Rcvd Ck# 963 $25 LA

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October 14, 2024

LA PUBLIC SERVICE COMM
OCT 15 2024 PM 1:45

VIA MAIL AND FAX
225-342-0877

Louisiana Public Service Commission
ATTENTION: Records Division
602 N. 5th Street, 12th Floor
Baton Rouge, Louisiana 70802

Louisiana Public Service Commission
ATTENTION: Records Division
P.O. Box 91154
Baton Rouge, Louisiana 70821-9154

Re: Intervention in Proceedings S-37394
South Louisiana Electric Cooperative Association

Ladies and Gentlemen:

Enclosed please find an Intervention and Objection to the Petition in the captioned matter. The original of this filing is being made by fax with copies delivered by overnight mail to the physical address at 602 N. 5th Street and by regular mail to the above post office box. My check for the $25 fax filing fee is enclosed.

Also attached is a copy of my previous request to intervene submitted on October 5 and mailed directly to the records devision at the capitoned physical address, pursuant to PSC Rule 3A3C.

Very truly yours,

Christopher M. Guidroz

CMG/lz
Enclosures
cc: Kara B. Kantrow, Esq. (kara@mklawla.com)
Kyle C. Marionneaux, Esq. (kyle@mklawla.com)
John N. Grinton, Esq. (john@mklawla.com)

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Chris Guidroz
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cguidroz@gmail.com
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Phone: 504-427-5929

Louisiana Public Service Commission

ATTN: Records Division

602 N 5th Street
12th Floor
Baton Rouge, LA 70802

October 5, 2024

Ladies and Gentlemen,

This is a request to intervene in proceedings S-**37394** to object to the petition filed by South Louisiana Electric Cooperative to abandon the utility lines serving Lake Decade, Grand Pass and the island at the end of Four Point Road.

Since 1984 my family has had a camp on Bayou Decade. Our camp is in Terrebonne Parish Section 34, T10S R 1E (29degrees 22"15.5N; 90degrees 55'02.2W) on long term lease LTLT-1856. I own the camp. To ensure that the lease survives me, it is in the name of my wholly owned LLC, Action Charters. My brother Mark Guidroz is also a party in interest since he attends to the utilities under SLECA Account 4153405902, meter 90406447.

Over the last 40 years we have spent substantial funds improving our camp and securing leases for thirty-eight additional years, through 2062. Throughout this time, we have relied upon the electrical power provided by SLECA. We have always been assured, through SLECA'S course of dealings, and letters after each hurricane, that we can count on this power.

If SLECA is permitted to abandon these lines, we will suffer significant economic damage. I request notice of all hearings and ask for the opportunity to file a fully developed objection to SLECA's petition.

Sincerely,

Chris Guidroz

BEFORE THE

LOUISIANA PUBLIC SERVICE COMMISSION

SOUTH LOUISIANA ELECTRIC COOPERATIVE ASOCIATION	* * *	DOCKET NO. S-37394

* *

In re: Petition for Approval of Proposed Abandonment

GUIDROZ FAMILY INTERVENTION AND OBJECTION

This Intervention is submitted to object to the Petition filed by South Louisiana Electric Cooperative Association ("SLECA") on September 25, 2024 seeking authority to abandon certain electric facilities defined in said Petition as the Lake Lines.

1.

Intervenorss are parties in interest as defined in Rule 10 of the Rules of Louisiana Public Service Commission. Intervenors, Christopher Guidroz and his family, have been consumer members of SLECA and have consistently maintained and paid for electrical service at their property located on Bayou Decade in Terrebonne Parish, Section 34, T103S, R 1E (29 degrees 22" 15.5N; 90 degrees 55'02.2W) on long term lease LTLT-1856. Christopher Guidroz owns the camp. To ensure that the lease survives him, it is in the name of his wholly owned LLC, Action Charters. Mark Guidroz is also a party in interest since he attends to the utilities under SLECA Account 4153405902, meter 90406447.

Intervenorss are among the distinct class of 282 consumer members who will be directly affected by and injured by SLECA's request to abandon. Intervenorss and the other members of this limited class meet all prerequisites of Code of Civil Procedure art. 591.

Guidroz Family Camp

3.

Intervenor, Christopher Guidroz, is the oldest of eight siblings who, for the last four decades, have occupied and used the property served by SLECA on Bayou Decade. In addition to the eight siblings and their spouses, there are numerous children and grandchildren who have enjoyed the use of this property with continual electrical service. SLECA's unilateral decision to dismantle and then seek abandonment of this line not only causes economic damages, it violates public policy favoring continual service and will have a detrimental effect for generations to come. The camp is used by grandchildren who are tenth generation Louisianans maintaining a tradition which SLECA itself describes in its written correspondence as "the camp experience."

4.

Over the last 40 years the Guidroz Family has spent substantial funds improving this camp and securing leases for thirty-eight additional years, through 2062. Throughout this time, Intervenorss have relied upon the electrical power provided by SLECA and have been assured, through SLECA's course of dealings and express written promises, of continuing electrical service. SLECA's unilateral decision to dismantle the line and seek

to abandon it has already caused and will continue to cause significant economic losses to Intervenorss.

SLECA's Request to Abandon is Inconsistent with Established Public Policy on Rural Electrification

5.

Arguing that it is inconvenient to repair a line that has continually served consumers for six decades, SLECA asks this Commission to approve an abandonment which is inconsistent with long -and well-established public policy on rural electrification. Such an approval would create a dangerous precedent allowing any utility that determines that it is not economically convenient to serve a customer located far away from main distribution systems. Since the rural electrification initiatives of the 1930s, this has never been the public policy of this Nation or this state.

SLECA's Request is Not in Compliance with the Provisions of General Order R-30301

6.

While SLECA addresses various subparagraphs of General Order R-30301, it ignores the very basic policy underlying the Order as expressly stated by the Commission:

> The Commission further encourages each electric and natural gas utility to file petitions for abandonment only as a last resort and to identify to the extent possible affordable alternatives to affected customer.

As discussed below, SLECA has utterly failed to consider affordable alternatives. For instance, petitioning FEMA to support either microgrids or solar systems under existing FEMA policies could result in systems that would be affordable. Throughout its petition argues that a fortified system would cost $115,000,000 and that SLECA does not

have its ten percent share. Yet, SLECA has not demonstrated that it has considered an alternative such as solar systems.

7.

Intervenorss are not in the solar electricity business and have no economic interest in any such companies, yet they are advised that at most a fully functional solar system with substantial battery backup would cost in the range of $60,000 per camp, which, if FEMA would fund ninety percent, would only result in a $6,000 charge per camp which SLECA could recover over a period of time with deminimus monthly charges.

8.

General Order R-30301 Subsection B.8 which requires SLECA to expressly describe "the existence of alternative energy sources for the consumer and the estimated cost per customer to convert to each alternative energy source."

Hurricane Ida did not destroy the line, SLECA did

9.

Throughout its Petition, SLECA makes that boot-strap argument that there is no line to abandon because over the past three years SLECA has removed the line. It obliquely and frequently suggests that Hurricane Ida destroyed the line. This is not true. Hurricane Ida damaged the Lake Lines, SLECA entirely dismantled it. Intervenors have been informed that using traditional methods, the lines could have been repaired in under sixty days. Rather than repairing the Lake Lines as it has done repeatedly in the past, SLECA completely removed all of the poles, transformers, and infrastructure. SLECA cannot now be heard to argue that there is nothing to abandon when SLECA has unilaterally removed the line without authority.

SLECA's All or Nothing Proposal Leaves $100 Million of Federal Funding on the Table

10.

Over the past three years, SLECA has continuously represented to Intervenorss and other consumers on the Lake Lines that it was removing the infrastructure pursuant to an agreement with FEMA to replace the lines with a fortified system funded ninety percent by FEMA. Suddenly and without warning, after three years, SLECA has unilaterally decided to abandon the lines.

11.

Having concluded that it does not have the ability to fund ten percent of the cost of the replacement of the Lake Lines, SLECA leaves $100 million of FEMA federal funding unclaimed. SLECA nevertheless offers no creative solutions beyond wood or steel pole construction. As discussed hereinafter, there are other commercially viable, technical solutions to this problem that SLECA apparently have left unexplored.

The Proposed Abandonment Violates SLECA's Express and Implied Obligations to Intervenorss and Other Consumer Members on the Lake Lines

12.

Intervenors and other consumer members on the Lake Lines, have all entered into written customer agreements with SLECA, the express terms of which require SLECA to continue service. In addition, SLECA's course of dealings and repeated representations to Intervenors and other consumer members on the Lake Lines have created and implied contractual obligation to continue maintenance of the Lake Lines. SLECA's Petition is in violation of these express and implied contractual obligations.

Intervenorss and Other Consumer Members, Have Updated and Fortified Their Properties, but SLECA has Not Updated and Fortified the Line in Response to Changing Environmental Conditions

13.

Throughout its Petition, SLECA points out that the area served by the Lake Lines has undergone change over the last sixty years. SLECA has not responded to these changes and cannot now be heard to say that it's deferred action should permit it to completely abandon the Lake Lines. For example, after Hurricanes Katrina and Rita damaged the Guidroz Family camp, Intervenorss undertook, at significant expense, to bulkhead their property on all four sides, fill the land, and build an entirely new camp elevated sixteen feet and fortified with continuous steel rods running from pilings to roof structure and reinformed roof structure. By contrast, after each storm, SLECA simply continued with its technique of using wood poles without reinforcement to respond to changing environmental conditions.

SLECA's Letters Written Over the Last Three Years are Inconsistent with its Current Position

14.

On December 1, 2021, SLECA wrote that the lines will "be out of power for an extended period of time. This timeframe could last well into the next year if not longer." SLECA did not say that it would not restore the lines, and Intervenors and other consumer members continue to take temporary integration efforts fully expecting that the line would be restored.

15.

On July 13, 2022, SLECA sent a letter to Intervenors and other consumer members in which it stated that "we wanted to write to address any concern you have and to dispel

any rumors or hearsay about the future of the line." SLECA then made an express promise that it now seeks to ignore:

> **We want to go on record and reassure all camp owners and those who enjoy the "camp experience" that, as of this time, SLECA has ever intention of rebuilding these damaged Lake Lines.**

SLECA then went on to discuss other activities and concluded "but even with all of these ongoing activities, please know that we have not forgotten our camp owners, nor have we put this issue on the back burner."

16.

SLECA then wrote:

> **Please know that we are looking at all options for the rebuild, but we promise that the ultimate decision that is made will be for the betterment of SLECA's system and you, our camp owners.**

17.

Two years later on August 21, 2024, when SLECA sent Intervenorss a letter stating that it was going to abandon the lines, Intervenorss were shocked and sent a letter to SLECA with specific questions. Intervenors' letter of August 22, 2024 is attached as Exhibit 1. Intervenorss pointed out that on previous occasions, such as after Hurricane Andrew, SLECA imposed a special monthly assessment on each camp account to recover repair costs. It is Intervenorss' belief that this is why there are differential rates cited in SLECA's Petition. Yet, SLECA never considered the alternative, or even proposed to Intervenorss or other camp owners, that a differential cost adjustment be made so that SLECA could recover some of its costs of repair on a go-forward monthly basis.

18.

Intervenorss also asked SLECA what the cost of repairing the lines would have been had the lines not been hardened. SLECA did not provide any answer to this question and should provide such answer in discovery conducted pursuant to these proceedings.

If SLECA is Permitted to Abandon the Existing Lines, It Should Provide Alternative Sources of Power

19.

SLECA has not addressed two fundamental questions posed by Intervenors in their letter of August 22, 2024. The first unanswered question was:

> You write that the Board explored Steel Pile Construction and Wood Pole Construction transmission from the grid. Did SLECA consider any other forms of possible replacement power such as the implementation of a microgrid?

Intervenors attache Exhibit 2, information regarding microgrids and FEMA, which was obtained through a simple internet search. So far as Intervenors knows SLECA has made no efforts to seek FEMA funding for a microgrid or solar systems for the camp.

20.

SLECA has also not addressed another fundamental question posed in Intervenors' letter of August 22, 2024:

> Did SLECA explore with FEMA the possibility of operating distributed power systems at each camp using solar and battery power supplemented by a generator to be constructed and maintained by the utility which would sell metered power to each camp based on fuel and maintenance costs, plus amortization of capital costs not reimbursed by FEMA?

Intervenors respectfully suggests that SLECA should be ordered to explore the possibilities of operating microgrids or distributed power systems and report back directly to the Commission on these issues.

If SLECA is Permitted to Abandon the Lake Lines Intervenors and Other Consumer Members Will Suffer Significant Economic Damages

21.

In response to Intervenors' inquiry about compensation, SLECA's representatives have indicated there is no plan to compensate Intervenorss or other similarly situated consumer members. Anticipating such concerns, SLECA's Petition makes much of the fact that the consumer members have not had power for three years, and suggests that "a generator costs about $1,000." Both of these statements are without merit. First, SLECA cannot benefit from consumer members not having power for three years when SLECA decided to not repair the line and instead dismantle it.

22.

Second, SLECA is wrong about generator power. It is true that a small gasoline powered air cooled generator costs in the range of $1,000. What SLECA does not say is that these generators are good for perhaps a year to a year and a half. Intervenors are already on their second generator and our neighbors are on their third.

23.

SLECA makes a point of saying that average utility bills on the Lake Lines ran in the range of $50. What is doesn't say is that the cost of generator power averages between $350 and $400 per month. Simply put, the cost of powering Intervenors and other consumer members properties with generators is between seven to ten times more expensive per kilowatt hour than commercial utility power.

24.

In practical terms, SLECA's decision to dismantle the Lake Lines has imposed a cost on Intervenors and other consumer members in excess of previous utility bills. This excess costs averages $300 per month and will continue throughout the remaining term of the camp leases on the Lake Lines.

25.

SLECA's abandonment of the Lake Lines is in effect an expropriation of Intervenors' and similarly situated consumer members' property rights. The removal of the Lake Lines will cause significant diminution in the value of Intervenorss and other similarly situated consumer members' property.

Prayer for Relief

Considering the foregoing and after due proceedings had, Intervenors respectfully requests that this Commission:

1) Order SLECA to restore the Lake Lines as soon as possible;

2) Alternatively, if SLECA is not ordered to restore the Lake Lines as previously constructed, the Commission should order SLECA to develop alternative systems to serve the affected consumer members;

3) In the further alternative, if SLECA is not required to restore the Lake Lines or develop microgrids, this Commission should order SLECA to undertake the capital costs of constructing generator, battery, and solar systems at each affected property, and maintaining those systems and then charging the consumer members based on power usage;

4) In the final alternative, if all three of the above remedies are denied, SLECA should be ordered to pay Intervenors, and other consumer members, just compensation as determined by the Commission based on the costs of generating alternative power on a monthly basis multiplied by the number of months available to each consumer member on their remaining term of their leases.

Respectfully submitted,

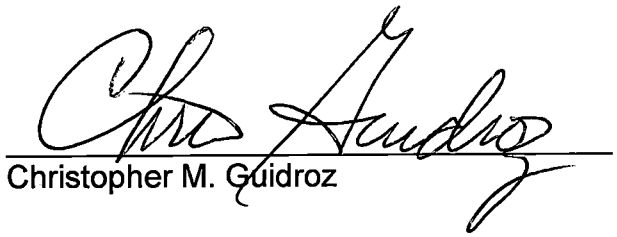
Christopher M. Guidroz
Mark D. Guidroz
Action Charters, LLC
By and Through Undersigned Counsel

Christopher M. Guidroz, Bar No. 06438
SIMON, PERAGINE, SMITH & REDFEARN, LLP
1100 Poydras Street
30th Floor – Energy Centre
New Orleans, Louisiana 70163
504-569-2030 Telephone
504-569-2999 Telecopier
chrisg@spsr-law.com

Attorney for Intervenorss

CERTIFICATE OF SERVICE

I HEREBY CERTIFY that a copy and foregoing has been forwarded to all known parties via U.S. Mail, postage prepaid and properly addressed, this 14th day of October, 2024.



Christopher M. Guidroz

Mark Guidroz
4583 Mill Creek St
Houma LA 70360

David Luke, Board President

South Louisiana Electric Cooperative Association

PO Box 1126

Amelia LA 70340

August 22, 2024

Dear Mr. Luke,

I am in receipt of your letter of August 21, 2024, stating that SLECA proposes to abandon the lines serving Lake Decade, Grand Pass, and the island at the end of Four Point Road.

Since 1984 my family has had a camp on Bayou Decade. Over these 40 years we have spent substantial funds improving our camp and securing leases for thirty-eight additional years, through 2062. Throughout this time, we have been grateful for, and relied upon, the electrical power provided by SLECA.

We restored our camp after Andrew and numerous other storms, and then totally reconstructed it after Hurricae Rita. We recently completed repairs of Hurricane Ida damage. We have always been assured, through SLECA'S course of dealings, and letters after each hurricane, that we can count on this power. Thus, your letter came as a shock.

While I understand that the Board concluded that replacement of existing lines would be too expensive, I have the following questions that would help my family formulate a path forward:

1. How many customers are on the lines which are to be abandoned?

2. I recall that on at least on one prior occasion, after Hurricane Andrew, SLECA imposed a special monthly assessment on each camp account to recover repair costs. While I understand that FEMA now requires that the lines be hardened, what was the actual capital expenditure by SLECA for its share of prior repairs when the lines did not have to be hardened?

EXHIBIT 1

3. If FEMA had not required that the lines be hardened after Ida, and still funded 90% of repairs for existing lines based on prior standards, what would have been SLECA's share of repair costs?

4. Who was SLECA's primary contact with FEMA in this process?

5. You write that the Board explored Steel Pile Construction and Wood Pole Construction transmission from the grid. Did SLECA consider any other forms of possible replacement power such as the implementation of a microgrid?

6. Did SLECA explore with FEMA the possibility of operating distributed power systems at each camp using solar and battery power supplemented by a generator to be constructed and maintained by the utility which would sell metered power to each camp based on fuel and maintenance costs, plus amortization of capital costs not reimbursed by FEMA?

7. Will you provide us with a copy of SLECA's Petition for abandonment when submitted to the Louisiana Public Service Commission?

8. If, despite opposition, SLECA receives permission from the Public Service Commission to abandon these lines, is SLECA contemplating any accommodation payments to the affected customers?

Thank you for your attention to these questions.

Sincerely,

Mark Guidroz

Account 4153405902

Meter 90406447

FEMA includes solar microgrids in net-zero disaster response program

By Billy Ludt | January 30, 2024

Expanding on the Biden-Harris Administration's investments in the nation's climate resilience, today Homeland Security Secretary Alejandro N. Mayorkas and FEMA Administrator Deanne Criswell announced that the agency will expand funding to tackle the climate crisis, improve resilience and cut energy costs through net-zero projects.

For the first time, FEMA will fund net-zero energy projects, including solar, through its Public Assistance grant program, which covers rebuilding schools, hospitals, fire stations and other community infrastructure investments post-disasters. FEMA is also funding net-zero energy projects for its Hazard Mitigation Grant Program (HMGP) and now offers incentives through its Building Resilient Infrastructure and Communities (BRIC) annual grant program to encourage more communities to use net-zero projects that increase community resilience.

"Whenever and wherever a community is impacted by a natural disaster, the Department of Homeland Security is there to help recover and build back stronger," Mayorkas said. "Now, that work will include incorporating smart, net-zero energy techniques and technology — like solar panels and heat pumps — into the rebuilding of critical infrastructure like hospitals and fire stations. The Biden-Harris Investing in America agenda is proof that we can both meet the safety, security and stability needs of local communities, and do so in a responsible, climate-conscious way that increases their resilience."

These activities are enabled by President Joe Biden's Inflation Reduction Act, the largest investment in clean energy and climate action in U.S. history.

Public Assistance, Hazard Mitigation Grant Program

FEMA's Public Assistance program provides supplemental grants so that state, tribal, territorial and local governments can develop hazard mitigation plans and rebuild in a way that reduces or mitigates future disaster losses in their communities. This grant funding is available after a presidentially declared disaster.

Net-zero infrastructure and buildings using renewable energy sources like solar power are more resilient and can retain electricity and safety in emergencies such as brown-outs, black-outs and extreme temperatures. Solar

EXHIBIT 2

For any federal disaster declared after Aug. 16, 2022, applicants may now use FEMA financial assistance for unobligated projects under these programs to participate through Public Assistance and Hazard Mitigation Grant Program funding. As of Jan. 30, more than 80 disasters have been declared across all 10 FEMA regions during this time.

Disasters are becoming more frequent and severe. Since 2019, the United States has experienced an average of 20.4 weather and climate disasters per year costing more than $1 billion each. This is an increase from an annual average of 3.3 such disasters in the 1980s. In 2023 alone, there were a record 28 confirmed weather and climate disaster events costing over $1 billion each in the United States.

"As the increase of extreme weather hazards become more severe due to climate change, we need to adapt the way we are helping communities rebuild post-disaster," Criswell said. "Thanks to President Biden's Investing in America agenda and the Inflation Reduction Act, FEMA will now cover the costs of net-zero energy projects since they are the single most effective measure FEMA can take to reduce greenhouse gas emissions and address the climate crisis."

The built environment contributes to nearly 40% of greenhouse gas emissions. In 2023 alone, FEMA spent over $10 billion on rebuilding and hazard mitigation construction, making the federal government the single largest purchaser of construction materials in the United States.

Acknowledging this, FEMA has joined 12 other federal agencies, making up 90% of federal procurement, in a Federal Buy Clean Initiative to tackle the climate crisis. In addition to reducing activities that fuel climate-induced hazards, FEMA funding net-zero projects can cut utility costs, increase energy reliability and reduce disaster-related costs for communities.

The BRIC program is a part of the Biden-Harris Administration's unprecedented investments in communities to support an equitable transition to a sustainable economy and healthier environment for all. The program also advances the President's Justice40 Initiative that set a goal to deliver 40% of the overall benefits of certain federal investments to disadvantaged communities that are marginalized by underinvestment and overburdened by pollution.

"After a disaster, communities don't just want to build back. They want infrastructure that will last and will serve them better in a future that promises more extreme weather events fueled by the climate crisis," said John Podesta, Senior Advisor to the President for Clean Energy Innovation and Implementation. "FEMA is doing just that thanks to President Biden's Inflation Reduction Act."

Any community interested in introducing low-carbon materials or implementing net-zero energy projects can work directly with their point of contact at their FEMA region or reach out at FEMA-IRA-Implementation@fema.dhs.gov

ABOUT THE AUTHOR

Billy Ludt

Billy Ludt is senior editor of Solar Power World and currently covers topics on mounting, installation and business issues.

Comments

Joyce Lee
January 31, 2024 at 11:56 am

If there needs to be carbon offset, would FEMA consider that as net zero as well? Do you recommend solar farms that sell credible carbon offset? We work with non profits. Thanks.

Reply

Tell Us What You Think!

Hazard Mitigation Assistance Grant Funding for Microgrid Projects

Release Date: Jun 25, 2021

Grants for microgrid projects are available through several FEMA Hazard Mitigation Assistance programs.

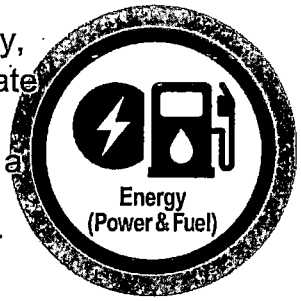
Definition of a Microgrid

A microgrid is a group of interconnected energy-consuming devices and equipment (e.g., homes, businesses, or industrial facilities) and distributed energy resources within clearly defined electrical boundaries that act as a single controllable entity with respect to the utility grid. These microgrids generally operate while connected to the utility grid but, thanks to control capabilities (smart controls), these microgrid systems can disconnect from the conventional utility grid and operate autonomously to meet anticipated or potential utility outages.

A microgrid typically consists of a smart distribution network limited to a well-defined boundary, a load management system, Distributed Energy Resources (DERs), and storage solutions. Distributed Energy Resources generate power in the form of solar panels, wind turbines, engine generators or other power generation source.

Microgrids Strengthen Community Lifelines and Mitigate Natural Hazard Risk

With the ability to disconnect and operate independently, microgrid systems can provide for grid resilience, mitigate disturbances caused by natural disasters and allow for faster system response and recovery. The presence of a storage system (e.g., battery), sized for the specific application—such as waiting out the transition of power during a utility outage (which could range from a few seconds or minutes to hours or even days)—can also reduce the loss of function of critical infrastructure.



Key Benefits of Microgrids

- Grid Stability – Microgrids can be used to stabilize a certain portion of the grid. If the local utility has a history of voltage and frequency regulation issues, a microgrid can stabilize the grid to a select load or group of loads. Stability can be provided by isolating the problematic loads or energy supplies creating the voltage and frequency instabilities.
- Islanding – Islanding happens when the microgrid isolates itself from the local utility and uses the on-site DERs to provide power to a series of loads. When operating as an island, the microgrid is not affected by outside forces that could affect the quality and availability of utility power.
- Demand Response – Ability to supplement the variability of renewable DERs is beneficial for a microgrid when paired with an energy storage system. For instance, if a cloud obstructs sunlight decreasing or preventing energy collection via solar panels, accompanied batteries can sense the increase of demand on the electrical system and supply supplementary power as needed.

Blue Lake Rancheria Tribe Microgrid Project in Humboldt Bay, CA

Microgrids are Eligible Projects for Mitigation Grants

FEMA has funded microgrids under the Hazard Mitigation Grant Program (HMGP) and is an eligible project for funding in the Building Resilient Infrastructure and Communities (BRIC) program. In order to be eligible, all Hazard Mitigation Assistance program requirements must be met, including Mitigation Planning, Technical Feasibility and Effectiveness, Cost-Effectiveness, and Environmental Planning and Historic Preservation (EHP) considerations. A short description of these program requirements are below:

- Project Scoping – Depending on the program, project scoping funding may be an appropriate first step towards developing a fundable subapplication for the implementation of a microgrid project.
- Mitigation Planning – Subapplicants must have a FEMA-approved Hazard Mitigation Plan that identifies the risks, vulnerabilities, and proposed mitigation strategies that will be fulfilled by the implementation of a microgrid project. Private nonprofit organizations are not subject to the same requirements as

subapplicants.

- Technical Feasibility and Effectiveness – A subapplication must demonstrate that the proposed microgrid is designed in accordance with relevant industry standards to accomplish the intended risk reduction. Examples include the Standard for Interconnection and Interoperability of Distributed Energy Resources with Associated Electric Power Systems Interfaces (IEEE 1547) and the Guide for Smart Grid Interoperability of Energy Technology and Information Technology Operation with the Electric Power System (IEEE 2030) , End-Use Applications, and Loads).
  - The subapplicant must illustrate that the project is either a stand-alone solution (incorporating new control capability, load management systems, DERs, or storage solutions into an already resilient grid) or a component of an overall solution (new solutions being implemented along with retrofit measures to make the distribution of power more resilient).
- Cost Effectiveness – Using FEMA's Benefit-Cost Analysis Toolkit, the subapplication must quantify the pre- mitigation loss of function as well as the reduced impact after mitigation. The loss of function could include an avoidance or reduction in downtime for first responders (police or fire departments) or for medical facilities following a disaster that would ordinarily result from a loss of power. The analysis could also consider the risk reduction of loss of electrical utility service for the population served by the microgrid.
  - Alternatively, under HMGP, subapplicants may consider the 5-Percent Initiative for microgrid projects (depending upon applicant priorities), which provides a set aside of HMGP funds for projects that are difficult to evaluate using FEMA-approved cost-benefit analysis methodologies.
- Environmental and Historic Preservation Considerations – Prior to awarding any microgrid project, reviews must be completed to ensure the project is compliant with various federal laws and presidential Executive Orders (EOs), such as the Clean Water Act, the Endangered Species Act, the National Historic Preservation Act, EO 11988 – Floodplain Management, and EO 11990 – Protection of Wetlands.

Additional Resources

The U.S. Department of Energy and FEMA maintain many web pages with additional information on microgrids, including:

- The Role of Microgrids in Helping to Advance the Nation's Energy System – This webpage includes numerous links to additional Department of Energy resources about microgrids.
- Mitigating Natural Hazard Risks in the Energy Sector: Innovative Projects that Help Build Resilient Communities
  - The two agencies hosted a webinar on mitigation projects in the summer of 2019.
- FEMA's Mitigation Action Portfolio – This resource is for potential applicants to learn about eligible project for the Building Resilient Infrastructure and Communities grant program. There are two case studies on microgrid installation in the portfolio.