

Senate Informational Briefing

Committee on Commerce and Consumer Protection
Committee on Public Safety and Intergovernmental and Military Affairs

April 18, 2024

Opening Remarks



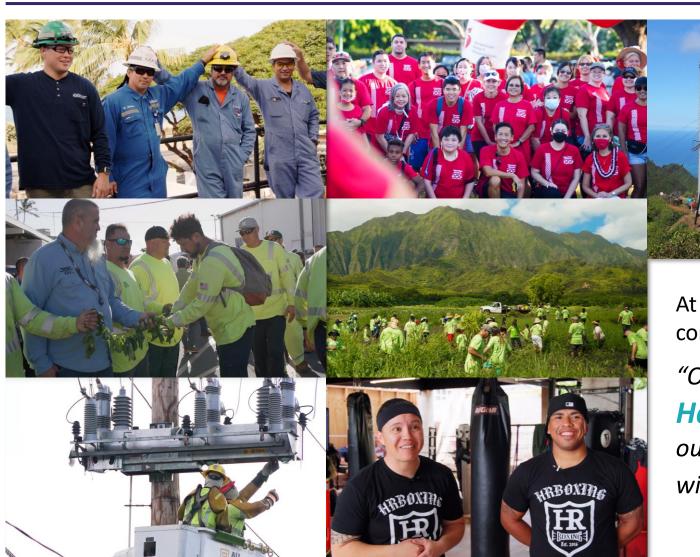
Agenda

- Background and Context
 - Hawaiian Electric
 - Increasing Wildfire Risk in Hawai'i
- Hawaiian Electric actions to help with recovery and mitigate wildfire risk
 - Maui Restoration and Recovery
 - Wildfire Immediate Action Plan
 - Wildfire Safety Strategy
 - Legislation
- Questions and Answers

Background and Context



We are a local company of Hawai'i and for Hawai'i since 1891



At our core is our values and connectedness to the community, state, customers AND their values

"Our highest priority is to **build a sustainable Hawai'i** in which our children and grandchildren,
our communities, our customers, and employees
will **thrive**, **together**."

Hawaiian Electric's Declaration

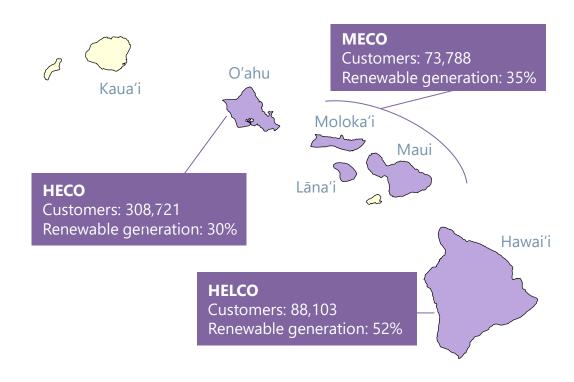
Hawaiian Electric – a partner in our shared vision for Hawai'i's future

The special characteristics of our grids and our place

- 5 separate islands in the most remote place on Earth
- Serving 95% of the residents of Hawaii
- Unique role as a critical infrastructure provider to INDOPACOM and its subordinate component commands
- Fit for purpose Regulatory Model PBR and Decoupling

Executing on our shared vision and policy of the State

- Exceeded all RPS targets (2015 & 2020)
- No. 1 in U.S. for percentage of customers with rooftop solar
- No. 2 in U.S. for per capita electric vehicle adoption
- Proactively initiated the 1st statewide decarbonization study
- >50% of distribution circuit miles located underground, compared with ~20% in California and nationally



Hawai'i also has a unique set of resiliency risks



Cyberattack

Hawaiian Electric is a target for a variety of threat actors using evolving tactics, techniques, and procedures



All-Hazards Resilience

Adapting to our changing climate and extreme weather events is vital to the resilience of our entire community



Wildfire

Addressing the increasing risks of wildfire in Hawai'i requires a "whole of society" and "whole of government" approach

Land use has changed in Hawai'i over the last 130 years

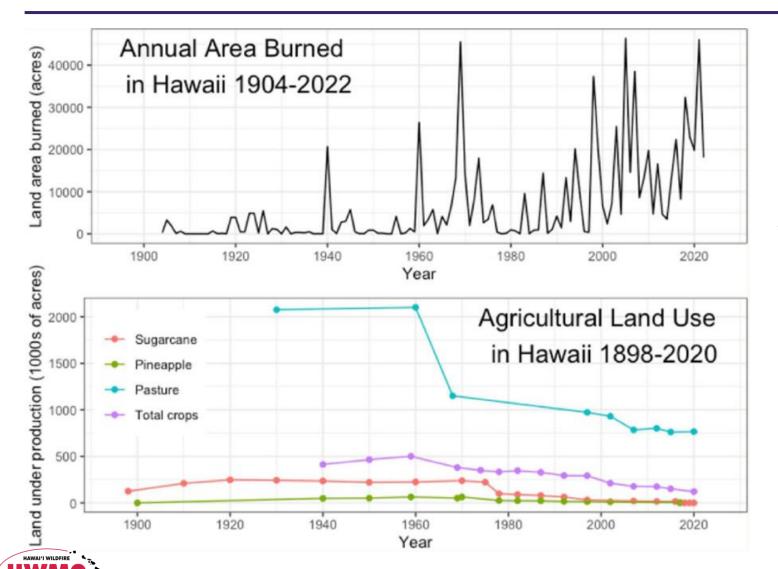


Moku'ula Mokuhinia Plantation Modern Era

"Fire has been increasing over the last few decades. We have more and more invasive grasses. We have changes in land use that have led to lots of fallow unmanaged land. Our infrastructure and our communities weren't built at a time when wildfire was a risk. Now, we're at the stage of trying to retrofit everything and catch up to that risk."

- Elizabeth Pickett, Co-Executive Director at the Hawaii Wildfire Management Organization

There are direct links between changes in land use, the abandonment of active agriculture, and wildfire occurrence statewide



"Hawai'i's fire problem is due to the vast areas of unmanaged, nonnative grasslands from decades of declining agriculture ... These savannas now cover about a million acres across the main Hawaiian Islands, mostly the legacy of land clearing for plantation agriculture and ranching in the late 1800s / early 1900s."

Dr. Clay Trauernicht, UH
 Mānoa Wildfire Expert

Hawaiian Electric actions to help with recovery and mitigate wildfire risk



'It's a kākou thing' - a collaborative path forward



Supporting restoration & recovery

Help with recovery and provide immediate relief for the people of West Maui who are suffering

What we've done – Maui Restoration Recap One 'Ohana Initiative

Addressing risks going forward

Address the risk of catastrophic wildfires going forward

Immediate Action Plan
Wildfire Safety Strategy
Legislation

All West Maui customers who can be safely restored are back online





Fully activated

Incident Management Team and Executive Incident Management Team, all hands on deck 24/7 from Aug 8 through November

600 people

400 employees from across company, 200 contractors involved in emergency response

95%+

Of Maui customers safely restored within three weeks

100+ people

On Maui and across company still working on rebuild, planning, community support, government partnerships, federal aid

All islands

Vehicles, equipment, shipped from all islands to support restoration efforts

80%

Of Maui customers safely restored within the first week

~\$30M

Estimated spent on manpower, material (including steel transmission poles being installed now)

Hawaiian Electric acted quickly to support the West Maui community and our partners in restoration and recovery efforts





KA 'OIHANA HO'ONA'AUAO P.O. BOX 2360

December 20, 2023

Sheri-Ann Tihada HECO 820 Ward Avenue Honolulu, HI 96814

I want to express my deepest gratitude for your exceptional dedication and unwavering nmitment to our schools during one of the most challenging times we have faced. Your support for our Lähainä community, schools, employees and students allowed our schools to reopen. As a result of your efforts and leadership, more than 2,000 students returned to their Lähainä schools for in-person learning. I wanted to take a moment to acknowledge and thank you for your expertise, hard work and aloha.

The aftermath of the wildfire brought about unprecedented disruption and challenges, and your leadership and collaborative spirit played a pivotal role in helping us navigate this crisis. You demonstrated ne'epapa in supporting our Lähainä colleagues. Thank you for providing two Starlinks for the hotel and distance learning sites and for offering restoration bandwidth to our three

I recognize that your contribution required an incredible amount of work and also personal sacrifice. Your willingness to put the needs of our students first and your determination to ensure their access to quality education are truly commendable. On behalf of the Hawai'i State Department of Education, I want to share our heartfelt appreciation and respect.







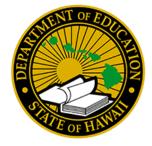












Hawaiian Electric Wildfire Safety Strategy Video



We are not waiting - immediate action to address wildfire risk



Enhanced WF Operational Strategies & Practices

Block reclosing & fast trip

Enhanced inspection tools & data

Enhanced vegetation management

Public Safety Power Shutoff (PSPS)



Improve Situational Awareness

Forward observers

Dual optical/thermal video cameras

Weather stations

360° video cameras w/ Al



Harden the Grid

Wood pole replacements

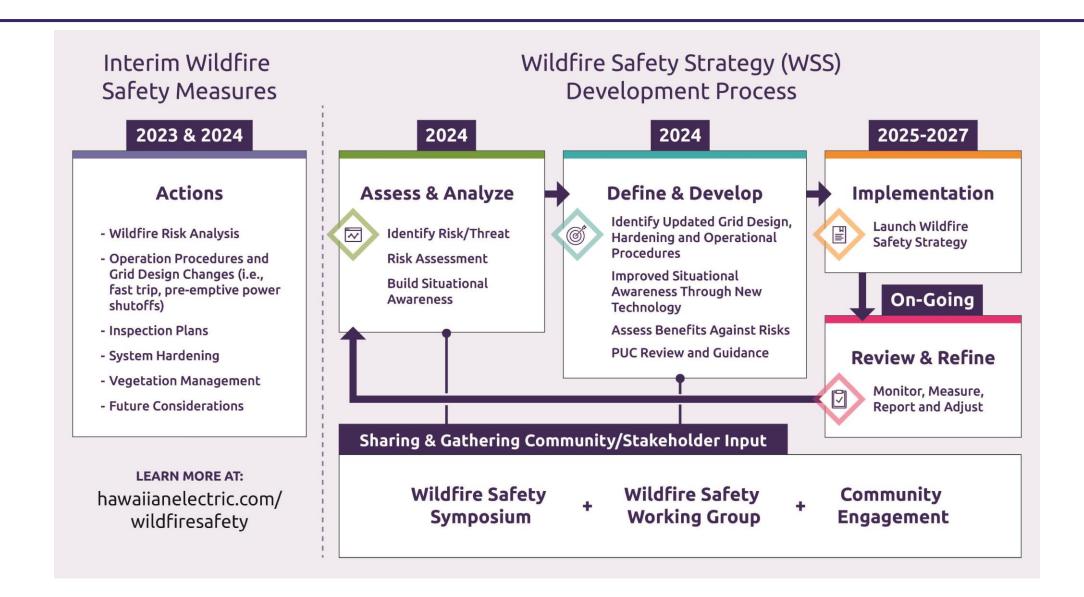
Reconductoring and line spacers

Strategic undergrounding

Address identified asset risks

\$117 million budgeted for wildfire mitigation work in 2024 (~37% of capital budget)

Wildfire Safety Strategy Development



Wildfire Safety Symposium





WILDFIRE SAFETY SYMPOSIUM

April 10-11, 2024 • Hilo, Hawai'i



- American Red Cross of Hawaii
- California Public Utilities Commission
- City & County of Honolulu
- College of Tropical Agriculture and Human Resources
- County of Hawaii
- County of Maui
- Dept. of Business, Economic Dev. and Tourism
- Dept. of Commerce & Consumer **Affairs**
- Dept. of Defense
- Dept. of Land & Natural Resources
- Dept. of Transportation
- Essential Energy
- Hawaii Green Growth
- Hawaii Public Utilities Commission

- Hawaii Wildfire Mgmt. Organization San Diego Gas & Electric
- Honolulu Board of Water Supply
- Imiloa Astronomy Center
- Kamehameha Schools

Hawaiian Telcom

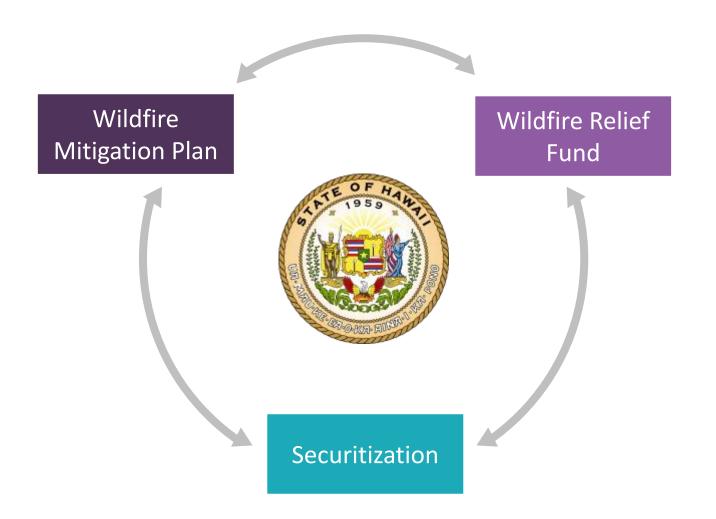
- Kauai Island Utility Cooperative
- Kohala Coast Resorts Assoc.
- Kohala Ranch Firewise
- Kohala Ranch Water Company
- Life of the Land
- LUMA Energy
- Mahi Pono
- Mauna Kea Watershed Mgmt.
- National Oceanic and Atmospheric Admin.
- Pacific Gas and Electric Company
- Puukapu Firewise
- Queen Emma Land Company

- Southern California Edison
- State Energy Office
- T-Mobile
- AT&T
- UMS Group
- United States Dept. of Homeland Security, Federal Emergency Mgmt. Agency
- Verizon Wireless
- Vibrant Hawaii
- Waianae Mountains Watershed Partnership
- Waikoloa Village Firewise

Federal funding opportunities can accelerate mitigation efforts & reduce bill impact U.S. Dept of Energy (DOE) Grid Resilience & Innovation Partnership (GRIP) Program

Title	Status of Opportunity	Est. Selection Timeframe	Total Project Amount	Federal Match %	Federal Match Amount
GRIP1 Topic 1 - Grid Resilience (grid hardening)	Selected for Award Negotiations	8/30/2023	\$ 190 million	50%	\$ 95 million
GRIP2 Topic 1 - Grid Resilience (wildfire focus)	Full Application submitted	Summer/Fall 2024	\$ 200 million	50%	\$ 100 million
GRIP2 Topic 2 - ADMS and Field Devices	Concept Paper Submitted	Summer/Fall 2024	\$ 205 million	49%	\$ 100 million
GRIP2 Topic 3 - State-wide Grid Innovation (HSEO sponsoring with DOD, HIEMA and KIUC)	Full Application submitted	Summer/Fall 2024	\$ 500 million	50%	\$ 250 million
Total			\$ 1.1 billion		\$ 545 million

Forward-looking legislation helps protect the people of Hawai'i and economy from the risk of wildfire



Representative list of supporters include:







































Wildfire Mitigation Plan





Energy is a lifeline to other community lifelines nother the most critical transmission lines to withstand extreme winds. This will p to reduce customer interruptions and the amount of time customers are without wer when storms or hurricanes strike. power syster major events ed lines underground on O'ahu in areas prone to damage from vegetation tall distribution feeder ties at isolated substations on Maui that will allow power to restored more quickly in the event of an outage.

Climate Adaptation Transmission & Distribution Resilience Program (2022)

THE SENATE THIRTY-SECOND LEGISLATURE, 2024 S.B. NO. S.D. 2 A BILL FOR AN ACT RELATING TO PUBLIC UTILITIES. BE IT ENACTED BY THE LEGISLATURE OF THE STATE OF HAWAII: SECTION 1. The legislature finds that the risk of 2 catastrophic wildfires has increased, making it imperative that ${f 3}$ electric utilities develop, implement, and administer effective 4 plans for wildfire risk mitigation. Electric utilities should 5 develop, implement, and administer wildfire protection plans, 6 and, through a public process, the public utilities commission The legislature also finds that a resilience working group, 9 convened throughout 2019 and 2020, sought to: (1) identify and 10 prioritize resilience threat scenarios and potential grid 11 impacts; (2) identify key customer and infrastructure sector 12 capabilities and needs following a severe event and loss of 13 power; (3) identify gaps and priorities in grid and co 15 provide recommendations and inputs for

Resilience Working Group & Wildfire Mitigation Plan Development (2019)

Proposed Wildfire Mitigation
Plan (2024)



Wildfire Relief Fund



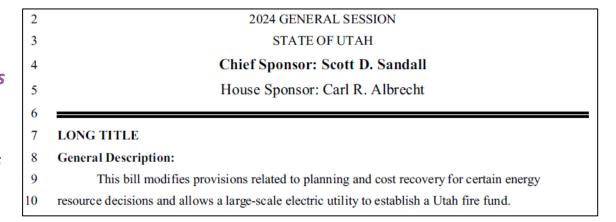


"... It is in the public interest to ensure that the threat of wildfires does not make investment in Hawaii's public utilities so financially risky that it becomes too costly or impossible for them to raise capital to implement vital plans, including plans to mitigate wildfire risk, and to provide safe, reliable, and affordable service to the people of the State ... it serves the public good to avoid the costs of litigation arising out of catastrophic wildfires in order to protect Hawaii's economy and encourage investment in the State."

- Hawaii State House of Representatives. Committee on Water and Land & Consumer Protection and Commerce, H.B. 2700, H.D. 1, (HSCR 191-24). Hawaii, Feb 8 2024

"State lawmakers [in California] passed a bill in 2019 that established a wildfire fund to help the companies manage financial risk ... 'That's a commitment that California has made that our investor-owned utilities should be investible," [Poppe] said. 'There was a period of time when we weren't, but that time has passed."

 Katherine Blunt, Wall Street Journal, Wildfires Make Utilities a Tricky Investment. Just Ask Warren Buffett





Securitization – the bill that pulls it all together and is the lowest cost option with a 5% cap



Illustrative example:



+\$4.10 typical residential monthly bill (+2.1%)



"The lower the interest rate in borrowing funds, the lower the impact on ratepayers. The lowest rate today is through securitization. To call saving money a 'bailout' is crazy."

- Henry Curtis, Ililani Media, April 13, 2024

Key Takeaways

→

- Hawaiian Electric and its employees are of and for Hawai'i
- Our focus is and has been focused on helping the people Maui recover/heal and reducing the risk of future catastrophic wildfires statewide
- The rising risk of wildfire in Hawai'i must be addressed collectively and collaboratively
 - Investments Hawaiian Electric and others are making are reducing the risk and making the grid safer, but more is needed
 - Working together we can accelerate risk reduction and reduce the bill impact of these investments through federal grants and securitization which is the lowest cost means of financing available at this time
- The proposed legislation before you is forward looking, in the public interest and will protect the people of Hawai'i and its economy from future catastrophic wildfire

Closing Remarks



Q&A

