

March 2018

Kaua'i Island Utility Cooperative

# Currents



*New AES Lāwa'i project  
will boost KIUC's  
renewable generation*

**Inside:  
Breaking Ground on a New Solar Array  
Energy Efficiency for the Modern Family**



# Aloha Island Team



**KAREN L. AGUDONG, REALTOR(B)**  
RB-17447



## IN ESCROW

### 3591 HANAPEPE ROAD

Vacant lot zoned General Commercial. Great opportunity for growing Hanapepe town! \$195,000(fs). Call: Karen Agudong, REALTOR (B) 652-0677 or email: karen@alohaisland.com.



## IN ESCROW

### 2672 APAPANE STREET, LIHUE

Beautiful 4 bedroom / 2.5 bath home with over 2,400 sf of living area in the Ulu Ko Subdivision. Gourmet kitchen, fenced yard and lanais to enjoy the mountain and golf course views! \$745,000(fs) Call: Karen Agudong, REALTOR(B) 652-0677 or email: Karen@AlohaIsland.com



## IN ESCROW

### 5318 MAKALOA STREET, KAPAA

Move-in ready 4 bedroom / 3 bath home on the cul de sac end of Makaloa! . \$590,000(fs). Call: Karen Agudong, REALTOR(B) 652-0677 or email: Karen@AlohaIsland.com



### 3221 UNAHE STREET #2, LIHUE

Very Charming Plantation Style 1 bedroom / 1 bathroom home located in the heart of Lihue in Molokoa Village III. Open floor plan and 2 outdoor lanais. Sears Storage in the back yard also included. Lowest priced residential home in Lihue! \$399,000(fs). Call: Karen Agudong, REALTOR(B) 652-0677 or email: Karen@AlohaIsland.com



### 5622 ILEINA LANE, KAPAA

5,000 sf starter lot in Kapaa. County standard roadway must be put in by purchaser prior to receiving building permit from county to build. Buyer to conduct due diligence with appropriate county agencies. \$100,000(fs). Call: Karen Agudong, REALTOR(B) 652-0677 or email: Karen@AlohaIsland.com



### YOUR PROPERTY HERE!

Looking to sell your home? Inventory is low and buyers are looking to purchase property before the interest rates go up. Please contact Karen for a FREE comparative market analysis of your property.

**EXP REALTY • KAREN L. AGUDONG • MAILING ADDRESS: PO BOX 3255, LIHUE, HI 96766**

**808-652-0677 • WWW.ALOHAISLAND.COM • EMAIL: KAREN@ALOH AISLAND.COM**

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**Corporate Address: 100 Kahelu Ave #233 Mililani, HI 96789**

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Kaua'i Island Utility Cooperative

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**ON THE COVER**

Woody Rubin, president of AES Distributed Energy; Sen. Ron Kouchi; KIUC board president Allan Smith; CEO David Bissell and Mayor Bernard P. Carvalho Jr. pose for photos during the groundbreaking of the AES Lāwa'i project. Photo credit Shelley Paik.

## Save postage, get your Currents online

Currents is mailed quarterly to members of Kaua'i Island Utility Cooperative. This issue and back issues also are available online at [www.kiuc.coop](http://www.kiuc.coop).

If you would like to help the cooperative save paper and postage, you can receive Currents via email or simply read it on our website. Just send a note to [currents@kiuc.coop](mailto:currents@kiuc.coop) and we will take you off the mailing list.

We're also open to story ideas, letters and suggestions. And we're always looking for new recipes. Thank you for reading Currents.



Only active KIUC members will be mailed KIUC Currents. KIUC Currents can be found online at [www.kiuc.coop](http://www.kiuc.coop) under News and Currents.

KIUC is an equal opportunity provider and employer.

# Patronage Capital

By Peter Yukimura, Chair, Finance and Audit Committee, KIUC Board of Directors



One of the benefits that you as a member-owner of Kaua'i Island Utility Cooperative enjoy is participation in the success of the cooperative through capital credit allocations and potential disbursements.


Capital credits come from the money a cooperative has left over after paying all of its expenses in a given year. At the end of the year, that money is credited to the member's account according to the amount paid for energy used.

When capital credits are healthy and KIUC's finances permit, the cooperative returns a portion of that money to its member-owners in the form of patronage capital retirements.

On behalf of your board of directors, I am pleased to report that 2017 was an excellent financial year for KIUC. Due to a number of factors—including savings on operations and maintenance, successful refinancing of debt and replacing fossil fuel generation with renewables—we expect to return more than \$3 million to our members in the form of patronage capital later this year.

As members of a relatively young cooperative, there is much for us to celebrate. In just 15 years, we have gone from a position of zero equity in 2002 to achieving more than 33 percent equity in 2017.

There is much work yet to be done. We continually strive to reduce expenses and gain efficiencies, especially through better use of technology. We are replacing the volatile pricing of fossil fuels with stable, lower pricing of renewables via long-term power purchase agreements.

With your continued support and input, we feel confident KIUC's progress will continue, and our member-owners will reap greater and greater benefits in the years to come. 

## Definitions

**Margins:** The difference between a cooperative's income and its expenses. Margins are returned to members in the form of patronage capital as the cooperative's financial status allows.

**Patronage capital:** Margins credited to members of a cooperative based on their purchases from the cooperative. Is used by the cooperative as working capital, then paid back to the membership; also called capital credits. Patronage capital should not be confused with profits, which are a return on capital. Retirement of patronage capital is a return of member-furnished capital.

**Patronage capital account:** An individual account containing all unpaid margins. The cooperative uses the account for paying loans, buying fuel and overall operations.

# 2018 KIUC BOARD OF DIRECTORS ELECTION RESULTS


Newly elected director Janet L. Kass joins incumbent directors David Iha and Teofilo Phil Tacbian, who have been re-elected to Kaua'i Island Utility Cooperative's Board of Directors. These three directors will each serve for a three-year term ending March 2021.

Merriman River Group, a California-based election management firm, conducted the election and submitted the official results for the 2018 Board of Directors Election. The results are as follows:

- |                                   |       |                               |       |
|-----------------------------------|-------|-------------------------------|-------|
| 1. David Iha . . . . .            | 2,660 | 4. Daniel Erickson. . . . .   | 2,144 |
| 2. Teofilo Phil Tacbian . . . . . | 2,507 | 5. Patrick S. Gegen . . . . . | 1,937 |
| 3. Janet L Kass . . . . .         | 2,465 | 6. Scott N. Giarman . . . . . | 1,281 |



KIUC mailed 25,826 ballots and received 4,910 responses, for a turnout of 19 percent.

The newly elected board members will be inaugurated on March 20 at 11 a.m. in the KIUC Main Conference Room. The board will hold its regularly scheduled meeting at 1 p.m. 

## Reducing Our Dependence on Fossil Fuels

*By Jan TenBruggencate, Chair, Executive Committee, KIUC Board of Directors*

Are we making progress toward reducing our community's fossil fuel use?

At Kaua'i Island Utility Cooperative, the progress is remarkable. Our little utility is leading the state in the pace of our shift to renewable resources.

Just 10 years ago, KIUC produced roughly 92 percent of its energy from oil-based fossil fuel sources. That fuel arrived in tanker ships, was subject to wild variations in global oil prices and generated massive amounts of carbon dioxide, which has global climate impacts.

The remaining 8 percent of our electricity came from a collection of sugar plantation-era hydroelectric plants, which are scattered around the island from Wainiha to the north clockwise to Kekaha to the west.

But wow, how times have changed.

Our electric utility in 2017 generated just short of 450,000 megawatt-hours annually—not a whole lot more than 10 years ago. But the amount that comes from renewables will surpass 50 percent this year.

Generating that renewable energy from natural resources here on Kaua'i equates to millions of gallons of oil we're not burning, tens of millions of dollars we're not sending out of state to oil companies and more than 250,000 tons of carbon dioxide we're not dumping into the air.

How have we done that? With a portfolio of renewable resources, including biomass, hydroelectric power and both pure solar and solar-plus-batteries.

Our progress started with smaller solar projects, but our big Kōloa solar farm helped us reach 27 percent renewable in 2015. The Green Energy biomass plant and Anahola solar plants in 2016 helped us get to 40 percent. Last year's Tesla solar-plus-battery plant got us to 45 percent.


This year, we expect Gay & Robinson's new hydroelectric plant and the AES solar-plus-battery array in 'Ele'ele to push us well into the 50s.

While some other utilities cheer increasing renewables by a percent or two a year, KIUC has more than doubled its renewable portfolio in the past five years.

And progress continues. We are actively working with the Navy on a big solar-plus-battery project at the Pacific Missile Range Facility, and we continue our progress on a pumped storage hydro project on the west side.

We have done all this at the urging and with the support of our member-owners, many of whom participated in our strategic planning sessions.

We have taken risks to do all this, and certainly not all of our risks have worked out. But the steady climb in renewables, along with a steadily healthy balance sheet, shows that our path is the right one.

I can't tell you the pride we directors feel when our members stop us on the street and either thank or congratulate us. I tell them that the success is shared with them. That's the strength of the cooperative. We're all in it together. 

# Board Actions

*Below is a summary of some of the actions taken by the KIUC Board of Directors in November and December 2017, and January and February 2018.*

## November 9, 2017—Special Meeting

Motion carried approval to file a draft long-term habitat conservation plan.

## November 28, 2017

Motion carried for purchase of production simulation modeling software license and setup. 2017 capital expense of \$104,000.

Motion carried pre-approval of 2018 capital budget expense of \$245,000 to preorder steel engine gears for Port Allen SWD Unit D8.

Motion carried over budget expenditure of \$284,100 to replenish underground distribution transformers inventory.

Motion carried to allow KIUC staff to expend up to \$200,000 to conduct due diligence on a new project.

## December 12, 2017

Motion carried designation of Peter Yukimura and Phil Tacbian as the 2018 National Rural Electric Cooperative Association voting delegate and alternate.

Motion carried Resolution 09-17 and secretary's certificate to execute \$60M Rural Utilities Service Federal Financing Bank note.

Motion carried Resolution 10-17, approval of 2018 Results of Operations budget.

Motion carried Resolution 11-17, approval of 2018 capital budget.

Motion carried transmission insulator replace, over-budget request of \$155,000.

Motion carried vehicles, 2018 budget variance of \$170,000.

Motion carried appointment of 2018 nominating committee members: Mina Morita, Gordon Yee, Allison Mizuo Lee and Rob Goldberg.

Motion carried authorization up to \$125,000 for engineering and related costs to design permanent diversion modifications and to make immediate changes, subject to Commission on Water Resources Management approval, to ensure permanent uninterrupted flow at North Fork Wailua and the other major streams on our upper ditch systems.

Motion carried Resolution 12-17, the decision to allow KIUC staff to enter into an agreement with a private agency whereby the private agency would contribute development costs toward the westside hydro project.

## January 30, 2018

Motion carried authorization for CEO David Bissell to serve as director on the Technical Advisory Counsel to the Puerto Rico Electric Power Authority.

Motion carried Regulatory Outside Services over-budget request of \$288,430.

Motion carried Transmission & Distribution overhead lines maintenance over-budget request of \$303,000.

Motion carried Board Policy No. 5, conflicts of interest and conduct of interested persons (amended).

Motion carried Board Policy No. 19, anti-retaliation and whistleblowing (no changes).

Motion carried the decision to approve certain expenditures for environmental studies related to modifications at Waiahi hydro structures.

Motion carried the decision to approve an amendment to the contract for the Joule Group.

Motion carried the decision to approve a memorandum of understanding with the Small Island Developing States Sustainable Energy and Climate Resilience organization.

Motion carried the decision to approve an annual contract for general counsel.

**February 20, 2018**

No actions taken—deferred to February 22, 2018, special meeting.

**February 22, 2017— Special Meeting**

Motion carried request to put up for sale a vacant land parcel (former substation site) in Isenberg, Lihue.

Motion carried authorization to expend \$440,000 for the design and engineering of the PMRF Substation.

Motion carried Board Policy No. 11, patronage capital credit assignment and retirement management— no substantive changes.

Motion carried Board Policy No. 13, community and economic development—no substantive changes.

Motion carried reaffirm the Government Relations/Legislative Affairs committee to act as trustee for the KIUC Political Action Committee with the ability to appoint PAC officers. Also the GRLA chair be designated as the Hawaii representative on the NRECA Action Committee for Rural Electrification board.

Motion carried the decision to approve the 2017 corporate performance results.

Motion carried the decision to approve the 2018 corporate performance targets.

Motion carried the decision to approve the CEO’s 2017 annual evaluation.



**Kauai  
Brewers  
Festival**

Come join the fun and support Junior Achievement Kaua‘i

**Saturday, April 28th 2pm—6pm**

at the

Poipu Beach Athletic Club

Live music, delicious nibbles from top local restaurants, tasty cold craft beer, and a glass logo mug all included with ticket purchase. 21 and over only.

Tickets available online only for \$75 on Eventbrite at <https://kauaibrewersfestival.eventbrite.com>.

Support education on Kaua‘i and come have fun!

VIP partner packages available.

Call Christopher Young for information at 635-0411.



**Junior Achievement®**

# Energy Efficiency for the Modern Family and its Many Devices

By Kathryn Williams, KIUC Energy Services Supervisor

If you are struck by the amount of screens, remotes, gaming controls, charging stations and cords that have become fixtures in your home, you are not alone. The typical American family is well connected and owns a variety of electronic devices. According to the PEW Research Institute, 95 percent of U.S. families have a cell phone, and 77 percent of Americans own a smart phone. Nearly 80 percent of adults own a laptop or desktop computer, while approximately half own tablets.

Consumer electronics, coupled with the growing array of smart home appliances and technology, have slowly but steadily changed our homes and lifestyles. The increased reliance on our many devices has new implications for home energy use and efficiency.

## Using Smart Technology to Manage Energy Savings

How can we save energy when we are using more electronic devices than ever before? The answer may lie with some of those same electronic devices that have become indispensable to modern living. In many cases, energy savings is a touchscreen away as more apps enable you to monitor energy use.

You can also ensure efficiency by buying Energy Star-certified appliances. Many new appliances

include smart-technology features. Refrigerators can tell you when maintenance is required or when a door has been left open.


Kaua'i Island Utility Cooperative's Energy Wise program provides rebates for purchases of new qualifying appliances such as solar water heaters, heat pumps, clothes washers, refrigerators, freezers, Energy Star window air conditioners and ceiling fans.

## "Old-School" Energy Savings for New Devices

Of course, time-tested old-school methods of energy efficiency can be applied to myriad household electronic devices and screens. Computers, printers, phones and gaming consoles are notorious "vampire power" users, meaning they drain energy—and money—when not in use.

If items can be turned off without disrupting your lifestyle, consider plugging them into a smart power strip that can be turned on and off or placed on a timer.

While modern life involves greater dependence on technology, your best resource for saving energy and money remains with your local electric co-op.

Regardless of your level of technical expertise with electronic devices, KIUC can provide guidance on energy savings based on your account information, energy use and additional factors unique to your home or business. Find out more by calling us at (808) 246-4300. 





# Powering Up After an Outage

When the power goes out, we expect it to be restored within a few hours. But when a major storm or natural disaster causes widespread damage, extended outages may result. Our line crews work long, hard hours to restore service safely to the greatest number of members in the shortest time possible. Here's what is going on if you find yourself in the dark:



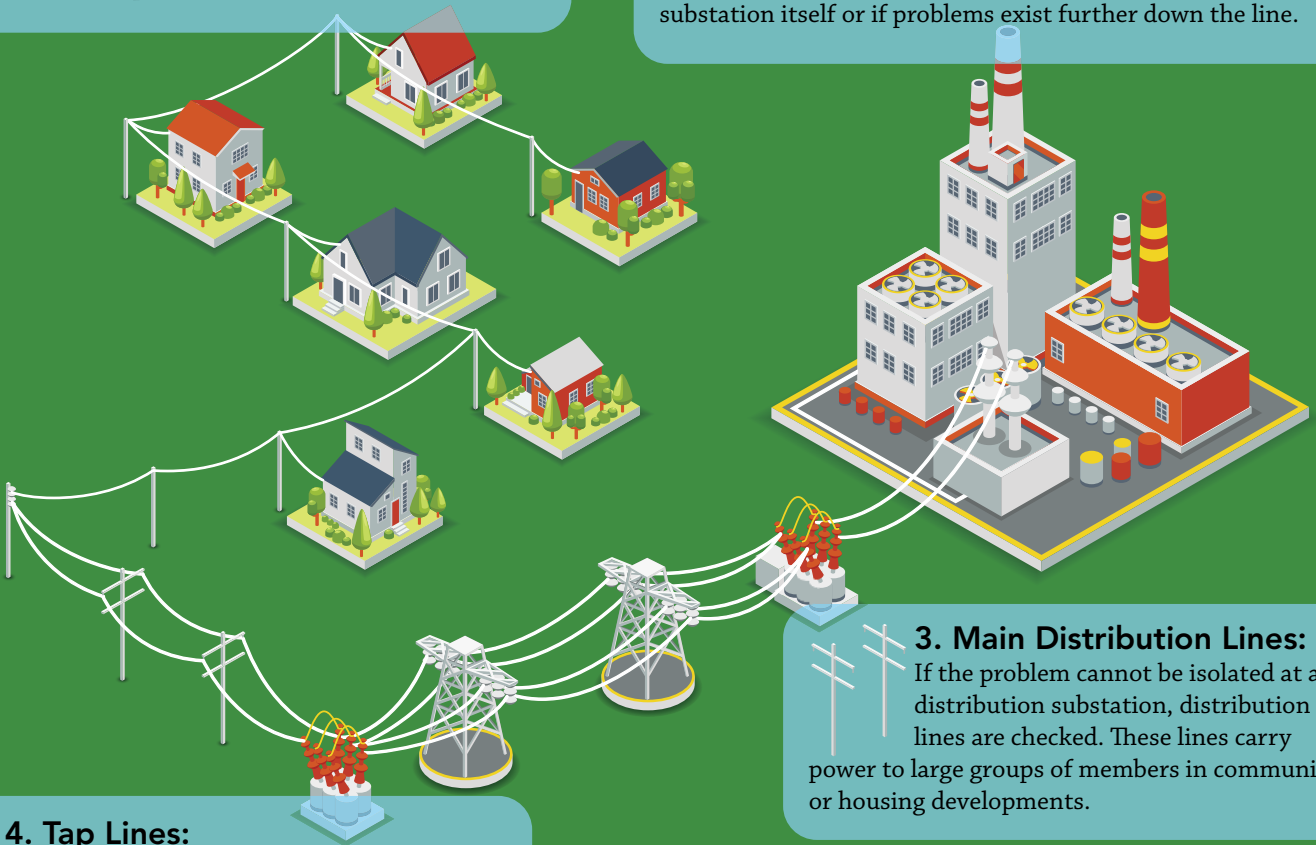
## 1. High-Voltage Transmission Lines:

Transmission lines provide power to switchyards and substations across the island. We do have redundant lines for most of the island, but when a transmission related outage occurs, it will typically affect large areas of the island. They may be extended in time, especially if the faulted area is only accessible via helicopter.



## 2. Distribution Substation:

A substation can serve hundreds or thousands of members. When a major outage occurs, line crews inspect substations to determine if problems stem from transmission lines feeding into the substation, the substation itself or if problems exist further down the line.



## 3. Main Distribution Lines:

If the problem cannot be isolated at a distribution substation, distribution lines are checked. These lines carry power to large groups of members in communities or housing developments.



## 4. Tap Lines:

If local outages persist, supply lines (also known as tap lines) are inspected. These lines deliver power to transformers, either mounted on poles or placed on pads for underground service, outside businesses, schools and homes.



## 5. Individual Homes:

If your home remains without power, the service line between a transformer and your residence may need to be repaired. You can check our KIUC Facebook page for current outages, or call 246-4300 to report an outage, especially if you see a line down or arcing.

Before repairs are initiated, crews sometimes will temporarily restore power to customers not immediately in the trouble area and then commence with work. Our goal is to minimize outage time to our members.



## KIUC and AES Break Ground on New Solar Array

The sky was threatening to storm, but that didn't dampen the spirits of the 80-plus people in attendance for a groundbreaking ceremony in late February for what will be Hawai'i's largest solar-plus-battery storage project, and possibly the largest such facility in the world.

"We're breaking new ground in more ways than one," says David Bissell, KIUC's president and chief executive officer. "Working with partners like AES Distributed Energy, our small cooperative is showing the world that dispatchable solar can be a viable pathway to replacing fossil fuels with renewables."

Located on roughly 200 acres of former McBryde Sugar Company land on Kaua'i's south side, the AES Lāwa'i project will consist of a 28 megawatt solar photovoltaic array coupled with a 100 megawatt hour, five-hour-duration energy storage system.

"This facility will provide 11 percent of Kaua'i's electric generation, increasing KIUC's renewable sourced generation to close to 60 percent," Bissell says.

At 11 cents per kilowatt hour, the pricing is well below the cost of diesel and will not only provide downward pressure on rates, but also helps KIUC avoid the use of 3.7 million gallons of diesel each year.

The AES Lāwa'i project follows the successful deployment of the 13 megawatt Tesla solar-plus-battery storage facility in Kapaia in early 2017.

"Projects like this are possible because we've forged partnerships with landowners like A&B and Grove Farm, along with proven industry leaders such as AES," says Bissell. "Credit is also due to our board of directors for setting bold strategic goals, and of course to our member-owners for their support."



Board chairman Allan Smith addresses the audience at the site dedication.


Woody Rubin, president of AES Distributed Energy, points out that the company has had a presence in Hawai'i for more than 25 years.

"This first-of-its-kind project demonstrates our continued commitment to the state's vision of a cleaner energy future," he says. "This innovative project, due to come online by the end of this year, will help reduce Kaua'i's reliance on fossil fuels while generating clean, reliable and affordable energy."

The Lāwa'i project is expected to be followed by a second AES solar-plus-battery storage facility on land owned by Pacific Missile Range Facility and is in the permitting phase. According to Bissell, the two projects combined will put KIUC's renewable portfolio well over the 60 percent mark by late 2019.

Battery-based energy storage has become a key component in KIUC's mission to reach its strategic goal of 70 percent renewable by 2030. Using a combination of distributed rooftop solar resources and direct-to-grid utility-scale solar fields, KIUC's renewable penetration already reaches nearly 100 percent on most sunny days. The challenge is moving the over-abundance of daytime solar resources into the evening peak period, where KIUC is still overly dependent on diesel.

It's a daunting task, but Bissell has no doubt KIUC will reach its renewable goal sooner than later.

"KIUC and its partners like AES are leading the way and showing the world that strategic and responsible use of our natural resources can lead to clean, lower-cost fuel that benefits both our community and our environment," he says. 



Kumu Sabra Kauka prepares for the blessing and site dedication with the assistance of KIUC Board Chair Allan Smith.



**Considering a career in civil, mechanical or electrical engineering, construction management or architecture?**

**SCHOLARSHIPS AVAILABLE**

**Annual Contractors Association of Kaua'i Scholarship Program**

**Application deadline: April 30, 2018**

Application forms available: All high school senior counselors, Kamehameha Schools, Kaua'i Regional Office on Akahi Street; Island School; and Kaua'i Community College Vocational and facilities maintenance staff and by calling CAK at 246-2662 or going to CAK website: [contractorsassnofkauai.org](http://contractorsassnofkauai.org).

- Applicants can be currently in college majoring in a construction related field of study engineering-(civil, mechanical or electrical), construction management or architecture, or post-graduate work in these fields.
- Applicants can also be high school seniors planning to major in engineering-(civil, mechanical or electrical); construction management or architecture.
- There are Kenneth Shioi Memorial Scholarships available for students majoring in or planning to major in the construction trades program at Kaua'i Community College. Up to two \$1,000 scholarships are available.

# HYDRO

KIUC receives power from five hydroelectric plants, which represents roughly 7.5 percent of Kaua'i's electricity.

The hydro facilities were built more than 100 years ago to provide power to sugar plantations. Hydro is an important part of Kaua'i's renewable energy portfolio. Along with solar and biomass, Kaua'i's renewable mix is targeted to grow to 70 percent by 2030.

# 2.5 MILLION



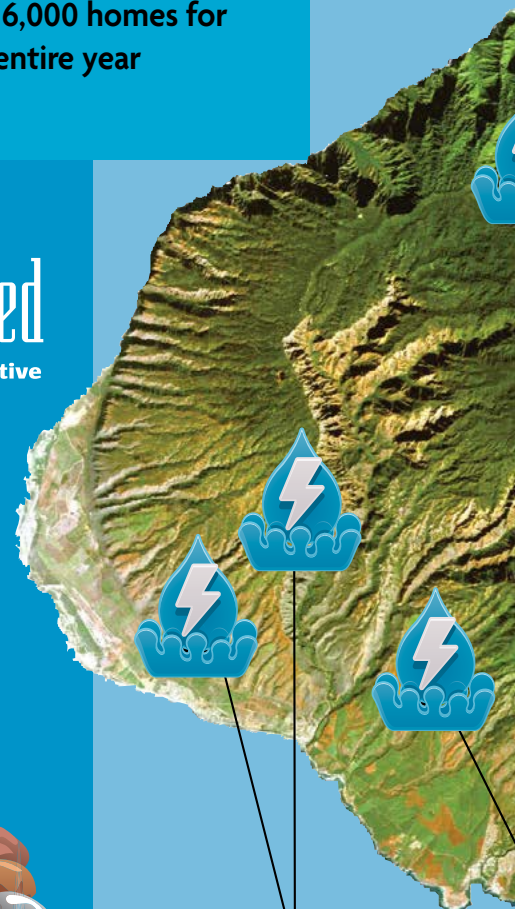
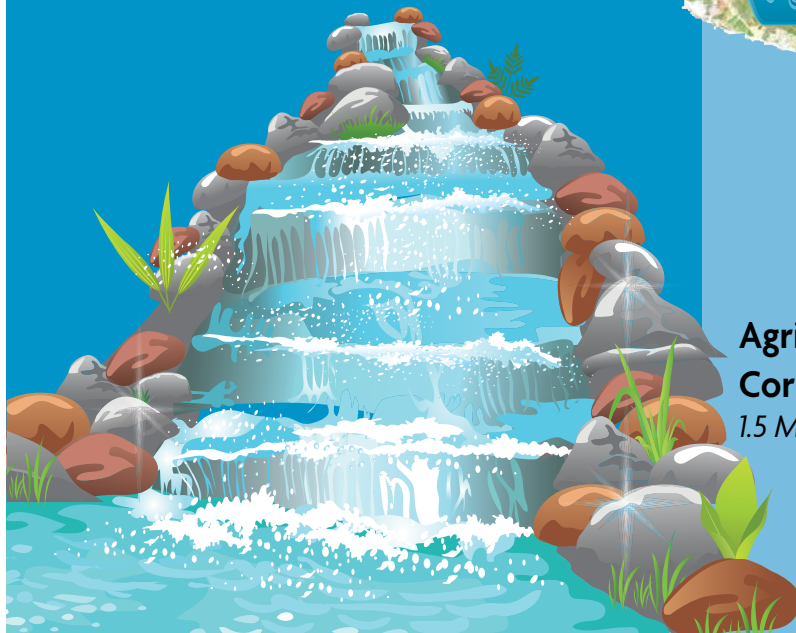
Total avoided diesel: 2.5 million gallons annually; equivalent to the use of electricity for 6,000 homes for an entire year



## Hawai'i Powered

Hawai'i Clean Energy Initiative

Supports the Hawai'i Clean Energy Initiative, with a goal of reaching 100 percent renewables coming from locally generated sources by 2045



Agribusiness Development Corporation - Waimea/Kaunaloa  
1.5 MW, built in 1908

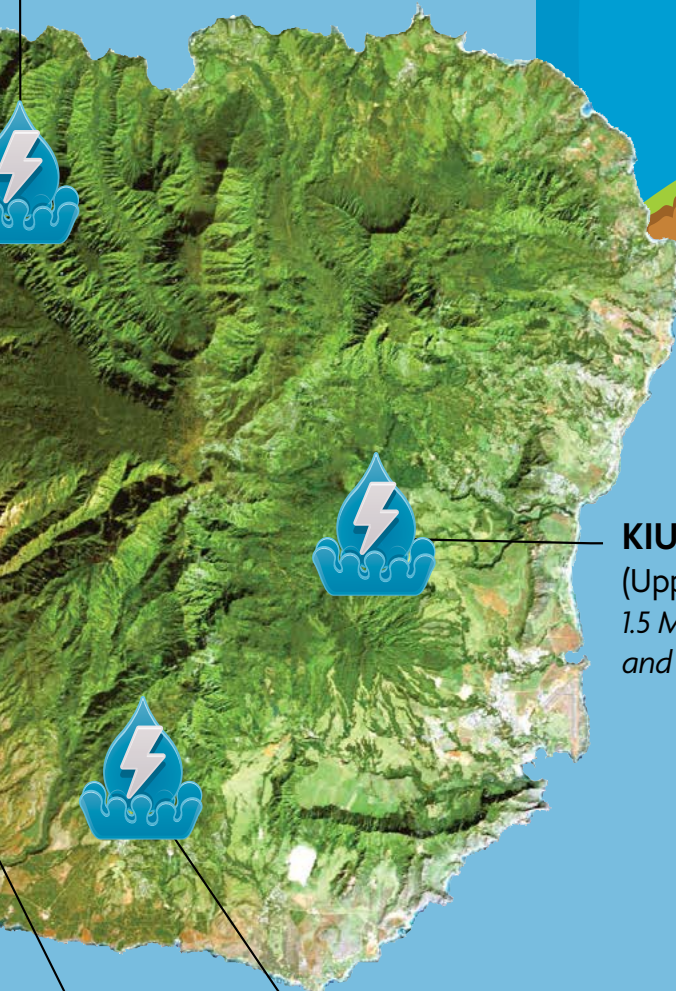


Hydroelectric projects are regulated by the State Department of Land and Natural Resources

Using hydro to turn a turbine is the oldest way of generating electricity on Kaua'i and represents eight percent of the energy produced annually. We're studying projects that could provide clean, reliable power for the next 100 years



**McBryde - Wainiha**  
4.0 MW; built in 1906



**KIUC - Waiahi**  
(Upper and Lower)  
1.5 MW; built in 1913 and 1920

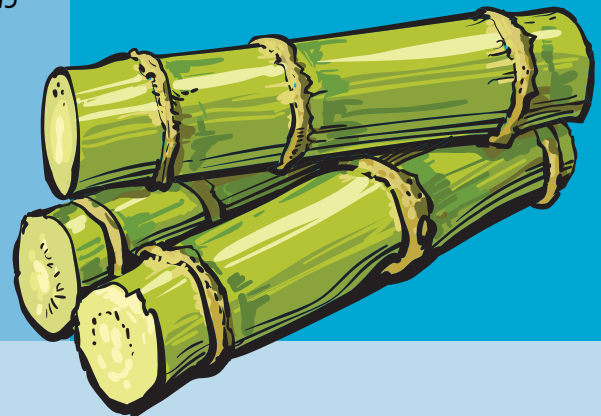


**McBryde - Kalāheo**  
2.0 MW, built in 1928

nt  
ekaha

**Gay & Robinson - Olokele**  
1.3 MW, built in 1904

All of the hydro facilities were built by the sugar plantations in order to help agriculture flourish on Kaua'i



**Kaua'i Island Utility Cooperative**

Your Touchstone Energy® Cooperative





Photo by: Ron Kosen



Photo by: Chris Jensen



Photo by: Ron Kosen

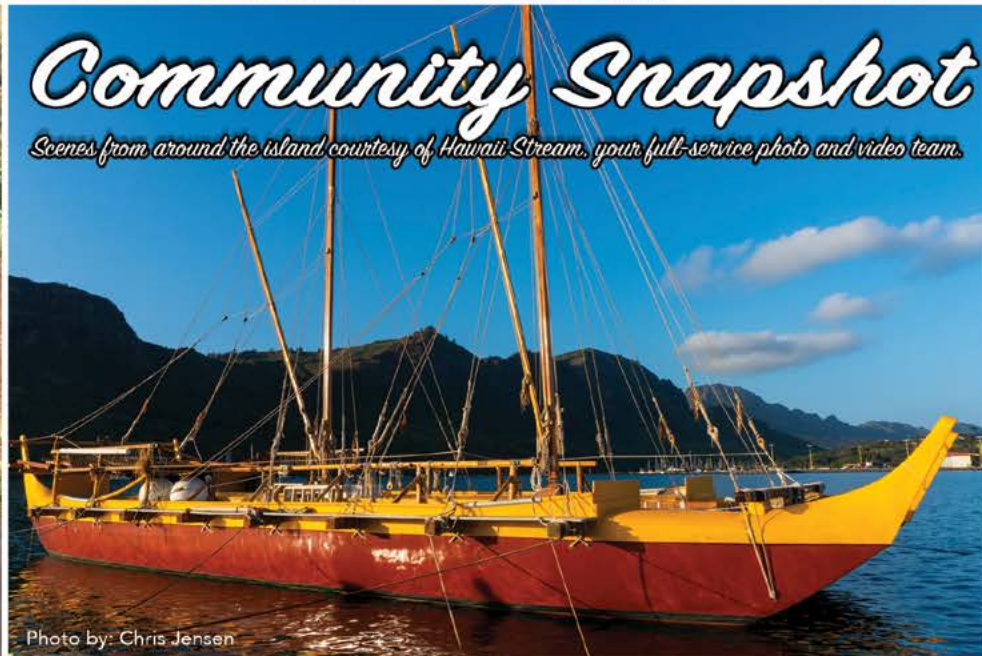


Photo by: Chris Jensen

# Community Snapshot

Scenes from around the island courtesy of Hawaii Stream, your full-service photo and video team.



Photo by: Ron Kosen



Photo by: Ron Kosen



# HAWAII STREAM



Photo by: Ron Kosen



Photo by: Chris Jensen



Photo by: Chris Jensen



Photo by: Chris Jensen



Photo by: Lorraine Parongao



Photo by: Ron Kosen



All Team Photos by: Justin Ryan Bobiles



# Springtime Specialties



## Summer Roll

- 1 cucumber, julienned
- 1 carrot, julienned
- 1 red onion, julienned
- 1 bunch mint, stems removed
- 1 bunch basil, stems removed
- 1 bundle rice noodle, boiled in water and drained
- 1 package rice wrapper
- 1 head romaine lettuce, chopped
- 1 package bean sprouts
- 1 rotisserie chicken, shredded

Dip rice wrapper in a bowl of water and put on a plate. About 1/3 from the top of the wrapper, layer all ingredients. Fold sides over and roll wrapper tightly. Serve with sweet chili sauce.

## Vegetable Lasagna

- 1 large carrot, sliced
  - 1 red bell pepper, chopped
  - 1 zucchini, chopped
  - 1 portabella, sliced
  - 1 cup butternut squash, cubed
  - 1 onion, sliced
  - 2 cloves garlic, chopped
  - 1 package frozen spinach
  - ½ teaspoon salt
  - 1 jar marinara sauce
  - 16 ounces cottage cheese
  - 1 box no-boil noodles
  - 2 cups mozzarella
  - 3 tablespoons olive oil
- Heat oven to 400 F.

Put olive oil in a skillet over medium heat. Add carrot, onions and garlic. Cook for 5 to 10 minutes until onions and carrots are tender. Add salt, portabella, butternut squash, zucchini, bell pepper and spinach. Keep stirring until all ingredients are heated through, then remove pan from heat. Add cottage cheese and mix well.

In a 9-by-13-inch pan, layer sauce, noodles, vegetables and cheese. Continue until pan is full. Bake for 30 minutes or until noodles are tender.







## Turkey Meatballs

- 1 cup Parmesan cheese
- 1½ cups Italian style breadcrumbs, divided
- 1 small onion, diced
- 2 teaspoons Italian seasoning
- 2 cloves garlic, minced or grated on a microplane
- 2 pounds ground turkey breast
- 2 eggs
- 1 teaspoon sea salt
- ½ teaspoon black pepper
- ½ teaspoon red pepper flakes
- 2 bottles marinara sauce
- 2 tablespoons olive oil

Heat oven to 375 F.

Coat the bottom and sides of a 9-by-13-inch pan with olive oil. In a large mixing bowl, combine ground turkey, cheese, 1 cup of bread crumbs, eggs, Italian seasoning, garlic, onion, salt, pepper and red pepper flakes. Shape mixture into balls and roll in remaining ½ cup of breadcrumbs before placing in pan. Bake for 20 minutes, turning over meatballs about halfway through. Add marinara sauce and continue baking for an additional 20 minutes.

## Rainbow Soba Salad

- 2 bunches buckwheat soba, cooked according to directions on package
  - 1 head green leaf lettuce, chopped
  - 1 pound ocean salad
  - 1 Japanese cucumber, julienned
  - 1 cup purple cabbage, julienned
  - 1 red bell pepper, julienned
  - 2 carrots, julienned
  - Takuan, sliced
  - 1 cup shelled edamame
- Layer all ingredients in a bowl.

### Dressing

- ½ cup shoyu
  - ½ cup honey
  - 4 tablespoon rice vinegar
  - 4 inches ginger, grated
  - 1 teaspoon sesame oil
- Combine all ingredients in a jar and shake before serving.



## Chocolate Chia Seed Pudding

- 1 container vanilla Greek yogurt
- ¼ cup chia seeds
- ½ cup chocolate protein powder or chocolate powder
- 2 cups milk
- Sliced fruits for garnish

Blend milk and protein powder. Add chia seeds and let sit for 20 minutes. Combine with yogurt and chill for 2 hours. Garnish with your favorite fruits.

Note: For more chocolate flavor, add chocolate syrup.



# Statement of Operations

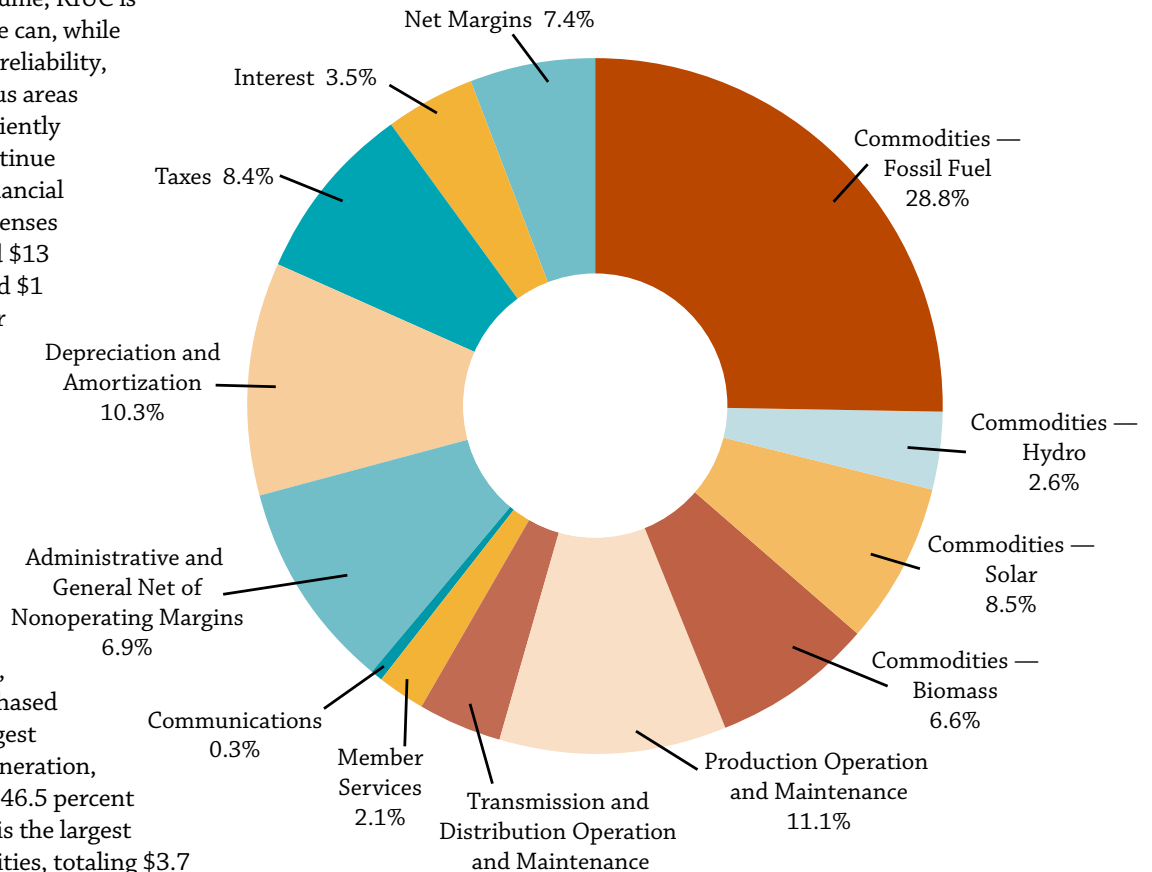
For the period January 1, 2018, to January 31, 2018

We are pleased to report that the KIUC results of operations through January 31, 2018, are favorable. The year-to-date electricity usage on the island is 1 percent higher than in the prior year. Even with the increase in sales volume, KIUC is still doing everything we can, while maintaining safety and reliability, to reduce costs in various areas in order to operate efficiently and effectively, and continue to maintain a strong financial position. Revenues, expenses and net margins totaled \$13 million, \$12 million, and \$1 million, respectively, for the one-month period ending January 31, 2018.


As is the case for all electric utilities, the cost of power generation is the largest expense, totaling \$7.4 million or 57.6 percent of revenues. Commodities, which are fuel and purchased power costs, are the largest component of power generation, totaling \$6.0 million or 46.5 percent of revenues. Fossil fuel is the largest component of commodities, totaling \$3.7 million or 28.8 percent of revenues. Other commodities include hydro power, totaling \$0.3 million or 2.6 percent of revenues; solar power, totaling \$1.1 million or 8.5 percent of revenues; and biomass power, totaling \$0.9 million or 6.6 percent of revenues. The remaining \$1.4 million or 11.1 percent of revenues represents the cost of operating and maintaining the generating units.

The cost of operating and maintaining the electric lines totaled \$0.5 million or 3.5 percent of total revenues. The cost of servicing our members totaled \$0.3 million or 2.1 percent of revenues. The cost of keeping our members informed totaled \$0.04 million or 0.3 percent of revenues. Administrative and general costs, which include legislative and regulatory expenses, engineering, executive, human resources, safety and facilities, information services, financial

## PERCENTAGE OF TOTAL REVENUE



and corporate services, and board of director expenses, totaled \$1 million or 7.4 percent of revenues.

Being capital intensive, depreciation and amortization of the utility plant costs \$1.3 million or 10.3 percent of revenues. Although not subject to federal income taxes, state and local taxes amounted to \$1.1 million or 8.4 percent of revenues. Interest on long-term debt, at a favorable sub-5 percent interest rate, totals \$0.5 million or 3.5 percent of revenues. Non-operating net margins added \$0.1 million to overall net margins. Revenues less total expenses equal margins of \$1 million or 7.4 percent of revenues. Margins are allocated to consumer members and paid when appropriate. 

# Stop Sweating and Start Saving



Replace your older, less efficient appliance with a new energy-efficient model!

June 1 through September 30, 2018, get a \$50 rebate to replace your old window air conditioner with an Energy Star air conditioner with an Energy Efficiency Rating (EER) of 11.2 or higher.

Get a \$25 rebate to replace your old ceiling fan with a new Energy Star ceiling fan, valid for up to two ceiling fans per household.

Applications and information may be found at [www.kiuc.coop](http://www.kiuc.coop).

Questions? Call us at 808.246.4300.



KIUC is an equal opportunity employer and provider.



*Donate and give more than just food.*



**Hawaii Foodbank Food Drive**  
**Saturday April 21, 2018 | 8:00 am – 2:00 pm**

For more information on Food Drive site locations, visit [www.hawaiifoodbank.org](http://www.hawaiifoodbank.org)

482-2087 / @hawaiifoodbank



First Hawaiian Bank  
 Public Service Announcement



### Most Needed Items

- Canned Protein (Tuna, Chicken)
- Canned Meals (Stew, Spaghetti, Chili)
- Canned Vegetables
- Canned Fruits
- Rice
- Monetary Donations

March 2018  
Volume 15, Number 1

**David Bissell**  
*President and CEO*

**KIUC Board of Directors**

*Chairman:* Allan Smith  
*Vice Chairman:* Jan TenBruggencate  
*Treasurer:* Peter Yukimura  
*Secretary:* Calvin K. Murashige  
*Board:* Dee Crowell, Pat Gegen, David Iha,  
Jim Mayfield, Teofilo "Phil" Tacbian

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Peter Yukimura

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**March for Babies**  
is a day for everyone.

**Together we hope,  
remember, and  
celebrate at our walk  
sites nationwide.**

**We hope for the day  
when all moms and  
babies are healthy.**

**We remember those  
babies we lost.**

**We celebrate  
every baby.**

**April 7, 2018**

**Lydgate Park – Main Pavilion**  
Registration at 6:45 a.m. — Walk at 8 a.m.

Walkers will enjoy about a 1-mile walk around Lydgate Park ending in fun activities for the whole family including games, prizes, food, and lots of fun.

**Help us help Kaua'i babies.**



Nannie Apalla, March for Babies 2018 Coordinator  
[nannie.apalla@gmail.com](mailto:nannie.apalla@gmail.com) • 1-800-272-5240 • 808-634-8743