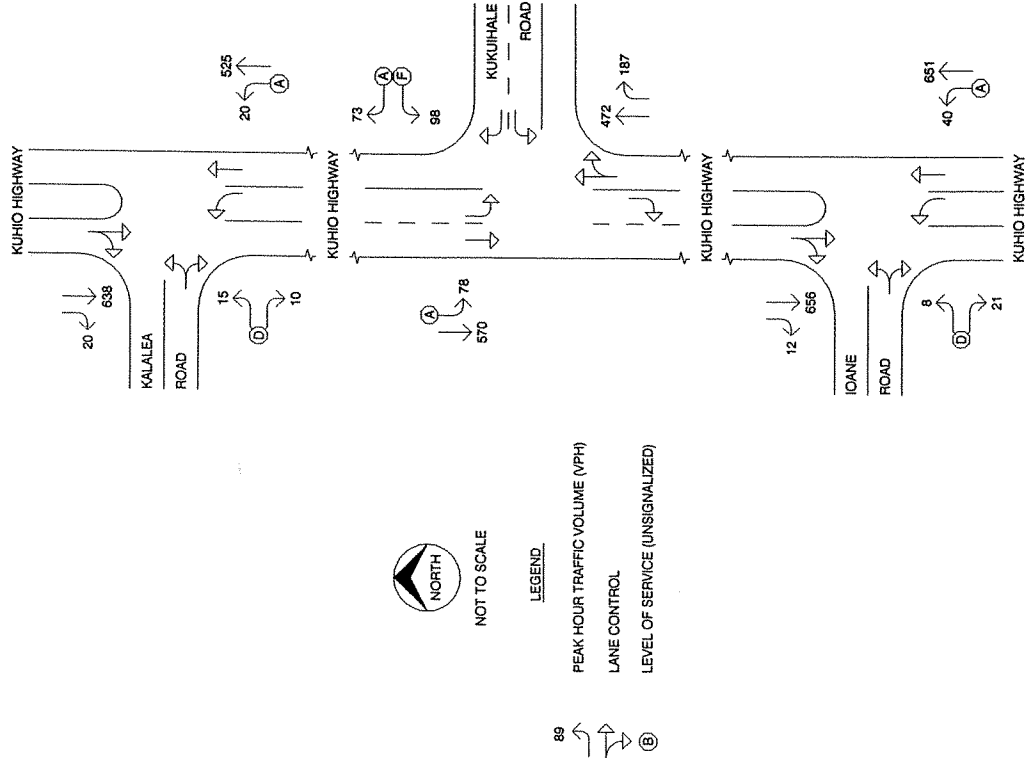
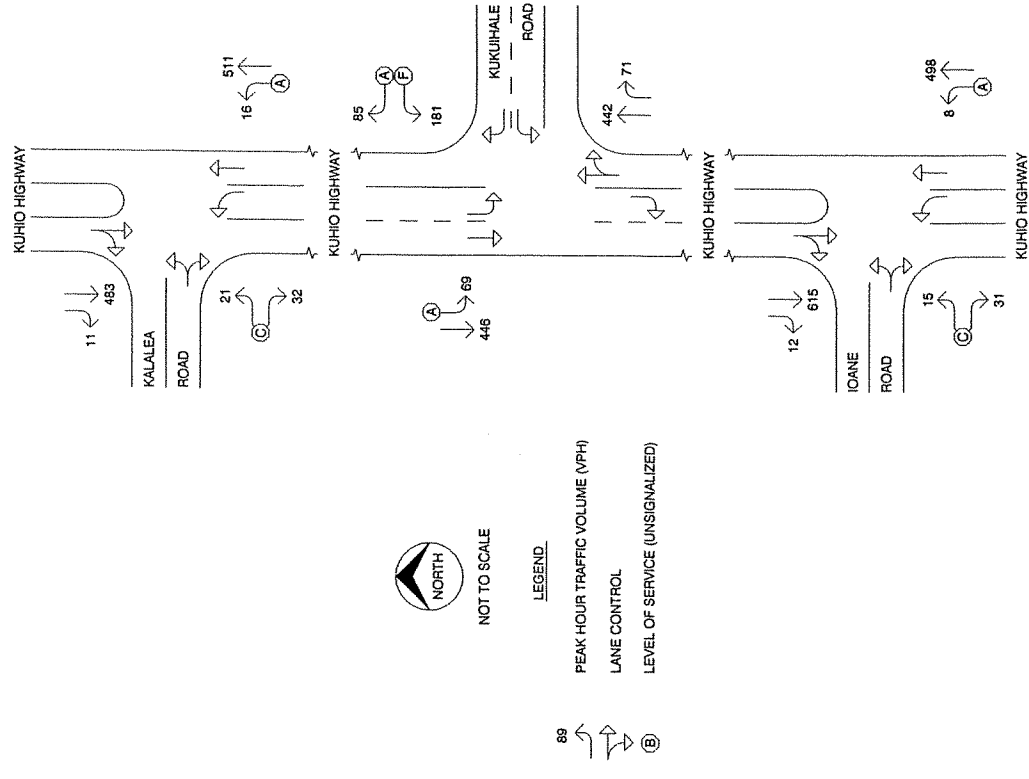
During the AM peak hour with project, Kuhio Highway is expected to continue to operate at LOS "D", with the v/c ratio increasing to 0.53. However, Kuhio Highway is expected to deteriorate to LOS "E" during the PM peak hour with project, with the v/c ratio increasing to 0.60.

VII. Recommendations and Conclusions

A. Recommendations

In general, all road improvements should be designed in accordance with the applicable State Department of Transportation and County of Kauai standards.

1. A left turn lane should be constructed on the southbound Kuhio Highway at the Kukuhihale Road. The proposed left turn lane should provide 200 feet of storage length plus a 180-foot taper length. A schematic layout is shown on Figure 9.



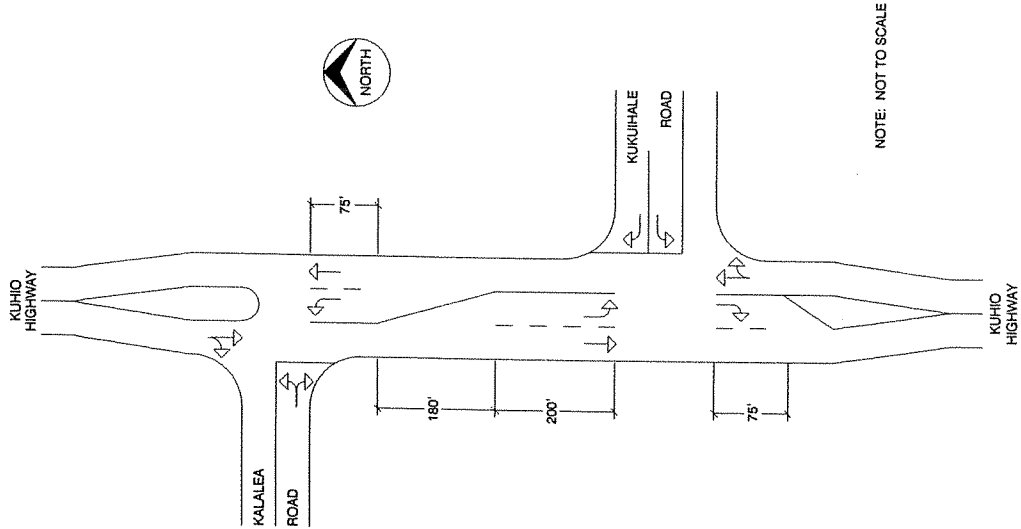


Figure 9 - Conceptual Intersection Improvement

2. A left turn median storage lane should be constructed on the south leg of Kukulalea Highway. The median storage lane would provide a shelter lane for vehicles turning left from Kukulalea Road, waiting to enter the southbound flow of traffic on Kukulalea Highway. A minimum storage length of 75 feet should be provided. The proposed shelter lane would mitigate the LOS "F" to LOS "D" conditions on the left turn movement from westbound Kukulalea Road to southbound Kukulalea Highway during the peak hours of traffic.
3. Kukulalea Road should be widened at Kukulalea Highway to provide separate left and right turn lanes.
4. A left turn lane should be constructed on northbound Kukulalea Highway at Kukulalea Road. The proposed left turn lane should be a minimum of 75 feet of storage length and a 180-foot long taper.

The installation of traffic signals is not recommended at this time. However, the intersection should be monitored to determine future traffic signal warrants.

B. Conclusions

Based upon the analysis and recommendations discussed in this report, the proposed Anahola Residence Lots, Unit 6 are not expected to have any significant impact on traffic operations in the study area.