KAHEAWA WIND I

COMMUNITY OUTREACH + COMMUNICATIONS PLAN

DECEMBER 2023

This document will be continuously updated as stakeholders are properly engaged, and feedback is provided to help adjust the plan. We welcome guidance and mana'o from members of the community on how to best engage with them and/or support the community in valuable ways.

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Introduction

Brookfield Renewable US, via its platform company TerraForm Power, owns and operates Kaheawa Wind I and II on Maui, which generate enough renewable electricity to power approximately 25,000 Maui homes each year. Kaheawa I and II have been operating since 2006 and 2012 on land leased from DLNR.

Brookfield Renewable US operates one of the world's largest publicly traded, pure-play renewable power platforms. Their operating portfolio consists of 200 utility-scale renewable facilities in the United States across hydroelectric, wind, solar, and storage technologies with the ability to generate 8,206 MW and power 2 million homes annually. With its portfolio of clean energy facilities in the United States, including two sites in Hawai'i, TerraForm Power's portfolio avoids 11 million metric tons of emissions annually.

Project Overview

Kaheawa Wind reaches an elevation of 3,000 feet in the Lāhainā District, on the slopes of the Ukumehame land division of the West Maui Mountains. The site is bounded by Papalaua Gulch in the west and Manawainui Gulch in the east.

Located on about 350 acres above Māʻalaea in the West Maui Mountains, Kaheawa I and II have been operating since 2006 and 2012 respectively on land leased from DLNR. Phase One (KWP I) of the project has a capacity of 30 MW from 20 GE Energy 1.5 MW wind turbines. Phase Two (KWP II) includes 14 1.5 MW turbines below phase one with a total capacity of 21 MW.

Kaheawa Wind I and II are together one of the largest wind projects in the state and one of the best wind locations on Maui. Currently, the combined facility generates enough renewable electricity annually to power approximately 25,000 Maui households and contributes to reliability and generation resource diversity.

Kaheawa Wind is the first wind farm in the United States to use a Habitat Conservation Plan (HCP) to protect the long-term health of local species, including three endemic birds and one endemic bat.

To continue to generate reliable renewable energy for the island of Maui, Kaheawa Wind participated in the Maui Electric Company (MECO) Stage 3 RFP and was selected to the Final Award Group for a new 20-yr PPA if approved by the Public Utilities Commission.

With this plan, Kaheawa Wind looks forward to engaging with the community and a wide range of stakeholders to continue generating renewable energy from this site for today, and for future generations.

In preparation for the Maui Stage 3 RFP, Kaheawa Wind has contracted DTL Hawaiʻi, a Hawaiian strategy studio, to prepare the following Kaheawa Wind Community Outreach and Communications Plan for Kaheawa Wind I.

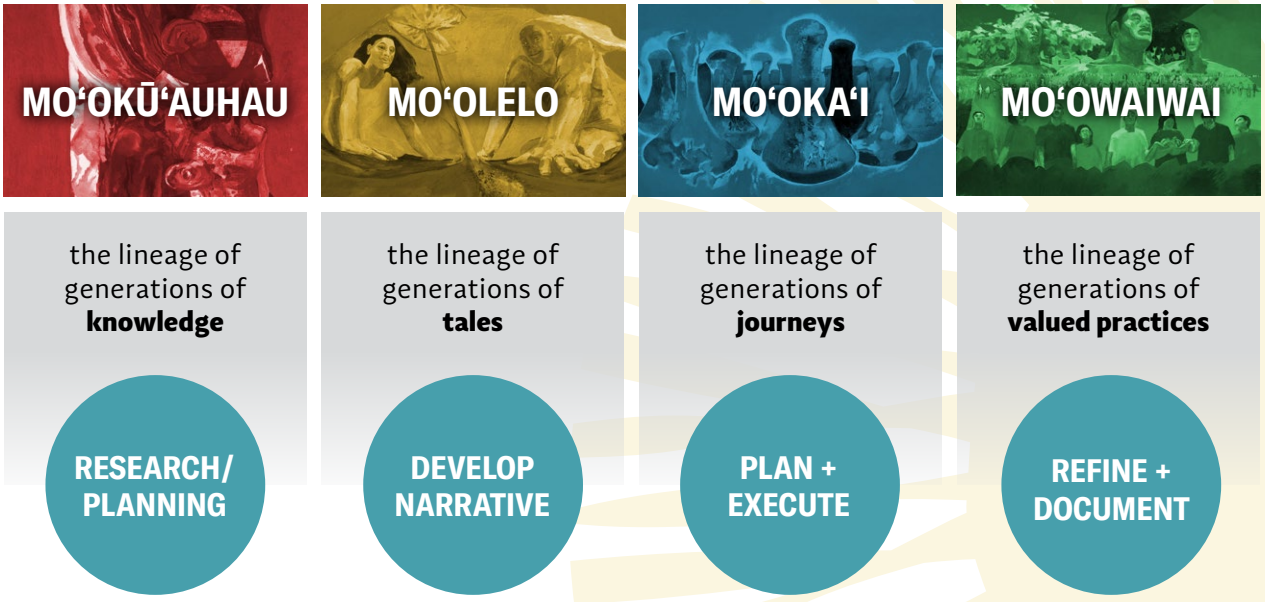
Our Approach

Community engagement is connecting human to human. It is seeing and honoring the whole person. It is an opportunity to lift and inspire, and collectively, strengthen relationships within communities.

This plan is centered around Hawaiian values as a valuable method to root engagement in connection, and reconnection to each other and to places, ʻāina. The ability to build connection to the past and bring ʻāina (land) and kānaka (man) closer together is a valuable way to create a greater sense of ownership. When community feels connected, they are more inclined to get involved in the process. When community gets involved, change can be embraced with greater openness and acceptance. When community sees their input integrated into the process, they are more likely to help find solutions. And when challenges arise, community will be more willing to approach obstacles with greater openness and acceptance.

To successfully attract the full participation of community, connect in meaningful ways, and empower community voices every step of the way, Kaheawa Wind is committed to providing ongoing and transparent information to build trust and respect with communities that will be most closely touched by the project's boundaries.

To educate, inform, and gather feedback from target communities and stakeholders, a four-part methodology will be deployed to ground stakeholders in the knowledge of Hawaiʻi's past, with an eye towards its future, and mindful of our shared kuleana (responsibility) to Hawaiʻi's kūpuna (ancestors) and moʻopuna (descendants).



PHASE 1: MO‘OKŪ‘AUHAU

The Lineage of Generations of Knowledge

Every project begins as close to its source as possible. Through the research and development around Hawai‘i’s energy history, the community can determine its relevance and make stronger connections with the place and people of the project.

CULTURAL BRIEF

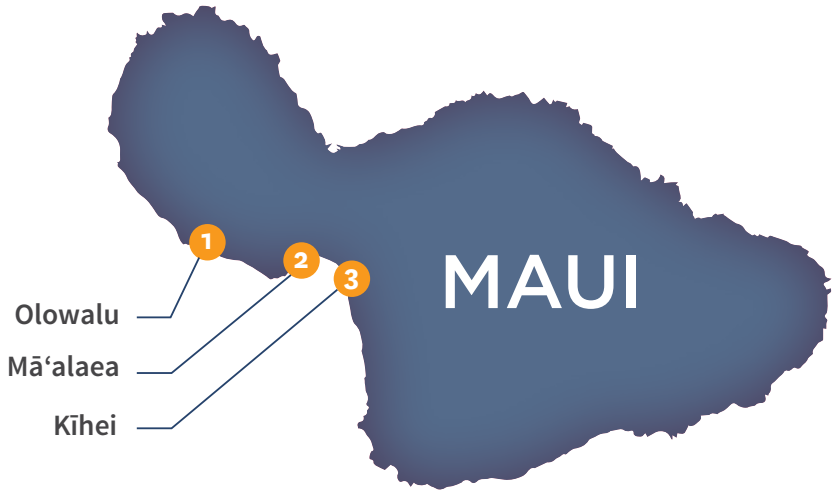
The first step of our strategy began proactively last year with the development of a Cultural Brief and Community Audit which helped to lay the foundation for the outreach to follow. By researching the cultural and historical aspects of the project site and the surrounding community, DTL developed a Cultural Brief to identify valued cultural, historical, and natural resources in the area by summarizing significant events, people, and places relevant to the project area.

Refer to Appendix A for the Cultural Brief in its entirety.

COMMUNITY PROFILES

A secondary outcome of this initial phase was to capture the community profiles and demographics of residents located closest to, or who could be potentially most affected by, the project. The project is closest to the communities of Mā‘alaea and Olowalu. However, the Kīhei community also has a visual line of site of the existing wind turbines.

The 2020 Census conducted a count of residents of the United States and five U.S. territories. It marked the 24th census in U.S. history and the first time that all households were invited to respond to the census online. Below is some of the most pertinent data for this report.



Olowalu Demographics[1]

Spanning over 3 miles, Olowalu has a population of 100 people. The average household income in Olowalu is $89,688. The median rental costs are $1,938 per month, and the median house value is $1.28 M.

$1.28 M
median house value

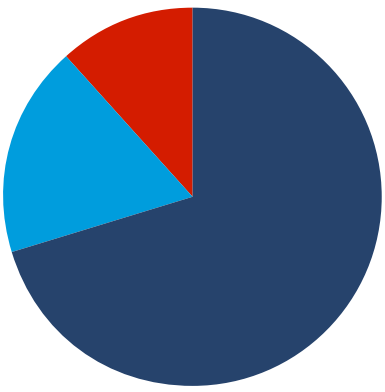
$89,688
median household income

$1,938
median rent

100
population

Here's the top 3 breakdown of ethnicity.

- White **70.49%**
- Two or more races **18.03%**
- Native Hawaiian or Pacific Islander **11.48%**



1 2020 Census: https://data.census.gov/all?q=Olowalu+CDP,+Hawaii

Mā‘alaea Demographics[2]

The average household income in Mā‘alaea is $76,250. The median rental costs in recent years comes to $1,685 per month, and the median house value is $389,200.

$389,200
median house value

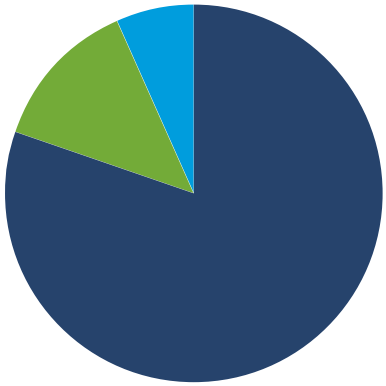
$76,250
median household income

$1,685
median rent (gross)

310
population

Here's the top 4 breakdown of ethnicity.

- White **76.36%**
- Asian **12.4%**
- Two or more races **6.2%**
- Native Hawaiian or Pacific Islander **0%**



Kīhei Demographics[3]

With a population of 21,423, Kīhei is the 12th largest city in Hawai‘i. The average household income in Kihei is $84,708. The median rental costs in recent years comes to $1,666 per month, and the median house value is $619,700.

$619,700
median house value

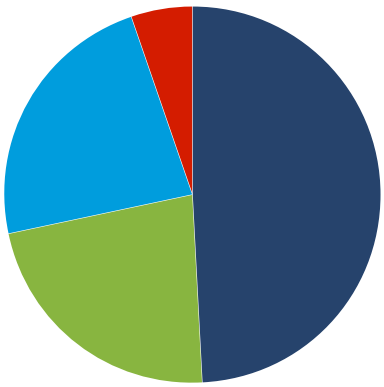
$84,708
median household income

$1,666
median rent (gross)

21,423
population

Here's the top 4 breakdown of ethnicity.

- White **48.86%**
- Asian **22.31%**
- Two or more races **22.92%**
- Native Hawaiian or Pacific Islander **4.98%**



2 2023 Census Bureau: https://data.census.gov/all?q=Maalaea+CDP,+Hawaii
3 2023 Census Bureau: https://data.census.gov/all?q=kihei

KEY STAKEHOLDERS

Our outreach will focus on our host communities and other stakeholders who were identified based on the proximity to the project's location, their relationship with renewable energy, and their cultural and community leadership. In capturing a cross section of representation from residents, native Hawaiians, businesses, and community groups, these individuals and organizations were prioritized based on their interest in learning more about the project and/or providing valuable insight. As the project advances, we will continue to interface with as many stakeholders as possible.

Government Agencies

- County of Maui Planning Department
- County of Maui Office of Economic Development
- Department of Land and Natural Resources
- State Historic Preservation Department
- Hawai‘i State Energy Office
- Public Utilities Commission

Elected Officials

- Mayor Richard Bissen
- Maui County Council Chair Alice Lee
- South Maui County Councilmember Tom Cook
- West Maui County Councilmember Tamara Paltin
- State Senator Angus McKelvey (Mā‘alaea, West and South Maui)
- State Representative Elle Cochran (Mā‘alaea)

Neighboring Landowners/ Businesses

- Wailuku Water
- Department of Land and Natural Resources
- Mahi Pono
- The King Kamehameha Golf Club
- Kahili Golf Course
- Pacific Biodiesel Technologies
- Pacific Whale Foundation
- Mā‘alaea Small Boat Harbor
- Maui Ocean Center

Community Associations

- Mā‘alaea Village Association
- Kihei Community Association

Environmental + Conservation Groups

- Malama Maui Nui
- Maui Nui Marine Resource Council
- East Maui Watershed Partnership
- Keālia Pond National Wildlife Refuge
- Mauna Kahawai
- Hawai‘i Land Trust
- Sierra Club
- Maui Tomorrow
- Maui Cultural Lands

Native Hawaiian Leaders + Organizations

- Hinano Rodrigues
- Ekolu Lindsey
- Dane Maxwell
- Ke‘eaumoku Kapu
- Tosh Palafox
- Aha Moku o Maui
- Maui Native Hawaiian Chamber of Commerce
- Nā Wai ‘Ehā
- Maui Lāna‘i Island Burial Council

Other Community Organizations + Businesses

- Maui Hotel & Lodging Association
- Maui Chamber of Commerce
- Maui Economic Development Board
- Maui Economic Opportunity
- Hawai‘i Hotel Alliance
- Kīhei Community Center
- Kīhei Youth Center
- Kīhei Rotary Club
- Lions Club
- Maui Canoe Club
- Kīhei Canoe Club

** As community engagement evolves, so too will this list.*

PHASE 2: MO'OLELO

The Lineage of Generations of Tales

Hawaiian culture is an oral culture, and we believe in the power of talking to people. By talking story with key community and industry thought leaders, we start to understand how best to design the community outreach and engagement program.

KNOWLEDGE LEADER CONVERSATIONS

With a commitment to engage stakeholders early and often, Kaheawa Wind outreach commenced in 2022 with the development of an interview guide, identification of local knowledge leaders, and ultimately one-on-one interviews. An initial round of five (5) Knowledge Leader Interviews was conducted to begin the process of listening and learning.

To inform our proposal and development of the community outreach plan, a series of questions were discussed to understand the audience groups of each community, how networks are organized within the community, how information is best disseminated, and how energy fits into daily conversations.

These conversations were intended to remain confidential in order to glean honest and candid feedback from various community leaders. We respect that these individuals were speaking in their personal capacity and would like to maintain their anonymity. All conversations were confidential, however a summary of the feedback captured below.

- Support for project since the infrastructure is already in place
- Support for more renewable energy on Maui in general
- Interest in maintaining an environmental legacy for the protection of nēnē, owls, and bats
- Island wide concern about runoff (due to development, climate change, and/or deer)
- Interest in energy affordability
- Opportunity to educate community and communicate energy and cost savings benefits to homeowners
- Opportunity to plant more native species and protect from invasives

OUTREACH CONDUCTED TO-DATE

In addition to the outreach previously mentioned, ten (10) in-person meetings were completed in early 2023. These introductory meetings provided an opportunity to share information about its history, economic benefits, and opportunities for its future. Insight from these interactions were valuable in reconfirming the project's goals, renewable energy priorities, general community sentiment, and how Kaheawa Wind can best support the community.

Mahalo to these leaders and their staff for welcoming a meeting with our team.

Troy Hashimoto
Representative House District 10

Ekolu Lindsey
Maui Cultural Lands

Alice Lee
Maui County Councilmember

Ike Guru
Maui County's Energy Commissioner

Leo Caires
Maui County Mayor's Chief of Staff

Aaron "Motuki" Drake
Maui County's Office of Innovation and Sustainability

Leslie Wilkins
Maui Economic Development Board

Tom Cook
Maui Councilmember

Justin Woodson
Representative House District 9

Angus L.K. McKelvey
Senate District 6

Elle Cochran
Representative House District 14

Mark Glick
Hawai'i State Energy Office

PROJECT BENEFITS

In accordance with the Maui Island Plan 2030 and the Draft South Maui Community Plan, Kaheawa Wind is committed to delivering clean energy at below the cost of fossil fuels, increasing energy security, supporting resilient systems, and being responsible stewards of this ʻāina for the betterment of safe and healthy communities for all. To foster a thriving and balanced ecosystem that honors the place, people, and natural and cultural resources, here examples of some of the project benefits that are being shared with stakeholders.

Deliver clean, renewable, locally generated energy at far below the cost of fossil fuels

- Kaheawa Wind 1 proposes to deliver clean energy to Maui below the cost of fossil fuels and below its current rate
- Unlike fossil fuel powered generators that expose consumers to price volatility, Kaheawa Wind 1's cost of energy will remain fixed over its contract term

Maximize value of existing infrastructure & provide essential energy resource diversity

- Kaheawa Wind is an essential contributor to resource diversity and system reliability on Maui, and is a highly productive wind site
- Extending the life of Kaheawa Wind 1 will reduce future land disturbance required to build new generating resources to replace it

Deliver a new community benefits program

- Kaheawa Wind 1 will collaborate with the community on design and delivery of a new community benefits program that reflects Maui's needs and choice, to be delivered with local, non-profit partners
- Reflecting our commitment to a just transition for Maui, Kaheawa Wind 1 has committed to a program funding level significantly above HECO's Stage 3 guidance

PHASE 3: MO'OKA'I

The Lineage of Generations of Journeys

COMMUNITY OUTREACH + COMMUNICATIONS PLAN

Kaheawa Wind's community outreach strategy supports proactively learning from Maui residents, fostering understanding of the project, and inviting ongoing community input. The design and execution of a Community Outreach and Communications Plan includes a journey of discovery, fact finding, clarity, and compromise. It builds off the meetings and outreach that began in 2022 and will continue throughout the project's entitlements and ongoing operations.

The plan and tactics shared in the following section are designed to achieve three core outreach and communication objectives:

1. Listen and learn from community to demonstrate care and commitment
2. Understand opportunities and mitigate against potential issues to find mutually acceptable and feasible solutions
3. Create a pipeline for continuous and transparent two-way communication to build support for the project

TACTICS

We understand the importance of conducting extensive community engagement to promote equitable outcomes. We also recognize there is no one way to do community engagement. Evaluating what we are trying to achieve will dictate what type of outreach and communication tactic is best suited for our needs.

Considering the level of outreach and best practices that have been shared from previous energy projects in Hawai‘i, we anticipate conducting outreach to compliment permitting and project milestones. Our intention with all outreach is to start surgically and then cast a wider net as project progresses throughout the state.

The following outreach and communication tactics have been identified as best practices to deliver on the project's stated objectives. Naturally, these efforts will thoughtfully evolve as deemed necessary by the community and will also be conducted in addition to meetings held specifically for the permitting process.

One-on-one Meetings: Kaheawa Wind will reach out directly to schedule one-on-one meetings will be organized with key stakeholders who represent a cross-section of the community (as shared above) in order to prepare key messages and presentation content for meetings to follow.

Small Group Meetings: By organizing a group of stakeholders within the same organization or entity, conversations can go deeper and very specific feedback can be collected.

Government Briefings: Informational briefings with elected officials from the State and County will keep area representatives and policy makers apprised of the project’s merits and milestones.

Public Hearings: Over 2024 - 2025, public hearings are expected to take place, in coordination with public agencies.

FAQs: Updated as outreach progresses to answer commonly asked questions.

Fact Sheet: One-sheeter including project details and benefits that can be shared at in-person outreach events, emailed, and posted online.

Project Website: Main source to direct community to for more info on the project’s timeline and benefits, outreach opportunities and reports, and to sign up for updates. www.kaheawawind.com

Email Distribution List: Email updates for important milestones including outreach invitations and construction notices.

Presentations: Presentations, or hard copy handouts reflective of slides, will be developed to introduce Kaheawa Wind, highlight proposal overview, illustrate visual simulations, and express community benefits.

Earned Media: Kaheawa Wind will consider media correspondence including, but not limted to, the distribution of media advisories and news releases to share project details and benefits.

OUTREACH COMMUNICATIONS

We know community members are busy, both personally and professionally, and have competing priorities every single day. To effectively communicate with the stakeholders (described on page 9) and execute the tactics, our outreach and communications philosophy is simple. At a minimum, the project will update stakeholders at least quarterly, and in advance of all major project milestones.

One-on-one meetings and government briefings will be an endeavor communicated via direct meetings in person and via teleconference and email. Small group meetings will be organized where appropriate to promote efficiency and greater collaboration. During the 2024 - 2025 permitting and community outreach phase, we anticipate multiple community meetings (e.g. Public Hearings) will be held in collaboration with select state agencies. Kaheawa will encourage community participation by leveraging our network and informing and inviting community stakeholders.

Community meetings will be promoted via Kaheawa Wind's website at www.kaheawawind.com, social media posts, and mailing lists. While these large format meetings won't require a RSVP, they will be encouraged for proper planning of meeting facilitators and refreshments.

In preparation for these outreach efforts and relevant public hearings, a multitude of methods will be utilized to articulate the project's scope and benefits, and ensure that the community at large is aware of these details. Presentations, FAQs, project fact sheets, website, marketing materials, and earned media opportunities will be some of the most valuable tools to educate the community about the project's value and outreach events.

Equally as important as the sharing, is the response. Acknowledging participation and input will be accomplished by sharing a summary of outreach takeaways via the project website. A community engagement report will be updated regularly and at the conclusion of the outreach phase. The report will be made available at www.kaheawawind.com.

TIMELINE

Kaheawa Wind is at the beginning of a multi year process with pre-development beginning in 2022, followed by permitting and community outreach, before maintainence and continued operation.

In general, the tentative timing and execution of outreach and communication components do overlap in real time. These components are iterative, allowing for new information or understanding to adjust and improve the strategy as things unfold. For example, we may find ourselves adjusting the approach, timeline, and stakeholders as community conversations evolve.

Being that Kaheawa Wind has not proposed any changes to the existing facility, the project anticipates the following outreach milestones and timeline (page 16).

2022 - 2023: PRE-DEVELOPMENT

MILESTONE	OUTREACH DESCRIPTION	FREQUENCY
Pre-RFP Submittal	• Confidential local knowledge leader interviews • One-on-one meetings • Government Briefings • Site Tours	Quarterly
Award Announcement	• Website live at kaheawawind.com	Once

2024 - 2025: Permitting + Community Outreach

MILESTONE	OUTREACH DESCRIPTION	FREQUENCY
Final Award Group Selection	• Continue engagement activities and outreach strategies including individualized email correspondence, one-on-one update meetings, and information sessions • Personalized email or phone calls to notify stakeholders of final award filing and highlight project benefits • Earned media, if approved	At least quaterly, but specific frequency will be determined in collaboration with the stakeholder preference
Permitting	• Continue engagement activities and outreach strategies including individualized email correspondence, one-on-one update meetings, and information sessions • Engage with Community members, non-profit partners, and other stakeholders to design the Community Benefits Program that will be initiated after the project re-commences operations under a new PPA • Personalized email or phone calls to notify stakeholders of final award filing and highlight project benefits • Community association briefing and educational sessions	Ongoing and at project milestones

2026: MAINTENANCE

MILESTONE	OUTREACH DESCRIPTION	FREQUENCY
Facility Maintenance	• Kaheawa Wind has not proposed any changes to the facility, and will be undertaking normal and customary maintenance to extend the life of the facility.	

DEC 2026 - DEC 2046: ONGOING OPERATIONS

MILESTONE	OUTREACH DESCRIPTION	FREQUENCY
Ongoing Operations	• Launch community benefits program • Educational site visits will be offered to stakeholders throughout the life of the project. • Prepare an outreach report that outlines the community engagement process, activities, and outcomes with all the identified local communities.	Ongoing

GOVERNMENT APPROVALS

Unlike siting and development of new renewable energy facilities, Kaheawa Wind has the advantage of leveraging the knowledge, data, and relationships gained from successful operation of this facility over the last 16 years. KWP I's existing entitlements, wealth of pre-construction and post-construction data, and lessons learned provide Kaheawa Wind with an in-depth understanding of the existing environmental conditions of the project site and the potential impacts of the continued operation of the facility.

Although new permits, permit amendments, or approvals will be needed for the project, they will be substantially the same as those in place for the existing facility. This allows for a solid understanding of approval timelines and permit requirements, which is expected to in turn facilitate a timely and predictable permit approval process. And based on the data obtained to date, there does not appear to be any known red flags or impacts that would impede the proposed project.

Key elements of the strategic permitting approach include (1) consultation with the appropriate agencies early and often through the permitting process; (2) updating existing and performing additional due diligence studies for any resources that may be impacted by the continued use; and (3) integration with a proactive community outreach effort.

The rationale for the permits that will likely be needed and the estimated timeline for approvals was provided by a permitting with extensive experience coordinating permitting efforts with DLNR and USFWS on Maui. The permitting team has been providing natural resources management planning, environmental impact assessments, community involvement, regulatory compliance, permitting, environmental engineering, and other environmental services for more than 31 years in the Hawaiian Islands. In that time, the team has compiled an extensive portfolio of project experience assisting key decision makers with complex project evaluations specifically for renewable energy projects. Specifically, the permitting team has National Environmental Policy Act (NEPA) and Hawai'i Environmental Policy Act (HEPA) compliance experience; terrestrial and aquatic wildlife and botanical survey experience; and has completed Habitat Conservation Plans (HCPs) for wind energy projects in Hawai'i. The team has been providing HCP monitoring and reporting services for Kaheawa Wind since 2019. This includes working with regulatory agency staff that will be involved in the assessment of this proposed project. The combination of past experience at Kaheawa Wind and broad experience in Hawai'i has allowed the permitting team to thoroughly evaluate what is likely to be needed to gain project approvals and to allocate appropriate time frames for that work to occur.

All discretionary and non-discretionary land use, environmental and construction permits, and approvals anticipated to be required for development, financing, construction, and operation of the project include:

- Incidental Take Permit (ITP) and preparation of federal Habitat Conservation Plan (HCP)
- National Environmental Policy Act (NEPA) Compliance
- National Historic Preservation Act (NHPA), Section 106 Consultation
- Determination of No Hazard and Notice of Proposed Construction or Alteration
- Conservation District Use Permit (Board Permit)
- Incidental Take License (ITL) and preparation of a state HCP
- HEPA/HRS Chapter 343 Compliance

If selected, the new project will go through full permitting and public consultation process to preserve its legacy of safety, environmental responsibility, and respect for the community and land.

Phase 4: MO'OWAIWAI

The Lineage of Generations of Valued Practices

To ensure the integrity of this outreach process and the feedback collected continues to be honored, Kaheawa Wind has committed to documenting the outcomes of this process and investing back into the Maui community via a sustaining community benefits package.

DOCUMENTATION

A community engagement report will be developed to capture the process, feedback, and outcomes of this plan uploaded to the project website.

COMMUNITY BENEFITS PACKAGE

Since its inception, Kaheawa Wind invests over $1.8 million dollars annually in direct spending to local Hawai'i businesses, taxes, and fees, and values being a long-term neighbor to the community.

Starting in 2027 and beyond, Kaheawa Wind is proposing to implement a Community Benefits Program, to be delivered and administered through a local, Maui-based partner, and informed by the choice and needs of the local community. This plan will be further developed during public consultation and outreach phase, and further detail will be communicated throughout community outreach.

A Shared Vision

Kaheawa Wind applauds HECO for establishing Community Benefits Programs ("CBP") as a central aspect of the Stage 3 RFP and believes this is a positive and proactive step to promote a just transition, increase engagement, and provide benefits that are meaningful and tailored to the needs and choice of the Host Community.

In addition to HECO's leadership on this topic, we are also aware of the productive work and statements advanced recently on this topic by key stakeholders including Ulupono Initiative, the Public Utilities Commission, and the Community Benefits Working Group of the Energy Equity Hui, among others, that collectively have examined best practices and new approaches that can inform the design of new, impactful CBPs for Stage 3 projects. Furthermore, establishment of a CBP offers Kaheawa Wind a unique opportunity to deepen our connection to our host community in support of a just, equitable transition, the importance of which was highlighted by Leo Asuncion of the Hawai'i PUC:

"The time has come for a new model to not only cultivate support for clean energy projects in the Islands but, more importantly, empower communities as full participating partners in the development of renewable energy projects that directly impact them. Hawai'i's leadership, electric utilities, and stakeholders are all recognizing that more is necessary for a more equitable energy transition."

- **Leo Asuncion**
  Chairperson, Hawai'i Public Utilities Commission[4]

4 Let communities decide: Using participatory budgeting for renewable energy community benefits packages. Ulupono Initiative, January 2023.

Our Host Community

Kaheawa Wind is aware of recent discussions regarding defining a renewable project's host community for the purposes of offering a Community Benefits Package between commenters including the PUC, HECO, and Ulupono, among others. For Kaheawa Wind, strict census tract limitations may not adequately represent the wind farm's presence in the community. During public consultation and outreach we will work to further define our host community boundaries but expect this definition to include and prioritize those communities and census tracts who are located most closely to the project and who have the most visibility of the wind turbines specific to Kaheawa Wind 1.

Our Approach

Kaheawa Wind has, from its inception, been a pioneer of best practices among renewable energy projects in the State of Hawai'i, including being the first wind farm to use a Habitat Conservation Plan. With this Proposal, we are excited to introduce a new, sustaining Community Benefit Program that advances a just transition for our host community.

Paramount in our design philosophy for a Community Benefits Program is to ensure it reflects the needs and choice of our host community. As such, the final design of the program must be completed during the project's public consultation and outreach program over 2024 -2025. While we do have an understanding today of what may reflect this based on early consultation with key stakeholders, officials, local advisors, and community members, we believe that is most prudent to finalize this design during the project development phase.

To inform our CBP Proposal, Kaheawa Wind has closely evaluated the state of Community Benefits Programs for existing projects and related programs in Hawai'i, as well as other models employed in many of the jurisdictions in which we own, operate, and develop renewable energy assets, including for projects other than renewable energy.

Implementation

With respect to eventual delivery of a Community Benefits Program during the project's commercial operations phase, we have a strong preference to utilize a local, 501(c)(3) non-profit organization, based in our host community, for both administrative and program design support over the lifetime of the program. We believe this is the most appropriate avenue because a local 501(c)(3) offers benefits including but not limited to:

- Significantly enhancing reach of a CBP via leverage of existing and known channels and programs,
- Ability to add value to program design and delivery by contributing own expertise, experience, and knowledge,
- Improving trust and confidence with the host community,
- Potential to magnify benefits through contribution or alignment of other similar facilities, and,
- Enabling other benefits by connecting Kaheawa Wind to opportunities to contribute to and/or engage with the host community outside of the CBP, such as through supporting local workforce and education initiatives.

Our Funding Commitment

Kaheawa Wind is aware that HECO has established a $3,000/MW/year minimum spending recommendation for community benefits. We view this as a progressive and appropriate step to ensuring that host communities share in the benefits of renewable energy development in furtherance of a just transition. KWP 1 has committed to a spending level of $10,000 USD/MW/year in CBP exclusive funding, which totals $300,000 annually for KWP 1. We are very excited to have the opportunity to work further together on the design and implementation of a CBP that our host community, Maui, and the State of Hawai'i is proud of.

Kaheawa Tomorrow

Since 2006, Kaheawa Wind 1 has proudly served the people of Hawai'i, locally generating enough clean energy to power approximately 15,000 Maui homes annually and contributing to energy affordability, energy security, and the state's movement toward a sustainable, renewable energy future and goal of 100% renewable energy by 2045. Combined, Kaheawa Wind 1 & 2 power approximately 25,000 Maui households annually at 30 and 21 MWs respectively.

To continue operation of the existing wind farm and deliver new benefits for Maui today and for future generations, Kaheawa Wind's Stage 3 proposal reflects an opportunity to continue generating local, renewable energy at below the cost of fossil fuels. We are committed to designing and delivering a new community benefits program in collaboration with the community, and furthering a legacy of safety, environmental stewardship, and respect for the land and community.

APPENDIX

UKUMEHAME

CULTURAL-HISTORICAL BRIEF

PREPARED FOR
BROOKFIELD RENEWABLE

JANUARY 2023

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INTRODUCTION

This cultural-historical brief traces the genealogy of Kaheawa Wind Power's wind energy generation site and the surrounding ʻāina (land) through two significant time periods, Yesterday and Today. The site is located in an area known as Kaheawa Pastures, which occupies the dry, rocky eastern half of Ukumehame. Famous for its wind and its pali (cliffs), this has traditionally been a place where few people lived. Nevertheless, it was unavoidable terrain in the journey between Wailuku and Lāhainā, and for that reason, Ukumehame has long been significant.

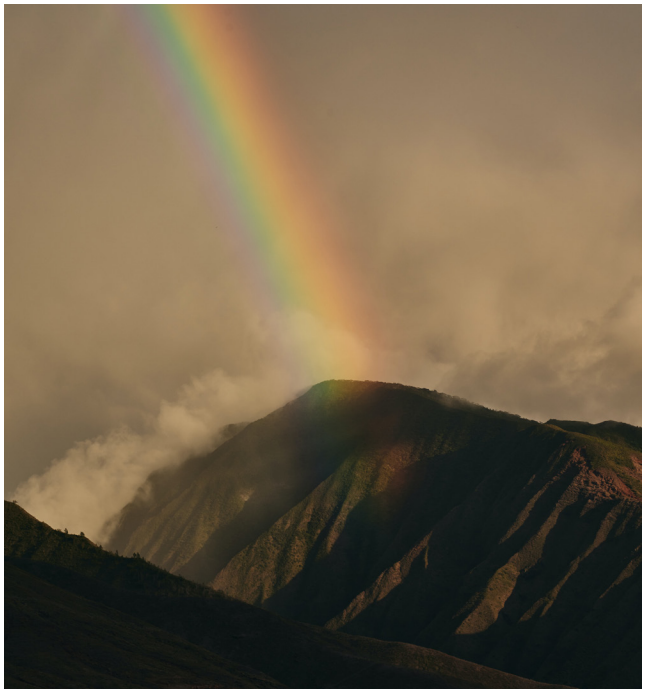
This brief begins with a basic overview of the ʻāina, as preserved in traditional names and ʻōlelo noʻeau (Hawaiian proverbs). Next, it presents the moʻolelo (stories) of Yesterday, which give us a view of the traditional relationship between ʻāina and kānaka (people) that informed the cultural history of this region. The second half of this brief provides an overview of events from the last century that laid the foundation for the Ukumehame of today, closing with a view towards Tomorrow and the issues shaping the area's future.

METHODOLOGY

This cultural-historical brief was prepared by DTL, a Hawaiian strategy studio that strives to utilize methodologies that align with Hawaiian values, traditions, and ways of gathering, organizing, and interpreting information. A core component to this work is the documentation of a moʻokūauhau—a genealogy of people and place—with the intention that it strengthens stakeholders' connection to the cultural history of a particular place so that they may be more effective in their work, equipped with a better understanding of their kuleana (responsibility or duty) to Hawaiʻi and its people.

The approach for this cultural brief is based on a methodology called Tomorrow's Ahupuaʻa. Tomorrow's Ahupuaʻa is built upon the fundamental relationship between ʻāina and kānaka that's at the heart of traditional Hawaiian land management models. For Native Hawaiians, the importance of this relationship is told in the Kumulipo, one of the oldest and most widely acknowledged cosmogonic genealogies recounting the birth of the islands, chiefs, and people and their interdependence. Our methodology strives to bring back the balance between ʻāina and kānaka in modern contexts.

THE LAND AND ITS FEATURES



In the Hawaiian worldview, natural and cultural resources are one and the same. This belief permeates all aspects of Hawaiian beliefs and practices—even today. Its origin can be seen in one of the principal creation stories, a chant known as the Kumulipo, which orders the origin of plants, animals, and humans along a shared, unbroken chain. It's this conception of humankind's existence that gives rise to mālama ʻāina, a core feature of the Hawaiian cultural value system that is expressed through the care and stewardship of the environment and its natural resources.

Similarly, the various forms of the natural environment, both animate and inanimate, are believed to be embodiments of Hawaiian gods and deities. From the heavens and volcanoes, to the forests and the planting fields, to the shoreline and ocean depths—not to mention the winds, rains, clouds, stars, and the many useful living things—all have some connection to a complex pantheon of akua (gods), kupua (demigods), and ʻaumakua (deified ancestor gods). These gods and deities are the subject of moʻolelo (stories) that the Hawaiian people told and retold across generations.

One such moʻolelo depicts the Hawaiian islands as being born to two gods: Wākea (the expanse of the sky) and Papa-hānau-moku (Papa, who gave birth to the islands), also called Haumea-nui-hānau-wā-wā (Great Haumea born time and time again). In an ancient oli (chant) which tells this origin story, Hawaiʻi Island is first to be born, followed next by Maui:

Hanau o Maui he moku, he aina,	Maui was born an island, a land,
Na kama o Kamalalawalu e noho.	A dwelling place for the children of Kamalalawalu.

(Fornander 1880:2-3)

A review of the cultural and historical genealogy of any project site begins with a basic understanding of palena, or "place-boundaries." The Hawaiian scholar, Dr. Kamana Beamer, explains that this concept of palena involves "a particular type of boundary, one created in a specific context, which defines a place that has unique functions." The sections below provide an overview of our focus area, along with the names and sayings that speak to the historical functions or characteristics of these places.

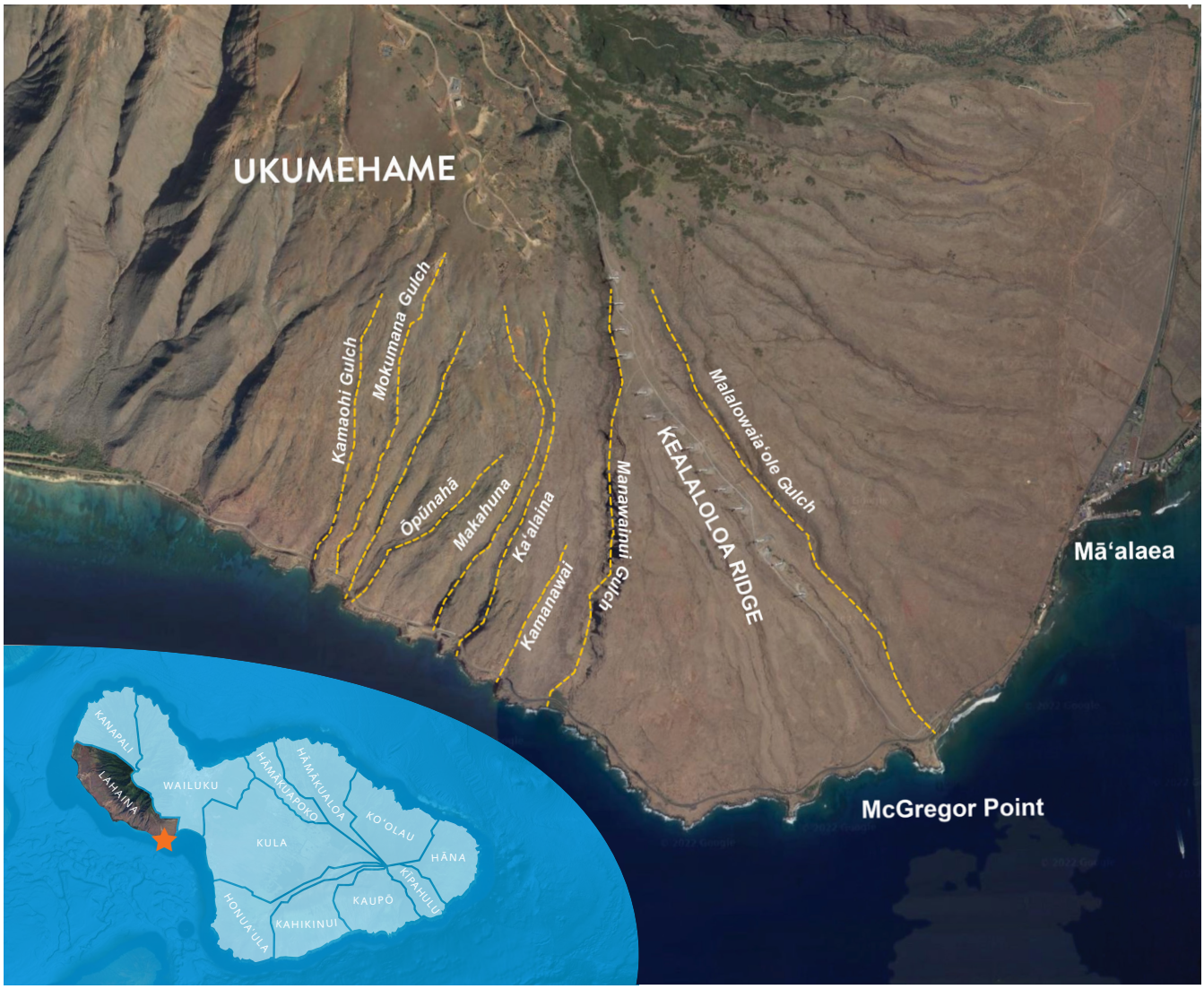
TRADITIONAL HAWAIIAN LAND DIVISIONS

The Hawaiian Islands were settled between A.D. 900 and 1200, and the long period of voyaging between Hawai‘i and central Eastern Polynesia ended in circa 1400. The lush and well-watered windward sides of the islands were settled first. Eventually, as populations grew, the early Hawaiians fanned out and populated the dry leeward lands like those of Lāhainā and Kā‘anapali. What these districts lacked in wai (fresh water), they made up for in their sheltered coves, abundant fisheries, and forested uplands.

The first major delineation of land boundaries on the island of Maui occurred during the rule of Kaka‘alaneo between circa 1500-1530 and was overseen by a kahuna named Kalaihaohi‘a. This resulted in the creation of large land divisions called moku (districts), which were further broken down into subdistricts that were managed by agents of the ruling chiefs. Maui is divided into twelve moku: Hāmākuapoko, Hāmākualoa, Ko‘olau, Hāna, Kīpahulu, Kaupō, Kahikinui, Honua‘ula, Kula, Wailuku, Kā‘anapali, and Lāhainā.

Moku are comprised of subdistricts called ahupua‘a, and ahupua‘a are further subdivided into parcels of land known as ‘ili ‘āina and mo‘o ‘āina. There are exceptions, but the classic ahupua‘a is a large, wedge-shaped slice of land with borders running from the mountain peaks to the nearshore fisheries and generally following prominent landforms—ridge lines and valley walls, for example. By design, an ahupua‘a contained everything its residents needed to sustain themselves: medicinal plants, hard woods, and freshwater from the uplands; vegetable and fruit crops from the cultivated midlands; and fish, seaweed, and salt from the sea.

West Maui is formed by a range of mountains called Mauna Kahālāwai. The three moku of West Maui are Lāhāina, Kā‘anapali, and Wailuku. The project site is located in the



ahupua'a of Ukumehame, which is part of the Lāhainā moku. A relatively large ahupua'a, Ukumehame occupies some 11,040 acres at the southernmost part of West Maui leading into Mā'alaea Bay. To the west is the ahupua'a of Olowalu, and to the east is the ahupua'a of Waikapū, which is part of the Wailuku moku. The coastline extends for a distance of approximately 12 miles, beginning at a place called Kapoli, a once prominent freshwater spring, on the boundary between Ukumehame and Waikapū. Much of the land is rocky and carved up by gulches and ravines, the largest of which is Ukumehame Gulch, a steep and narrow canyon that, at lower elevations, opens up to a gently sloped kula (plain) that was locus of traditional farming and settlement in the ahupua'a.

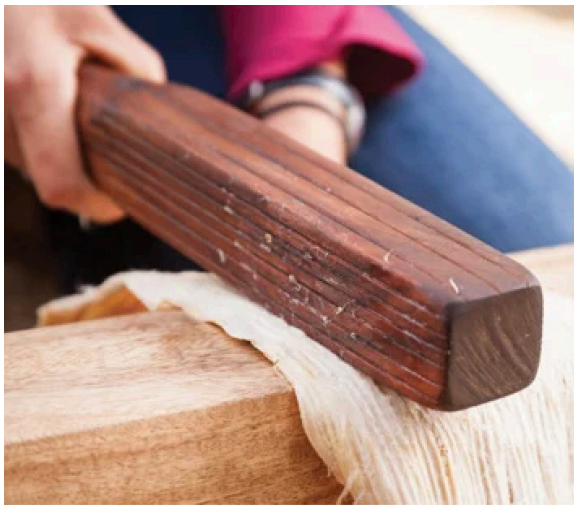
TRADITIONAL NAMES

In ancient Hawai‘i, the practice of naming places was widespread, and virtually all aspects of the land and sea could be identified by name. From beaches, bays, ocean channels, and points to hills, plains, valleys, mountains, and ridge lines, many of the place names we know today have ancient origins. Names were often inspired by the characteristics of the land. They could be literal or metaphorical in their description, or they might be commemorative of a person or event having some relationship to the land. Most names contain traces of information about the cultural significance of a place, so they provide a natural starting point when looking at the history of Hawaiian places.

Lāhainā translates to mean “cruel sun” (lā-hainā). It’s said to be named for the droughts that would sweep over the land. There’s also another more specific story about a bald-headed chief from Kaua‘ula Valley in Lāhainā who once cursed the sun by shouting, “He kū ho‘i kēia o ka lā hainā!” (What an unmerciful sun!), and the words “lā hainā” are what stuck.

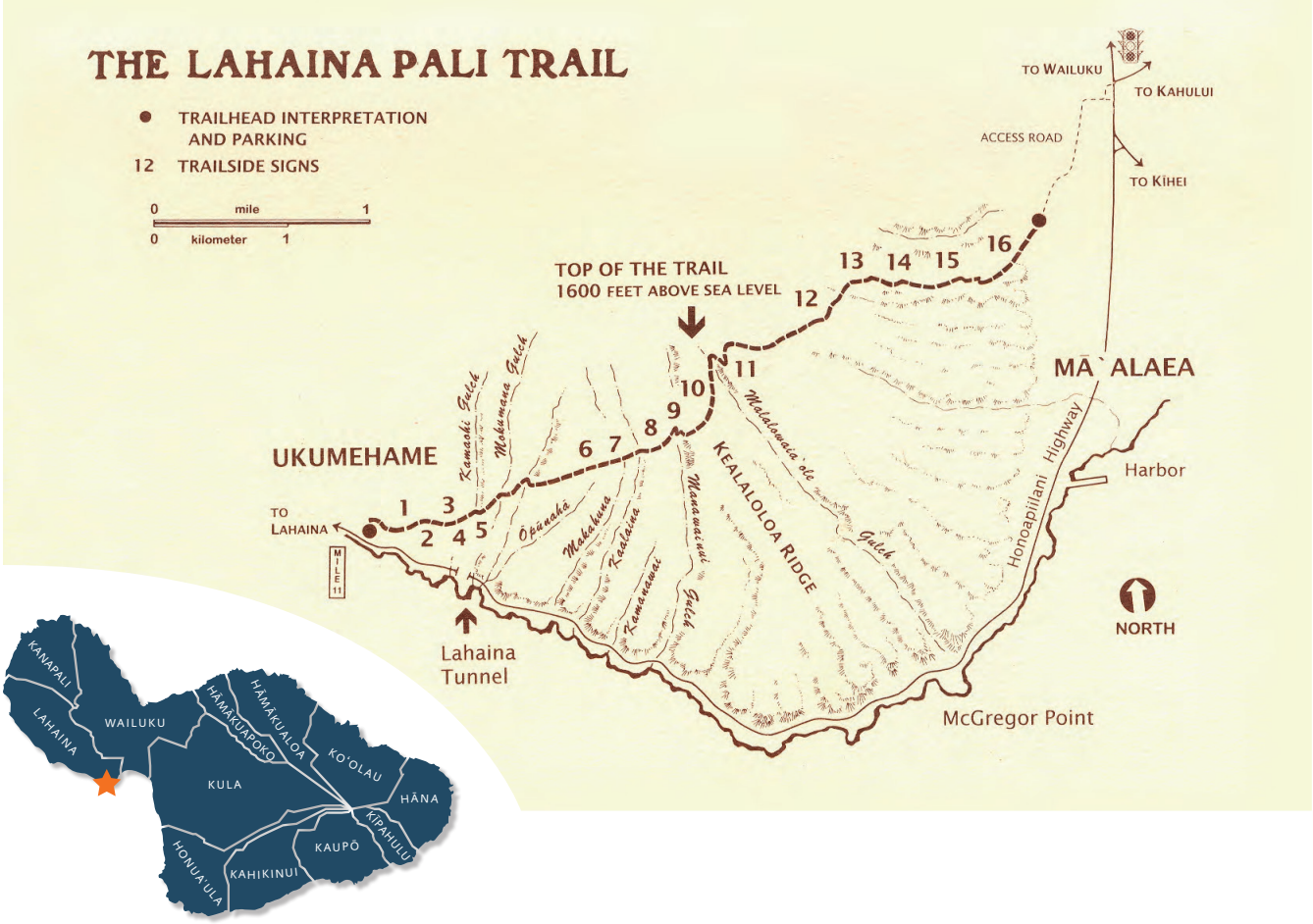
Another name for the town of Lāhainā is Lele. “Lele” describes a jumping, flying, or leaping motion, and one explanation for the name is that Lāhainā is where the ali‘i would come for short visits, so there’s this island-hopping quality to the name Lele. This reflects Lāhainā’s historical status as a seat of governance and a natural gathering place for those in power.

Ukumehame is the name for the ahupua‘a and the narrow gulch that borders Olowalu. It has also been spelled as “Ukumahame.” Ukumehame translates to mean, “(to) pay (in) mehame wood.” Mehame is a native hardwood that was used to make the anvils for beating kapa and preparing olonā for cordage. The traditional name for this section of shoreline is Pāko‘a, which translates to mean “coral fence.”



Kapa anvils were often made of mahame wood

A distinctive feature to the Ukumehame coastal region is the section of rocky sea cliffs between Mā‘alaea and Pāpalaua. A traditional name for this section of coastline is ‘A‘alaloloa, meaning “long path of rough lava.” It was traversed by an ancient foot trail that formed part of Ke Alaloa (The Long Road), a paved footpath that encircled Maui’s east and west ends at a length of approximately 138 miles. The project was started under the chief Pi‘ilani in circa 1516 and completed by his son and successor Kiha-a-Pi‘ilani. The pathway improved travel, trade, and communication, and the collection of ho‘okupu (taxes) during the Makahiki season.



The trail climbs to an elevation of 1,600 feet and crosses an area called Pōhakuloa. Heading in the direction of Māʻalaea, it traverses several gulches—Kamaohi, Mokumana, Ōpūnahā, Makahuna, Kaʻalaina, Kamanawai, and Manawainui—before it reaches its midpoint at Kealaloloa Ridge and descends to Māʻalaea. The trail fell into disuse when a curvy, single-lane dirt road was carved out along the foothills. Over the years, the road was widened and straightened until it was replaced in the early-1950s with the current highway.

A noted feature along the ʻAʻalaloloa coastline is McGregor Point, named after Captain Daniel McGregor, a Scotsman who immigrated to Hawaiʻi in the late-1800s and hauled cargo between the islands. The story goes that one night, his ship was caught in a storm while en route to Māʻalaea from Olowalu when he happened upon sheltered cove where he was able to drop anchor. When daylight came, the boat was unharmed, and Captain McGregor and his crew were surprised to find themselves right up against the side of a sea cliff. Other boats began to use this little inlet as a safe harbor in cases of emergency. Eventually, the government built a wharf there, and McGregor Point became an official landing. The wharf has since been dismantled, but the 20-foot lighthouse that was erected in 1915 still stands today.

ŌLELO NOʻEAU: TRADITIONAL PROVERBS AND WISE SAYINGS

Like traditional place names, ʻōlelo noʻeau (traditional proverbs and wise sayings) are another way by which the history and characteristics of Hawaiian places have been recorded and preserved. These expressions were often contained in mele (songs), oli (chants), and kanikau (lamentation chants that commemorate the deceased). In 1983, Mary Kawena Pukui published a volume of close to 3,000 ʻōlelo noʻeau that she had collected over a period of decades. For each, she provides a literal translation along with some usage remarks that help us understand context and the deeper meaning being conveyed.

While there are no ʻōlelo noʻeau that directly reference Ukumehame, there are several for Olowalu. Historically, Olowalu was the more populated district, but the two were closely interconnected—due in part to their proximity, their similar environments, and their relative distance from Wailuku and Lāhainā. The ʻōlelo noʻeau that Olowalu inspired allude to its gusty winds and hot climate, characteristics that Ukumehame share.

ʻAʻohe umu moʻa i ka makani.	No umu can be made to cook anything by the wind. Talk will not get the umu [another word for imu, or underground oven] lighted and the food cooked. This saying originated in Olowalu, Maui, where it was very windy and hard to light an umu. (Pukui 1983:25)
Ka makani haʻihaʻi lau hau o Olowalu.	The hau-leaf tearing wind of Olowalu. A gusty wind. (Pukui 1983:157)
Konohiki lua ka lā i Olowalu.	The heat of the sun rules in Olowalu. Said of one who permits the heat of anger to possess him. Olowalu, Maui, is known for its warm climate. (Pukui 1983:199)
Olowalu ihu pāpaʻa.	Crusty-nosed Olowalu. Disparaging expression for the people of Olowalu, Maui, where the wind is said to blow into the nostrils, drying the mucus into crust. (Pukui 1983:273)

Neighboring Waikapū was also known for its wind. It is described in this next ʻōlelo noʻeau as kokololio, or a "sharp, swift wind gust."

Waikapū i ka makani kokololio.

Waikapū of the gusty wind.

Refers to Waikapū, Maui. (Pukui 1983:319)

This final ʻōlelo noʻeau relates to a woman named Kaiaʻupe who was a notorious thief that lived near the ʻAʻalaloloa trail that travelers used to trek across Ukumehame's sea cliffs. As Pukui explains below, Kaiaʻupe would seduce her victims near a cliff's edge before kicking them to their death, which gave rise to an expression remarking on one's misfortune.

Ka ʻai a Kaiaʻupe.

The stroke of Kaiaʻupe.

Said when one is lured and suffers the consequences. Kaiaʻupe was a noted female robber who lived near the cliff trail of ʻAʻalaloa, Maui. She would entice a man to lie with her on the edge of the cliff, and then kick him off with her foot. This expression came to refer to any kind of treachery. (Pukui 1983:139)

YESTERDAY

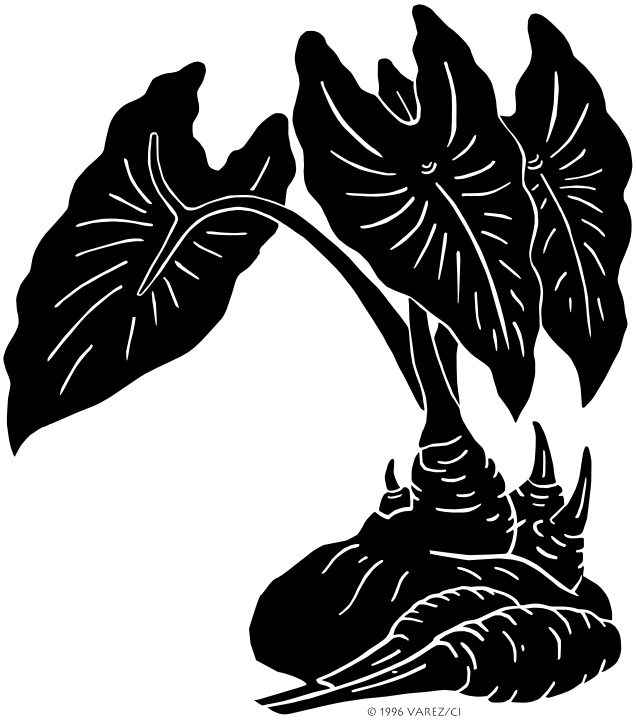
Despite being located on Maui's dry, leeward side, the district of Lāhainā achieved a high state of cultivation and status in ancient Hawai'i. Famously shaded by groves of 'ulu (breadfruit) trees, Lāhainā is often depicted in historical accounts as a picturesque village favored by the ali'i. Ukumehame is some distance from Lāhainā, and there is evidence that along with Olowalu, it comprised a distinct district of its own prior to its integration into the moku of Lāhainā.

MĀLAMA 'ĀINA: CARE FOR THAT WHICH FEEDS

The traditional Hawaiian economy was a subsistence economy. Growing, gathering, hunting, fishing, and making things for oneself and one's 'ohana, supplemented by practices of gifting and exchange, defined the economy of pre-contact Hawai'i.

In Hawai'i, more so than anywhere else in Polynesia, planting and farming evolved into a highly sophisticated and systematic practice that played a central role in the development of culture and society. The backbone of Hawaiian society were the planters, who prepared, planted, and harvested their own plots and lived in extremely close contact with the natural world around them. In Hawaiian thinking, the land was the chief, and man was its servant. Man needed the land, but the land had no need for man.

Kalo (or taro) was the Hawaiian people's crop of choice—superior to 'uala (sweet potato), mai'a (banana), and 'ulu (breadfruit), food crops that factor more heavily into traditional diets in other



parts of Polynesia. Kalo was grown throughout Polynesia, Melanesia, and South-East Asia, but it was cultivated with an unmatched level of intensity and skill in Hawai‘i, where there were at least several hundred varieties adapted for the various localities, soils, and terrain.

Growing kalo in a flooded lo‘i was the preferred method of cultivation, and in various parts of the Lāhāina district, including Ukumehame, there was enough water available to support lo‘i cultivation, as documented by the anthropologists E.S. Craighill Handy and Elizabeth Green Handy, who collaborated with the preeminent expert on all-things-Hawaiian, Mary Kawena Pukui. Here are their observations of Ukumehame and Olowalu in the 1930s:

> Southeastward along the coast from the ali‘i settlement [of Lāhāina] were a number of areas where dispersed populations grew taro, sweet potato, breadfruit and coconut on slopes below and in the sides of valleys which had streams with constant flow. . . . Ukumehame had extensive terraces below its canyon, some of which were still planted with taro in 1934; these terrace systems used to extend well down below the canyon. ‘Olowalu, the largest and deepest valley on southwest Maui, had even more extensive lo‘i lands both in the valley and below. (Handy 1991:492)

Mālama ʻāina is the concept that captures the basic duty at the heart of the relationship between people and the land. To mālama ʻāina is to take care of and look after the land, to maintain it in a condition that sustains humankind, who needs it for their survival. The word "ʻāina" is defined as "land," and it tends to be used in the broadest possible sense of the word, encompassing not merely the physical land itself but the life-sustaining essence of its nature. In fact, it is a compound word comprised of verb "ʻai" and "na" that together mean "that which feeds." It's common today to frame the concept of ʻāina in these larger, existential terms.

THE LEGEND OF KANIKANIAULA AND THE FIRST FEATHER CLOAK

ʻAhuʻula is the name for the Hawaiian feathered cloaks that were worn by the highest ranking chiefs, and The Legend of Kanikaniaula recounts the story of how the practice came to be established with the very first ʻahuʻula. It was given to a 16th century chief named Kakaʻanaleo from a member of his court whose name was Eleio. Eleio was a kūkini, or runner of great speed. Kūkini were employed by chiefs to quickly transmit messages or goods from one place to another. Eleio was also a trained kahuna and possessed certain supernatural powers, including the ability to return a wandering spirit to its body.

The story begins with Eleio making his way along the ʻAʻalaloloa through Ukumehame on his way to Hāna to collect awa for Kakaʻanaleo to enjoy at dinner. This version of the story was published in English in the Pacific Commercial Advertiser on August 18, 1883 and signed by Kaili.

> Soon after leaving Olowalu, and as he commenced the ascent of Aalaloloa, beyond Olowalu, he saw a beautiful young woman ahead of him. He naturally hastened his steps, intending to overtake such a charming fellow-traveler; but do what he would, she kept always just so much ahead of him.

The woman was the spirit of a chiefess named Kanikaniaula, who took Eleio on a chase from Ukumehame to Kahikinui before finally asking Eleio for his help in bringing her back to life. She promised that in exchange, she would give him a half-finished feather cloak, among other valuable things. With the help of Kanikaniaula's ʻohana, Eleio performed a series of rites and rituals that successfully revived Kanikaniaula's lifeless body. Overjoyed, her family insisted that Eleio take Kanikaniaula to be his wife. Having gotten sidetracked in his errand to collect awa from Hāna for the king, Eleio knew that he would likely be sentenced to death upon his return to Lāhainā, so he instead asked that they finish the cloak so that he could present it to Kakaʻanaleo as a gift and perhaps spare him his life.

Kanikaniaula and her family got right to it and quickly finished the cloak. Eleio then set off back to Lāhainā along with Kanikaniaula. When Kakaʻanaleo set his eyes on the ʻahuʻula, he was astonished. It was a thing that no one had ever seen before. Eleio's life was spared, and when asked where the cloak had come from, Eleio introduced Kanikaniaula to Kakaʻanaleo, who made her his wife and the queen of Maui.

THE OLOWALU MASSACRE OF 1790

One of the most infamous events to occur in this region of West Maui is the Olowalu Massacre of 1790. At the time, Olowalu was under the rule of a high chiefess named Kalola, who was the daughter of Kekaulike, Mōʻī (supreme ruler) of Maui during the 1700s. Her brother was Kahekili, the famous warrior king who came to control seven of the eight Hawaiian islands and paved the way for Kamehameha's eventual unification.

The massacre itself resulted in the brutal murder of more than a hundred Hawaiians at a village located in Olowalu. This event was precipitated by a series of incidents involving the British-American captain Simon Metcalf and the crew of a fur trading ship called Eleanora, which anchored in Honuaʻula near Makena in 1790. Kalola and her husband Kaʻopuiki were there when the Eleanora first docked at Honuaʻula. They went out to greet the foreigners and offer goods to trade, at which point Kaʻopuiki took notice of a smaller boat, called a cutter, tied to the Eleanora's stern. The boat was constructed with highly coveted nails and other metal parts.

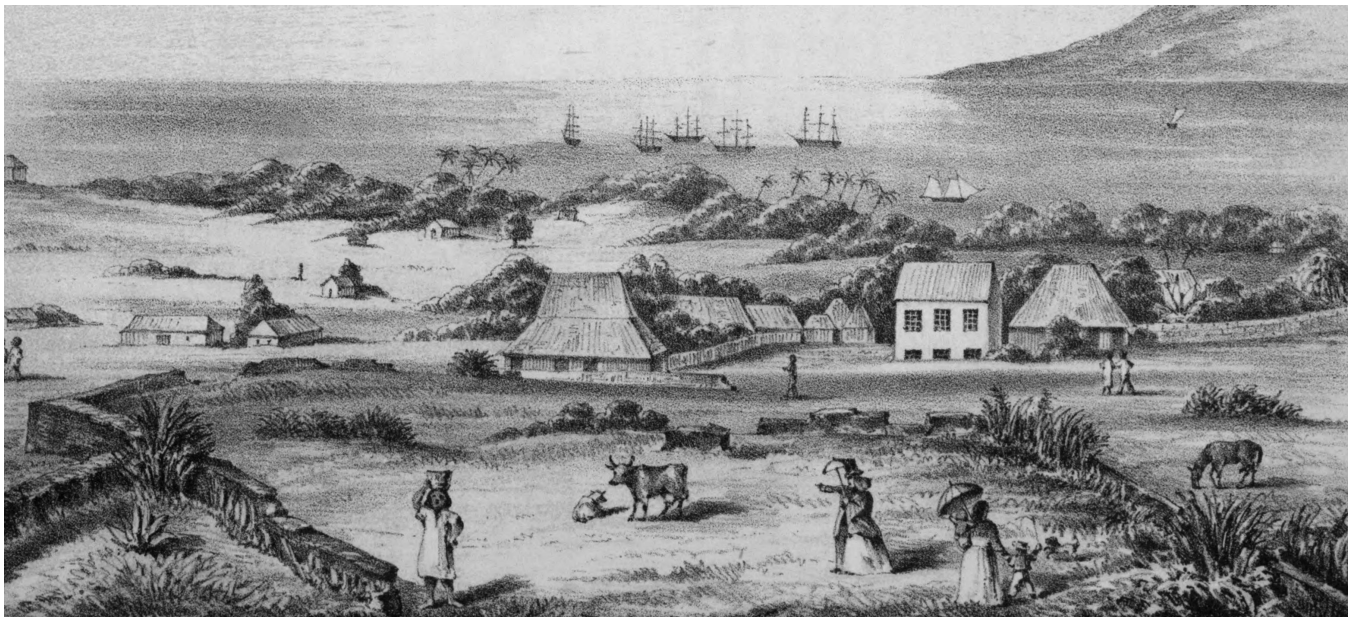
That night, Kaʻopuiki and some others snuck out to the ship and cut the smaller boat loose. Sleeping inside was one of Metcalf's crewmen, who was killed during the mission. Realizing that the boat was missing, Metcalf sent out a search party but found nothing.

The next day, several more canoes came out to the Eleanora with pigs and fruit to offer, and Metcalf fired on them, killing and wounding several Hawaiians. The next day, according to an officer's account, "four or five thousand people" gathered at the shoreline, "all armed with slings, spears, and arrows" ("Americans at Otaheite" 1792:318). A battle ensued, with the boat firing its cannons at the beach and likely killing and wounding many. A crew went to shore and set fire to the village and heiau, and any survivors eventually fled mauka to avoid being shot at.

After that, the Eleanora left Honuaʻula and headed north. The officer wrote, "We had been under way about an hour and a half, with a light breeze, when the natives in canoe alongside, informed us that the chief of the people that had stolen the boat, lived behind a point, to the northward, we then hauled our wind, went round the point and came to anchor" ("Americans at Otaheite" 1792:319).

The next day, Kaʻopuiki came aboard the ship and offered to return the boat, which had been stripped for its metal parts, and the boat's keeper, who was dead, in exchange for a reward. Kaʻopuiki later returned with just the boat's keel, angering Metcalf. Sensing danger, Kalola declared a kapu forbidding anyone from making contact with the ship. It lasted three days, and when it was over, hundreds of villagers paddled out to the Eleanora in the hopes of trading with the crew. Presenting a friendly demeanor, Metcalf managed to corral the canoes along one side of his ship, and once they were packed tightly together, he ordered his crew to fire the guns. It was a scene of carnage, with at least a hundred dead and a hundred wounded. The historian Samuel Kamakau describes the aftermath:

> Even those who swam away were shot down. John Young was an eyewitness on board the ship and has testified to the great number who were killed at this time. At noon that day the Eleanor sailed, and the people went out and brought the dead ashore, some diving down into the sea with ropes and others using hooks; and the dead were heaped on the sands at Olowalu. Because the brains of many were oozing out where they had been shot in the head, this battle with the ship Eleanor and her captain was called "The spilled brains" (Kalolo-pahu). It was a sickening sight, as Mahulu and others have reported it; the slaughtered dead were heaped upon the sand; wives, children, parents, and friends came to view and mourn over their dead; and the sound of loud wailing arose. (Kamakau 1992:146)



LĀHAINĀ'S WHALING PERIOD

Hawai'i's whaling period began in circa 1810, lasted for much of the 19th century and peaked in 1846. Whaling ships used Hawai'i as a stopover between the United States and Japan, where whales were hunted primarily for their blubber, which was processed into whale oil and used for heating, lighting, and as an industrial lubricant. Each spring and summer, hundreds of whaling ships would arrive and spend months at a time in Lāhainā and Honolulu, their crews resting and stocking up on food and other supplies.

Whaling ship crews hailed mostly from New England, and their desire to eat foods that were familiar influenced what some farmers planted on Maui and O'ahu. Most notably, the American whalers' appetite for white potatoes led to its extensive cultivation in Kula, where it grew especially well. In fact, the ready supply of white potatoes on Maui, among other fruits and vegetables, is one reason why whaling ships preferred Lāhainā over Honolulu. Here's an excerpt singing Lāhainā's praises from an article published in the Pacific Commercial Advertiser newspaper on February 12, 1857:

> To whale ships no port at the islands offers better facilities for all their business (with the exception of heavy repairs) than does Lahaina. As it is on this island, and but a short distance that the extensive potato fields are located that have furnished an almost inexhaustible supply for many years, and also the large sugar plantations from which the best sugar and molasses are procured, and fine herds of cattle which dress up better, than any beef slaughtered for market that can be produced on the group.

THE MAHELE

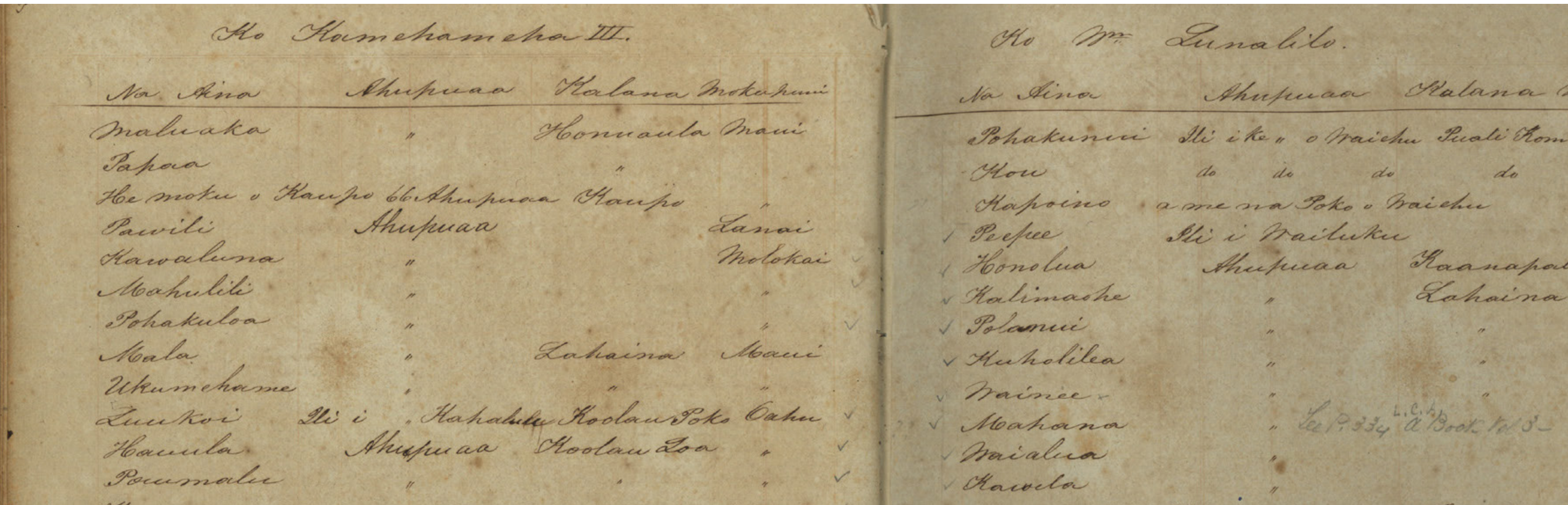
The Mahele (also known as the Great Mahele), which transformed the centuries-old communal land tenure system into one of private ownership that mirrored those found in the United States and Europe, is one of the most consequential events in Hawaiʻi's history. It has been theorized that one reason for King Kamehameha III's decision to privatize land was to preserve his and his subject's interests in their lands should the Hawaiian Kingdom fall to a foreign power like the United States, England, or France. By creating a system foreign governments would recognize, the hope was that the Hawaiian people would not be dispossessed. Unfortunately, the Mahele process itself was flawed and left the great majority of Hawaiians owning less than one percent of land in Hawaiʻi. And the fact that land could be bought, leased, and sold drove the dispossession that Kamehameha III may have hoped to prevent.

The Mahele was a multi-step process that began in 1845 and effectively ended a little more than five years later. The actual dividing up of the land began in 1848. It was initiated by a process of recognizing the respective property interests of King Kamehameha III and more than 240 chiefs and konohiki (ahupuaʻa managers). In what's called the Buke Mahele (Mahele Book), the chiefs and konohiki surrendered all interests in any lands the King wanted to retain, and he did the same with any lands that they wanted to retain. The aliʻi and konohiki claims were typically for entire ahupuaʻa or smaller, whole subdivisions within an ahupuaʻa.

At this phase in the Mahele, the ahupuaʻa of Ukumehame was surrendered by a high chief (and future king) named William Charles Lunalilo, who was then still a minor and under the guardianship of his father Charles Kanaʻina. It was claimed by King Kamehameha III, whereby it became part of the inventory of Crown Lands.

Crown Lands were regarded as a distinct classification of property, separate from lands held by the government. They belonged to the sovereign, who could treat them as his or her private property, but their inheritance was limited to successors to the throne. Government Lands

The Buke Mahele



Kamehameha III, who initiated the Mahele and came to own Ukumehame as part of his Crown Lands

were established to provide for the needs of the general population; Crown Lands were part of the personal domain of Kamehameha III and evolved into a resource designed to support the Hawaiian sovereign, who in turn supported the Native Hawaiian people.

After the illegal overthrow of the Hawaiian monarchy and Queen Liliʻuokalani's dethroning in 1893, the Crown lands were seized by her usurpers, who hastily formed the so-called Republic of Hawaii. The lands were combined with the Government Lands and then "ceded" to the U.S. shortly after Hawaiʻi's annexation in 1898. When Hawaiʻi became a state in 1959, the U.S. transferred the Crown and Government Lands to the newly established State of Hawaiʻi, after retaining hundreds of thousands of acres for itself, which is how the State came to hold most of the land in Ukumehame. Although the State's management of Crown Lands is virtually indistinguishable from its other publicly held lands, the future status of the Crown Lands remains an open question, given their importance in the pursuit of self-governance and political sovereignty by the Native Hawaiian people.

TODAY

Land privatization set the stage for two of the forces that have most dramatically shaped Hawaiʻi over the last 150 years: sugar and tourism. The influence of these two industries has been especially pronounced in West Maui, where Amfac, one of the Big Five companies of Hawaiʻi's Territorial Period, helped to define the plantation model of industrial agriculture at Pioneer Mill and then laid the groundwork for a pivot into resort development. Both sugar and tourism have brought complex economic, social, environmental, and cultural change to West Maui, which are explored in the Today section.

Lāhainā Mission Station

The early days of sugar harvesting

KING SUGAR

As the whaling industry began to recede, sugar soon emerged as Maui's next growth engine. It has proved to be the single most consequential crop in the modern history of Hawai'i, whose labor and resource demands transformed the status of people, land, water, and power.

Kō, or sugarcane, arrived with the first Polynesian settlers; it was one of two dozen "canoe crops" that provided the essential building blocks of life in early Hawai'i. Ōpū kō (clumps of cane) were generally found around homes, in garden plots, and along the banks of lo'i kalo (taro ponds). It was a subsistence crop for the Hawaiians, who used it for a wide range of applications: from food, to decoration, to medicine and ceremony, even the formulation of tattoo ink. Dozens of native varieties of kō developed over the centuries of pre-contact cultivation in Hawai'i.

It wasn't until circa 1823 that members of the Lāhainā Mission Station began to process sugar from native sugarcanes for their household use. The first sugar operations on Maui were started in the 1820s in Wailuku and Waikapū. Many of these early ventures were owned and operated by Hawaiians, often with the cooperation or assistance of the chiefs. In Lāhainā, Hawaiian planters grew sugar and ran small mills as early as 1837 and continued into the early-1850s. These were not the factory-like plantations of the 1900s. The technology was simple, the workforce small and seasonal, and the sugar was produced mostly for domestic consumption.

The industrial sugar boom didn't really get its start until the legalization of land sales to foreigners in 1850 and the introduction of a new cane variety from the Marquesan Islands in 1854. It was brought to Lāhainā by an American whaler named Captain Pardon Edwards, and this new variety was thereafter known by its new home: Lāhainā. Lāhainā cane proved to be well-suited for industrial-scale production. It grew fast, rooted deeply, produced more juice, and was less susceptible to rats than any of the Hawaiian varieties. By the 1870s, it was grown to the almost total exclusion of all other varieties until commercial hybrids emerged.

Approaching Olowalu and its sugar mill

Sometime in the late-1860 or early-1870s, King Kamehameha leased the Crown Lands of Olowalu and Ukumehame to an that he had some interest in called the West Maui Sugar Co., venture failed to last more than a few years. The fledgling industry's fortunes improved in 1875, when Hawai'i and the a free-trade agreement that removed tariffs on Hawaiian entering the U.S. market. A year later, two men named Philip and Goodale Armstrong founded the Olowalu Plantation and began operations on leased Crown Lands in Olowalu and Ukumehame. A mill and wharf were constructed at the headlands of Olowalu's shoreline, and sugarcane was planted across the low flatlands near the sea with water drawn from the Olowalu and Ukumehame streams. A six-mile railroad system was built to haul the cane.

Relative to the other major sugar producer in West Maui, the Pioneer Mill Company, Olowalu Plantation was a small operation that Pioneer Mill later acquired in 1931. Pioneer Mill was started by James Campbell, who was born in Ireland, ended up in the South Pacific through the whaling trade, and had been in Lāhainā for a decade before going into the sugar business that would turn him into one of Hawai'i's wealthiest businessmen and largest landowners.

Sometime between 1860 and 1861, Campbell opened his very first mill, a crude processing facility powered by mules. He produced sugar from his own cane along with cane from other growers in Lāhainā. Campbell was later joined by two men named Henry Turton and James Dunbar, and they operated briefly under the name of Campbell & Turton. In 1865, Dunbar left the company, and the plantation became known as Pioneer Mill Company. Ownership of the plantation and mill changed hands several times before it came under the ownership of a German immigrant and businessman named Paul Isenberg, a partner at H. Hackfeld & Co., and Mr. C. F. Horner, the plantation manager. They incorporated the Pioneer Mill Company on June 29, 1895.

Throughout the early-1900s, the plantation continued to expand, developing land and water resources, and enhancing its planting, harvesting, and milling operations. It acquired as much land as it could, and when the land couldn't be bought outright, it entered into leases.

Pioneer Mill purchased Olowalu Sugar Company's assets in May of 1931, and on December 31, the company was disincorporated. Its mill was dismantled the following year and shipped to the Philippines.

Kāʻanapali, Maui, 1950

DESTINATION MAUI: TOURISM TAKES OVER

During World War II, the U.S. military used Hawaiʻi as a major training, staging, and supply base for its Pacific command, and the military population on Maui outnumbered locals by four-to-one. After the war, Maui saw its population shrink as the sugar and pineapple industries began scaling down and opportunities on Oʻahu and the U.S. mainland drew residents, younger ones in particular, away. This prompted a search for new sources of industry that led to the pivot towards tourism.

At the time, Maui was not on many visitors' itineraries. In fact, in the 1950s, it was the least visited island, and one of the biggest barriers to capturing a greater share of the Hawaiʻi visitor market was Maui's lack of hotel accommodations. There was the 66-room Maui Palms Hotel in Kahului, the 10-room Pioneer Inn in Lāhainā and not much else.

In 1953, Amfac (the parent company of Pioneer Mill) hired the Honolulu planning and engineering firm of Belt, Collins & Associates to conduct a study that looked at the feasibility of a planned destination resort on four hundred acres of its beachfront land in Kāʻanapali. The story goes that three years later, the company's board of directors held a lūʻau near Puʻu Kekaʻa (Black Rock) where the decision was made to venture into tourism using an entirely new visitor resort development model. In a radical departure from the Waikīkī model, Kāʻanapali would be less dense and more exclusive, characterized by lush, green, open vistas; designated pockets of shopping, dining, and leisurely activities; and beaches that felt private and privileged guest access.

Kāʻanapali Beach Resort, 1967

From a 1960s-era marketing brochure

The master plan was completed by Donald Wolbrink, and construction began on a lot leased by Sheraton Hotels in 1961. This would become the cliff-hugging, 200-room Sheraton Maui, which opened with great fanfare on January 23, 1963. Guests arrived in Kahului on a specially chartered United Airlines DC-8, the first instance of a direct commercial flight between the mainland and a neighbor island. Within a span of just five years, Kāʻanapali boasted a 7,200-yard golf course, a shopping center, and five hotels with over 1,000 rooms: Hilton's Hale Kāʻanapali, Sheraton Maui, Royal Lahaina, Kāʻanapali Beach Hotel, and the International Colony Club. The Maui Surf followed in 1971, then the Hyatt Regency Maui in 1980, and Maui Marriott in 1982.

As one of the first master-planned resorts, Kāʻanapali has proven to be one of the most successful. It draws half-a-million visitors annually and consistently ranks as one of the most desirable destinations on the planet. All of this success has come at a cost, felt most sharply by West Maui residents in the form of traffic congestion, a shortage of affordable housing, crowded beaches and trails, pollution, and strain upon limited water and energy resources. Overtourism has become the hot button issue facing the visitor industry globally, and on Maui, efforts are underway to enact laws that would reverse the tide and reduce the number of guest arrivals.

HAWAIʻI'S CLEAN ENERGY FUTURE

In 2008, the State of Hawaiʻi partnered with the U.S. Department of Energy to form the Hawaiʻi Clean Energy Initiative (HCEI), a long-term, collaborative effort to transform Hawaiʻi's energy ecosystem and, in the process, create a model for other states to follow. This laid the groundwork for a set of energy goals and policies designed to reach one of the most ambitious energy targets in the nation: by 2045, one hundred percent of the electricity in Hawaiʻi is to be produced by renewable energy sources.

With its abundance of wind, sun, and former sugarcane land, West Maui is certain to be an essential part of the development mix needed to reach the state's energy goals. Although a good thing for Hawai'i and the fight against climate change, renewable energy doesn't necessarily translate into community support. Wind and solar farms use up land that might otherwise help alleviate Hawaiʻi's housing shortage or the state's dependence in imported food. They can be unsightly and disrupt a community's way of life or do harm to native bird and bat populations. And the cost savings often promised to consumers may not always pan out.

When the first phase of Kaheawa Wind Power was built in 2006, it saw very little community opposition, but since that time, a hostility towards renewable energy development, and wind turbines in particular, has taken hold. A clear example of this is the Nā Pua Makani wind farm in Kahuku along Oʻahu's North Shore. The Public Utilities Commission's approval of the project in 2014 made it the third wind project in the area, and as word made its way through the community, resistance met it from the start. It wasn't simply a matter of aesthetics or harm to the native bat population, the development's proximity to homes and schools set off health and safety concerns, and flaws in the regulatory approval process sent Nā Pua Makani down a long and litigious path. The community's opposition culminated in a monthlong standoff in 2019 whereby residents of Kahuku and their supporters locked arms to prevent delivery trucks from transporting turbine parts.

Kealaloloa Ridge in Ukumehame is a far less controversial site than the foothills of Kahuku; nevertheless, Nā Pua Makani's disastrous rollout underscores the importance of incorporating meaningful community engagement into a renewable energy project's development at the outset.

TOMORROW

The Tomorrow's Ahupuaʻa methodology embraces the complexity and interdependency of our island ecosystems and of the interactions of people and nature across time. It's an approach that confronts the question of how we got here so that we we're better equipped for the future. "I ka wā ma mua, ka wā ma hope," goes a traditional Hawaiian proverb, "through the past is the future."

A central goal of this practice is to better understand any valuable cultural, historical, or natural resources that may exist at the project site so that they can be protected and preserved for Hawaiʻi tomorrow.

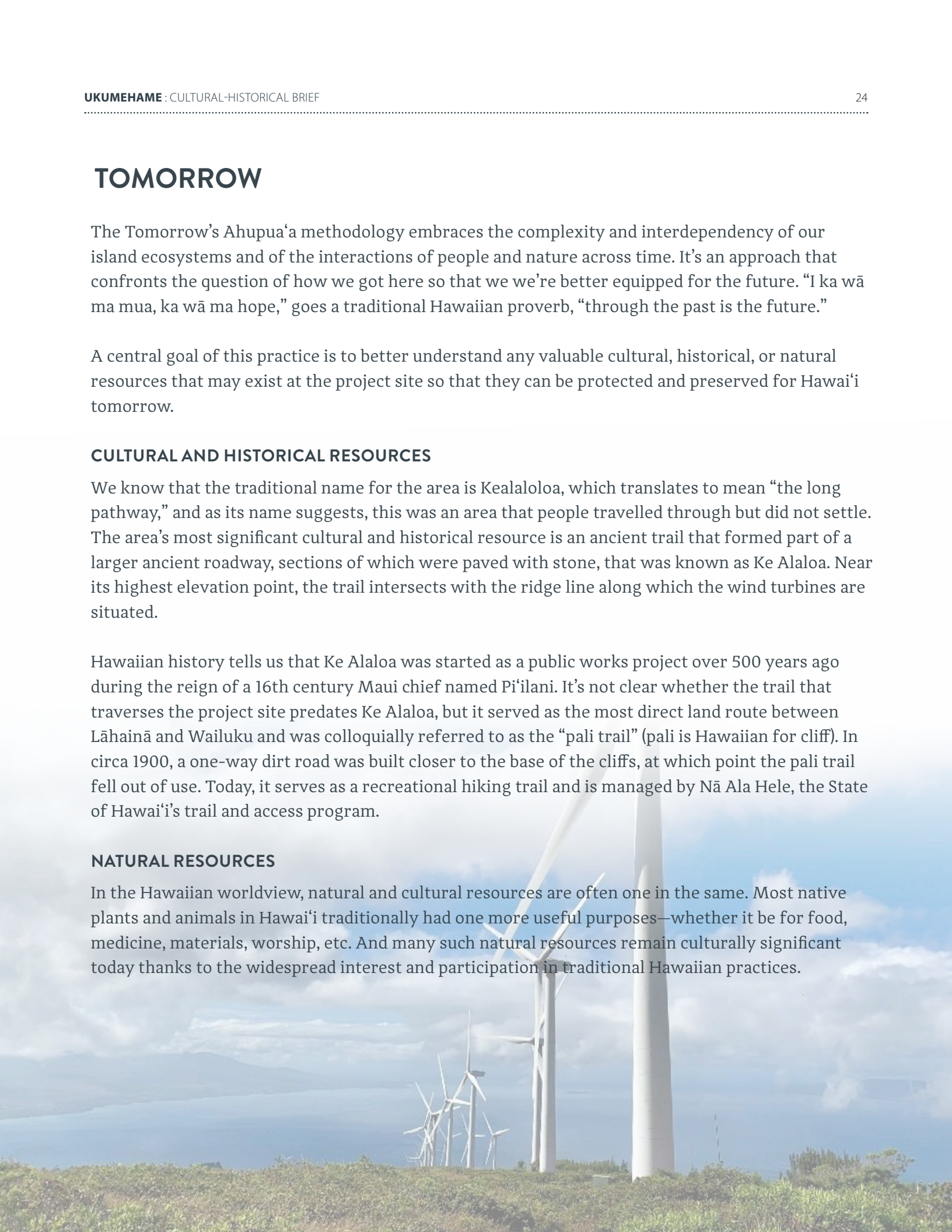
CULTURAL AND HISTORICAL RESOURCES

We know that the traditional name for the area is Kealaloloa, which translates to mean "the long pathway," and as its name suggests, this was an area that people travelled through but did not settle. The area's most significant cultural and historical resource is an ancient trail that formed part of a larger ancient roadway, sections of which were paved with stone, that was known as Ke Alaloa. Near its highest elevation point, the trail intersects with the ridge line along which the wind turbines are situated.

Hawaiian history tells us that Ke Alaloa was started as a public works project over 500 years ago during the reign of a 16th century Maui chief named Piʻilani. It's not clear whether the trail that traverses the project site predates Ke Alaloa, but it served as the most direct land route between Lāhainā and Wailuku and was colloquially referred to as the "pali trail" (pali is Hawaiian for cliff). In circa 1900, a one-way dirt road was built closer to the base of the cliffs, at which point the pali trail fell out of use. Today, it serves as a recreational hiking trail and is managed by Nā Ala Hele, the State of Hawaiʻi's trail and access program.

NATURAL RESOURCES

In the Hawaiian worldview, natural and cultural resources are often one in the same. Most native plants and animals in Hawaiʻi traditionally had one more useful purposes—whether it be for food, medicine, materials, worship, etc. And many such natural resources remain culturally significant today thanks to the widespread interest and participation in traditional Hawaiian practices.



The native animal species that have been impacted by the wind turbines at Kealaloloa are well documented. A habitat conservation plan for the project site that was approved in January 2006 covers four federally-listed animals, including Hawai'i's only native land mammal, the 'ōpe'ape'a (Hawaiian hoary bat or *Lasiurus cinereus semotus*) along with three bird species, the 'ua'u (Hawaiian petrel or *Pterodroma sandwichensis*), the 'a'o (Hawaiian shearwater or *Puffinus newelli*), and the nēnē (Hawaiian goose or *Branta sandvicensis*). Two of the species, the 'ōpe'ape'a and the nēnē, appear in the epic Hawaiian creation chant Kumulipo (described briefly above), and Pukui states that the 'ua'u "is considered by some an 'aumakua" (Pukui 1986:362). Efforts to monitor their numbers and minimize takings must continue.

Native plant restoration efforts, which started at the time of the turbines' construction in 2005, deserve continued support to ensure the proliferation of the following culturally significant plant species:

- 'A'ali'i (*Dodonaea viscosa*) is indigenous to Hawai'i and is used today primarily in lei-making. It was also used for making a red dye, and the wood was used for making smaller hand tools and weapons.
- 'Ōhi'a *(Metrosideros polymorpha)* is an endemic plant that was one of the most important woods in Hawaiian culture and used in hale (dwellings) and canoe construction. Its flowers and buds are used in lei-making, and the plant itself has a significant spiritual connection to the practice of hula.
- Ko'oko'olau *(Bidens amplectans)* is small shrub with over a dozen native species whose leaves were used to make a medicinal tea that treated throat and stomach ailments.
- 'Akia (*Wikstroemia oahuensis*) is commonly seen in landscaping today, though it is rarely seen growing in the wild. The plant was pounded and mixed with fish bait, and when ingested by fish, it put them in a stupor that made them easier to catch. The mashed plant parts were also used in Hawaiian sorcery.
- Pili (*Heteropogon contortus*) is an indigenous grass that was used to thatch the roofs and walls of traditional Hawaiian dwelling.
- Wiliwili (*Erythrina sandwicensis*) is an endemic tree and a key species in Hawai'i's dryland forests. It nearly went extinct when an invasive gall wasp from East Africa, now the target of eradication efforts, caused large numbers of the tree to die off. Its wood is prized for its exceptionally light weight and was used to make canoe outriggers and surfboards. Its seeds were used in lei-making.

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