

Re-Member-ing the Cooperative Way

Electric cooperatives have been the backbone of the nation's rural electrical system for more than 80 years. Their mission and business model now face more challenges than ever, from financial to contractual to basic member control. But the opportunity is equally great, with a chance for memberdriven investment to power hundreds of local economies across the rural United States.

John Farrell, Matt Grimley & Nick Stumo-Langer March 2016





Report: Re-Member-ing the Electric Cooperative

by John Farrell, Matt Grimley & Nick Stumo-Langer

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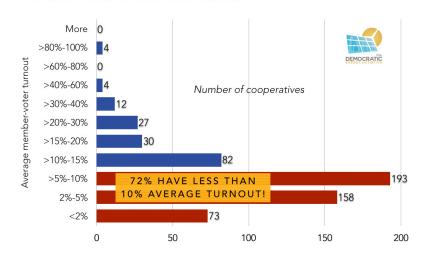
Executive Summary

Electric cooperatives face diverse challenges, from their power sources to member engagement. This report details those challenges and the tools that cooperatives are using to overcome them.

LOW TURNOUT FOR ELECTRIC

COOPERATIVE BOARDS

The Challenges



Tied to Coal Power

Coal accounts for about 75% of energy generated by electric cooperatives, compared to just 32% for the United States' entire electricity sector (U.S. Energy Information Administration, 2016).

Captured in Long-Term Contracts

Contracts with electricity suppliers extend for decades, sometimes past 2050, trapping locally-based electric cooperatives into increasingly expensive distant power plants and fossil fuel sources, while forbidding them from

buying outside energy.

Losing Member-Owners.

Electric cooperative members have a right to vote for their boards of directors. But 70% of cooperatives have less than a 10% voter turnout, increasing the disconnection between the cooperative and its members.

The Solutions

Fortunately, the solutions lie in the best of the cooperative movement.

Finding Ways Out of Coal Power

A new ruling from the U.S. Federal Energy Regulatory Commission may allow electric cooperatives to purchase local power outside their contractual obligations, providing a novel level of flexibility for most cooperatives.

Using Clean Energy and On-Bill Financing

Electric cooperatives are finding new ways to enable energy savings for member-owners. They're leaders in experimenting with community solar. A few are supporting the highest penetrations of rooftop solar in the nation. They're creating cost-effective on-bill financing programs that help members save energy and money.

And Empowering Member-Owners

The member-owners of Pedernales Electric Cooperative, Beartooth Electric Cooperative, Jackson Energy Cooperative, and many others have made their cooperatives more accessible, more dedicated to renewable energy and energy efficiency, and more democratic than ever.

Cooperatives may face their greatest challenge since the inception of rural electrification in the 1930s, but with their members, they have the power to overcome.

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Acknowledgements

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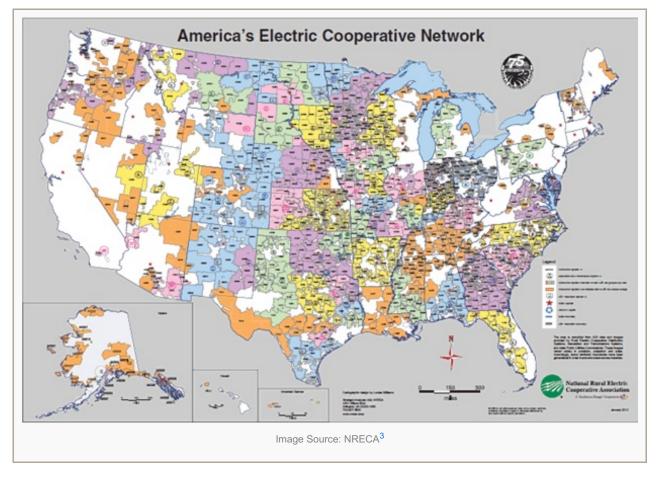
Contact John Farrell (jfarrell@ilsr.org) and Matt Grimley (mgrimley@ilsr.org) with questions.

Introduction

Decades after cities lit the first electric lamps in the 1880s, most of the rural places of America were still dark. Urban utilities didn't care for the expense of wiring farms, and it wasn't until communities organized that electricity expanded to rural areas. Farmers in southwest Idaho, for example, formed a nonprofit in 1920 to build 256 miles of power lines to transfer power from a federal hydroelectric dam.¹ In 1923, farmers near Granite Falls, Minn., made a cooperative to buy power from a nearby municipal utility. By 1930, there were 46 cooperatives in 13 states, but many still faced natural and economic obstacles, as well as opposition from investor-owned power companies.

In the 1930s, President Franklin Roosevelt launched numerous government program to combat the Great Depression and encourage economic growth. In 1935, he created the Rural Electrification Administration. The agency would provide long-term, 2% loans to nonprofit public entities to deliver affordable electricity across the nation. Within 6 years, there were 800 electric cooperatives in the United States, driven by member-owners that bought the same energy they produced collectively.²

Today, more than 900 electric cooperatives serve 42 million (mostly rural) Americans. These cooperatives cover 75% of the nation's land mass. They deliver 11% of U.S. electricity sales on a network containing 42% of its of its distribution lines.



Cooperatives have been the backbone of the nation's rural electrical system for more than 80 years. Their mission and business model now faces more challenges than ever, from financial to contractual to basic member control. But the opportunity is equally great, with a chance for member-driven investment to power hundreds of local economies across the rural United States.

The Challenges

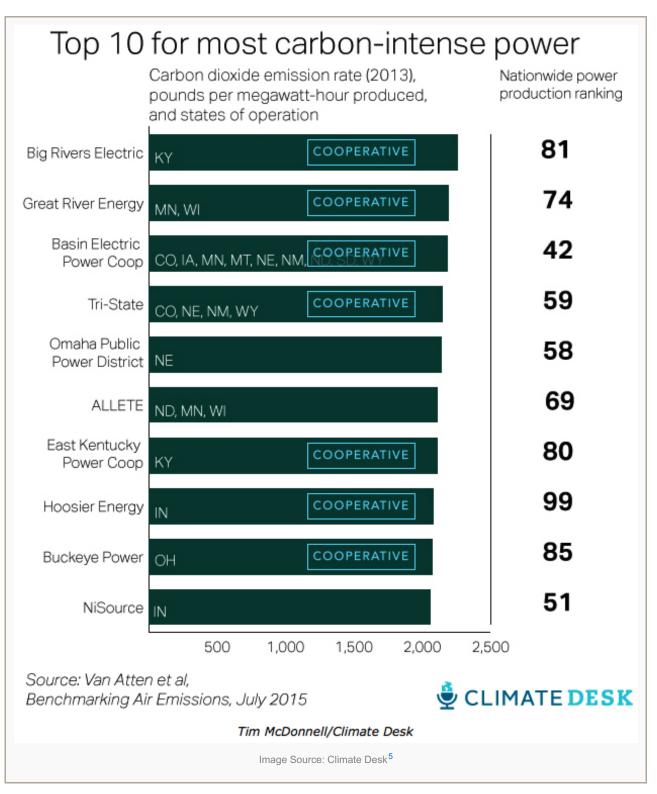
Electric cooperatives face diverse challenges. They rely heavily on coal power, with rising costs and risks as the nation eyes limits on carbon emissions. They are tied to this dirty and increasingly expensive power through ownership of coal assets (including power plants and mines) and by long-term purchase contracts, even as distributed solar, wind power, and energy storage are becoming more cost-effective. They serve 90% of the nation's counties with "persistent poverty."

Perhaps the largest barrier is the lack of member participation. As the National Rural Electric Cooperative Association (NRECA) wrote in its paper, "The Electric Cooperative Purpose," the electric cooperative is not defined by its products and services. Its "bottom line" is the empowerment of its member-owners. How it engages its membership to deal with the problems of the 21st century will define its success or failure. In many electric cooperatives, members do not even know they are owners, and fail to participate.

Coal-Powered, Under Fire

The "distribution" electric cooperatives that sell power to customers don't typically generate it themselves. They buy it, typically from generation and transmission cooperatives (G&T) that are owned by distribution cooperatives, or from federal power agencies, such as the Tennessee Valley Authority.

The generation and transmission cooperatives — the co-ops of co-ops — derive 75% of their energy from coal, and comprise 7 out of the 10 most carbon-intensive electric utilities in the nation (below, annotated by ILSR to denote G&T



The trends that precipitated the cooperatives' tie to coal include factors both in and out of their control.

As electric demand was expected to continue increasing almost exponentially in the 1960s and '70s, the drive toward economies of scale led the energy industry, mostly under the direction of investor-owned utilities, to construct larger and larger power plants. Many electric cooperatives banded together (in G&T cooperatives), and either sought to build their own large power plants, or were lobbied hard by the investor-owned utilities to buy a share of theirs, utilizing low interest financing through the Rural Electrification Administration to help fund the project.

Additionally, during the 1970s and '80s, under threat of oil and gas scarcity, the federal government sought to limit

natural-gas fired power plants and incentivize coal-fired power plants. Most utilities shifted their power plant builds to coal-fired or nuclear power plants. Today, as cooperatives and other utilities have continued to build and retrofit coal plants, about two-thirds of current cooperative generation remains from coal.

With looming carbon regulations, increasing consumer demand for rooftop solar and energy efficiency, and the competitive growth of cheap wholesale energy from wind, natural gas, and solar, G&Ts now face "stranded assets," or having to retire uneconomical coal plants and their upgrades before they are completely paid off. For example, Seminole Electric, which rounds out the top 30 of carbon-intense utilities, says that 75% of its debt comes from building and retrofitting a single coal-fired power plants.⁶ Closing the facility would leave member cooperatives "burdened with paying off the debt but with no revenues to support the payments."

In the face of economic challenges, NRECA and its electric cooperatives continue to fight against most federal and state rules that endorse clean energy or energy efficiency, or require a fair accounting of environmental and health costs from fossil-fueled generation.⁷ Some cooperatives still say climate change in quotes.⁸ In all, electric cooperatives engaged more than 1 million members to send in comments in opposition to the U.S. Environmental Protection Agency's proposed carbon rules.⁹ One cooperative in Ohio supported the effort by collecting 2,246 comments from its members, more than twice the members that usually turn out for yearly board elections.¹⁰

Distribution cooperatives and members are now burdened with decisions made by their boards and management decades ago. Members today are between a rock and a hard place: running a coal-fired power plant is increasingly expensive, or seeing rates rise if they decide to shutter the power plant. As NRECA says, it will ultimately be the distribution cooperatives that face the member-owners' ire, "and without proper management, the very existence of member-owned cooperatives could be in jeopardy."¹¹

A Contract Job

As mentioned previously, Electric cooperatives rarely supply their own power. According to NRECA, 65 to 70% comes from commitments secured through "all-requirements" contracts.

All-requirements contracts are used to protect the power supplier, G&T, or federal power agency from contract default. They restrict the electric cooperative from buying from outside sources. The G&T can set rates unilaterally, meaning that while electric cooperatives have a guarantee of power, it is not a guarantee of low cost power.

To say the balance works out in the supplier's favor is an understatement. Rating agency Standard and Poor's explains this in an evaluation of a Seminole Electric.¹² One of the utility's credit strengths is, "A captive retail market and the ability to set rates through take-and-pay, all-requirements wholesale power agreements with nine of 10 members through 2045."

In New Mexico, the Kit Carson Electric Cooperative signed a long-term contract with Tri-State Generation and Transmission Association (a G&T) in 2000, a decision many now regret.¹³ Power costs then were about 3.6 cents per kilowatt-hour. While wholesale power costs are now 4 cents per kilowatt-hour, Kit Carson's costs from Tri-State have risen to 8 cents per kilowatt-hour. Because Kit Carson's all-requirements contract to purchase 95% of their energy from Tri-State, they cannot seek cheaper energy without violating the terms of the contract.

Kit Carson sought to exit their contract in the last year. Tri-State initially said it would require a \$132 million exit fee from the cooperative, representing lost sales from Kit Carson's departure. After negotiation, Tri-State latered lowered the exit fee to \$37 million, and Kit Carson is deliberating how to move forward.

According to another NRECA publication, those electric cooperatives with all-requirements contracts "are generally prohibited from owning and using any utility-scale solar PV installation."¹⁴ Elsewhere, the contracts block distribution electric cooperatives from purchasing energy from other suppliers, even small ones. The Delta-Montrose Electric Association was recently stopped by Tri-State's 95% energy requirement from purchasing energy from a

local hydroelectric facility.¹⁵

The situation is rather ironic, since Tri-State — like most G&T cooperative utilities — is owned by its distribution cooperatives like Kit Carson. In the past era of ever-rising electric demand, massive economies of scale in power generation, and few power supply alternatives, the G&T was a way to make the many small cooperatives competitive. But now, with flat or falling electricity use, smaller economies of scale with renewable energy, and competitive local alternatives, the bonds of solidarity have become more like chains.

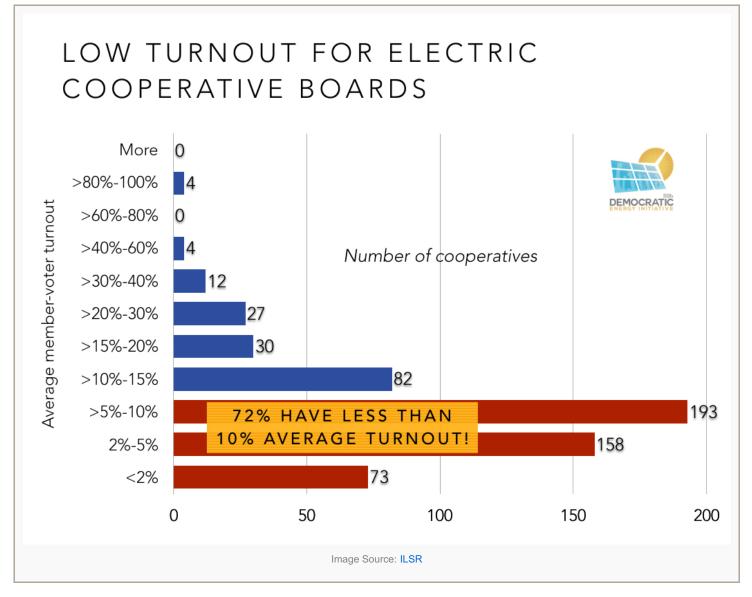
Missing Members

Randy Wilson ran for the board of the Jackson Energy Cooperative in 2009, the first candidate to contest an election in the cooperative's 71-year history.¹⁶ He ran on a platform of financing energy efficiency improvements on the electricity bill (known in energy policy circles as on-bill financing), and moving the local economy past its dependency on coal to alternative energy sources like solar.

He spoke on the local radio show, appeared on the front page of the newspaper, and talked with other memberowners in parking lots. But Wilson wasn't surprised that he lost the election 740 votes to 151.

Less than two percent of members turned out to vote, but many more votes were cast with the use of "proxy" votes. Mostly used at corporate shareholder meetings, proxy votes allow one member to delegate his or her voting ability to another member. In the case of Wilson and Jackson Energy, the electric cooperative had collected hundreds of proxy votes from its members, then handed them to other members present at the annual meeting, telling them to vote as they saw fit (meaning, for the incumbent).

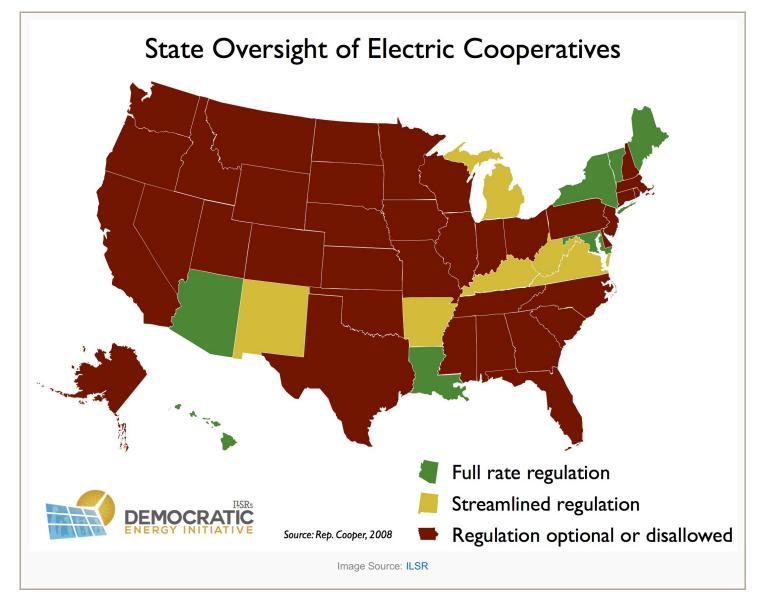
According to research from ILSR, Wilson's story of low voter turnout was not unique. More than 70 percent of cooperatives have voter turnouts of less than 10 percent (including Wilson's Jackson Energy Cooperative, which averages just under 3 percent turnout).



The low voter turnout at so many rural electric cooperatives is an indication of a member-owner apathy, disenfranchisement, and — in a few cases — outright abuse. Barriers around incumbency, burdened with difficult-to-access meetings, elections, and voting requirements, are often too much for members to overcome, even if they wanted to.

"Most electric co-ops are boys' clubs that re-elect the same people, that develop policies that favor their children or their buddies," says Tom "Smitty" Smith of the consumer rights advocacy nonprofit Public Citizen. Most states, Smitty adds, still believe in the myth of member-led rule and don't regulate electric cooperatives at all. Colorado passed legislation to democratize electric cooperative bylaws in 2010, but Texas's similar efforts fell short after intense lobbying from the cooperatives.¹⁷

The following map illustrates state electric cooperative regulation as of 2008.



Board members and electric cooperative employees are aging, representing another needs where membership can help fill in the gaps at the cooperative.¹⁸ According to Kauai Island Utility Cooperative board chair Jan TenBruggencate, "it would be convenient to believe that turnout is low because people believe we're doing a good job... Higher voter turnout gives directors indication of which platforms are resonating with those members. It can be used to provide strategic direction for the cooperative. An engaged membership will recognize threats to the cooperative, and help bring resources to bear to solve problems."

The Opportunities

Cooperatives across the nation are showing how to rely on each other and their members to create community-centric institutions that can overcome long-term reliance on dirty power sources and member disengagement.

Local Renewables Beat Dirty Power

With a recent ruling, the Federal Energy Regulatory Commission may have recently crashed one of the biggest gates to the cooperative clean energy party.¹⁹ For years, cooperatives have been hitched to wagon of large, coal-fired power generation through all-requirements contracts.

A few, like Delta-Montrose Electric Cooperative and other cooperatives went looking for local energy options. Unable to get resolution in direct negotiation, Delta-Montrose took Tri-State to the Federal Energy Regulatory Commission.

The request was relatively simple: tell Tri State that it's required to allow Delta Montrose to buy power from a proposed local hydroelectric power plant, even if it takes a bite out of their contract with Tri-State.

Although FERC didn't accept Delta-Montrose's rationale, they did accept their conclusion.

In requiring electric utilities to purchase renewable power from "qualifying facilities," FERC said that the 1978 federal PURPA law supersedes the cooperative's contract.^{20,21} Delta Montrose must purchase power from small renewable energy facilities in their service territory, and pay at least their own "avoided cost" of energy, e.g. the cost of the energy purchases avoided by the purchase from the qualified PURPA facility. This is a contested issue, with many utilities asserting that this is simply their wholesale cost to purchase a marginal kilowatt-hour of power. On the other hand, a FERC ruling in 2010 allowed that states could set avoided cost rates by technology, on the basis of the differing values of the renewable resources.²² FERC allowed that Delta Montrose could negotiate a power purchase rate.

The FERC ruling doesn't allow Delta Montrose to develop more of its own clean energy resources outside its contractual limits, nor does it change where they get the balance of their energy supply: from Tri-State.

FERC noted two potential exceptions to the ruling that did not apply to this particular case. Some distribution cooperatives have transferred their PURPA purchase obligation to their wholesale supplier. In that case the power generator would have to sell to the wholesale supplier (e.g. Tri-State). Some utilities have received a waiver from their purchase obligation under PURPA, but only if there's a competitive marketplace available for the generator to sell into other than the utility, an unlikely scenario for most cooperatives.²³

Tri-State is now requesting FERC that it be allowed to levy a fee on Delta-Montrose for any lost revenues from the cooperative purchasing outside its contract. If they succeed, it will <u>undermine the economics of buying local power</u> for Delta-Montrose.²⁴ However, FERC has opened the door for distribution cooperatives to purchase local power outside their contractual obligations, providing a novel level of flexibility.

Energy Savings at Home

Several cooperatives are adapting to the new era by bringing energy efficiency and renewable energy closer to home with the help of a federal program, and even a few cooperative ventures of their own.

The USDA's Rural Utility Service's Energy Efficiency & Conservation Loan Program allows rural utilities to borrow money at low rates – over 30 years at 3.3% – for energy efficiency and renewable energy improvements at their facilities or properties owned by customer-members it serves. The obligation to pay can be tied to the meter, allowing the energy savings and the financial obligation to pass from owner to owner of the property.

The bill-based financing can be particularly powerful at reaching disproportionately low-income cooperative members because the financing can be secured by the projected energy savings rather than a member asset (such as their home). It can also be provided without credit scoring that typically eliminates most low-income households from participation.

In 2014, the Rural Utility Service authorized as much as \$6 billion in loans in 2015. What could \$6 billion buy?²⁵

\$6 Billion for Rural Energy Efficiency would...

- Save \$32 billion in electricity costs for rural electric member-owners over 20 years
- Create 81,000 rural jobs installing energy efficiency improvements
- Provide enough power for 32 million homes for a year
- Cut carbon dioxide emissions by 223 million metric tons

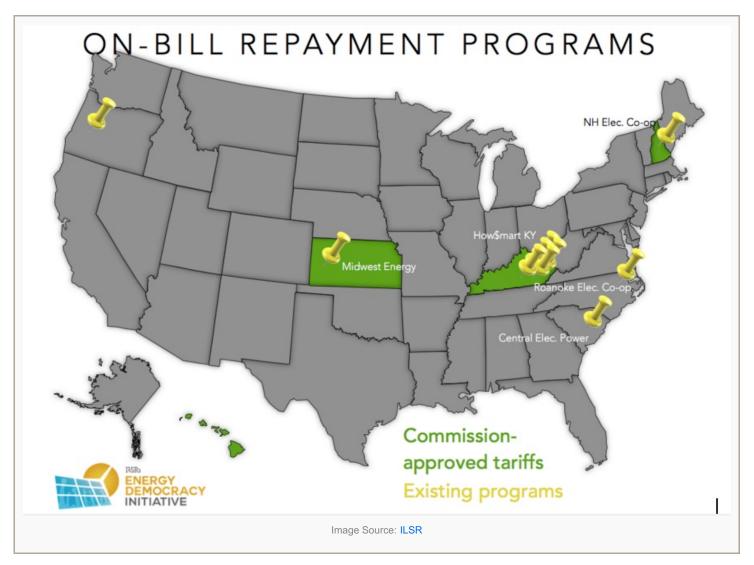
But it's not just for energy efficiency. What if \$6 billion was invested in renewable energy like solar power?

\$6 Billion for Rural Solar Energy would...

- Install 2,000 megawatts of solar power, 7 times more than is in the entire Midwest²⁶
- Save \$5.3 billion in electricity costs for rural electric member-owners over 20 years
- Create 14,000 rural jobs installing solar power
- Provide enough power for 265,000 homes for a year
- Cut carbon dioxide emissions by 1.8 million metric tons

The cooperatives can also make money offering this program. The USDA allows utilities to re-loan the money to individuals at up to 1.5% interest above their own borrowing rate of 3.3%. On loans of \$6 billion, rural electric utilities would have a margin of \$59 million per year re-loaning the money to their members.

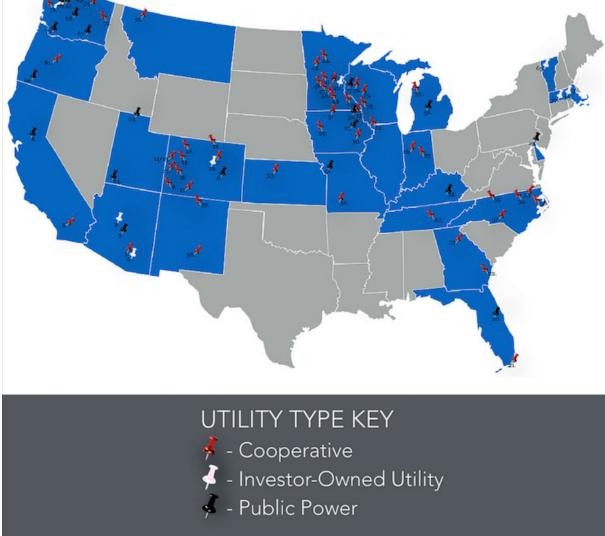
Roanoke Electric Cooperative has already proven that on-bill financing works well for its membership. Using \$6 million in financing from the U.S. Department of Agriculture, Roanoke Electric Cooperative's Upgrade to \$ave program enables members to benefit from debt-free, on-bill financing for home energy upgrades.²⁷ The program will assist 1,000 members-owners over five years, generating savings for all participants and saving the cooperative more than \$2 million through reduced energy demand. Households participating in Kentucky's How\$martKY program have lowered their annual energy use by average of 5,500 kWh, a savings of 30%, or \$624 a year.²⁸ Other cooperatives with on-bill financing programs report similar savings.



Electric cooperatives are also experimenting with community solar projects.²⁹ The total is small — just 92 megawatts 11/19

(MW), equivalent to only 0.18% of their overall power generation — but cooperatively-owned utilities are much more likely to experiment with collectively-owned generation than their municipal and for-profit peers. Below is a map identifying the 78 community solar projects throughout the country separated by ownership structure. The lion's share is owned by electric cooperatives.





Here's a list of the electric cooperatives presented above.

1	Trico Electric Cooperative - Marana, AZ		40	McLeod Cooperative - Glencoe, MN					
2	UniSource Energy Services - Prescott, AZ		41	Stearns Electric Association - Melrose, MN					
3	Salt River Project - Tempe, AZ		41	Xcel Energy MN - Minneapolis, MN					
4	Tucson Electric Power - Tucson, AZ		42	Steele-Waseca Cooperative Electric - Owatonna, MN					
5			44						
	Anza Electric Cooperative - Anza, CA			Itasca-Mantrap Cooperative Electric - Park Rapids, MN					
6	Sacramento Municipal Utility District - Sacramento, CA		45	Lake Region Electric Cooperative - Pelican Rapids, MN					
7	United Power, Inc Brighton, CO		46	Connexus Energy - Ramsey, MN					
8	Colorado Springs Utilities - Colorado Springs, CO		47	Wright-Hennepin Electric Cooperative - Rockford, MN					
9	Empire Electric Association - Cortez, CO		48	Tri-County Electric Cooperative - Rushford, MN					
10	Xcel Energy CO - Denver, CO		49	Kandiyohi Power Cooperative - Spicer, MN					
11	La Plata Electric Association - Durango, CO		50	Platte-Clay Electric Cooperative - Kearney, MO					
12	Poudre Valley Rural Energy Association - Fort Collins, CO		51	City Utilities of Springfield - Springfield, MO					
13	Holy Cross Energy - Glenwood Springs, CO		52	Flathead Electric Co-Op - Evergreen, MT					
14	Grand Valley Power - Grand Junction, CO		53	Roanoke Electric Cooperative - Ashoskie, NC					
15	Grand Valley Power GRID Alternative - Grand Junction, CO		54	Roanoke Electric Cooperative - Aulander, NC					
16	Delta-Montrose Electric Association - Montrose, CO		55	Surry-Yadkin Electric Membership Corp Dobson, NC					
17	San Miguel Power Association - Nucla, CO		56	Tideland Electric Membership Corporation - Pantego, NC					
18	Yampa Valley Electric Association - Steamboat Springs, CO		57	Pee Dee Electric Membership Corporation - Wadesboro, NC					
19	Newark Electric Department - Newark, DE		58	Otero County Electric Cooperative - Cloudcroft, NM					
20	Orlando Public Utilities Commission - Orlando, FL		59	Kit Carson Electric Cooperative - Taos, NM					
21	Florida Keys Electric Cooperative - Tavernier, FL		60	City of Ashland Municipal Utilities - Ashland, OR					
22	Coastal Electric Membership Corporation - Midway, GA		61	Central Electric Cooperative - Bend, OR					
23	Walton EMC - Monroe, GA		62	Duck River Electric Membership Corp Shelbyville, TN					
24	Jo-Carroll Energy - Elizabeth, IL		63	Logan Light and Power - Logan, UT					
25	NineStar Connect - Greenfield, IN		64	St. George Energy and Dixie Escalante Rural - St. George, UT					
26	Topmost REMC - Lindin, IN		65	Green Mountain Power - Colchester, VT					
27	Cedar Falls Utilities - Cedar Falls, IA		66	Puget Sound Energy - Bellevue, WA					
28	Hawkeyes Rural Electric Cooperative - Cresco, IA		67	Benton Public Utilities District - Benton, WA					
29	Western Iowa Power Cooperative - Denison, IA		68	City of Ellensburg Municipal Utilities - Ellensburg, WA					
30	Farmers Electric Cooperative - Kalona, IA		69	Okanogan County Public Utility District - Okanogan, WA					
31	Heartland Power Cooperative - Thompson, IA		70	Seattle City Light - Seattle, WA					
32	Traer Municipal Utilities - Traer, IA		71	Mason County Public Utility District #3 - Shelton, WA					
33	Midwest Energy - Hays, KS		72	Inland Power & Light Company - Spokane, WA					
34	Berea Municipal Utilities - Berea, KY		73	Clark Public Utilities - Vancouver, WA					
35	NRG Energy - Franklin, MA		74	Okanogan County Electric Cooperative - Winthrop, WA					
36	Western Massachusetts Electric Company - Springfield, MA		75	Eau Claire Energy Co-Op - Eau Claire, WI					
37	National Grid/NSTAR - Waltham, MA		76	St. Croix Electric Cooperative - Hammond, WI					
38	Cherryland Electric Cooperative - Grawn, MI		77	River Falls Municipal Utility - River Falls, WI					
39	Homeworks Tri-County Electric Cooperative - Portland, MI		78	Vernon Electric Cooperative - Westby, WI					
	ENERGY INITIATIVE								

Some cooperatives have also added local renewable generation through their wholesale cooperative generation and transmission provider.³⁰ Great River Energy in Minnesota added a 5 percent self-supply allowance to their members' all-requirements contracts, anticipating the addition of resources such as community solar gardens. Great River then provided its members with solar, by building and financing up to twenty 20-kilowatt solar arrays in its members' area. The projects are funded through a lease with CoBank. Each co-op is obligated to pay the G&T for the lease costs and for a buyout at the end of 10 years.

For many cooperatives, the ability to add community solar will be the first generation resource that qualifies under the 5 percent option. G&Ts in Wisconsin, Florida, and Michigan have tried other G&T-financed models for local solar development.

Other electric cooperatives utilize creative ownership structures to work around contract obligations, such as three cooperatives in Minnesota that actually sell solar energy back to their G&T.³¹ The cooperative leaders in renewable energy development often work without all-requirements contracts, relying on a mixture of partial-requirement contracts, wholesale market purchases, and energy project ownership instead. Farmer's Electric Cooperative, which purchases half of its energy from the wholesale market, uses a homegrown feed-in tariff, community solar, and a green power purchasing program that have encouraged one-fifth of its membership to participate in renewable energy projects.³² The Kauai Island Utility Cooperative in Hawai'i now receives close to 40 percent of its energy from utility-owned and member-owned renewable resources while stabilizing sky-high electric rates.³³ The Southern Maryland Electric Cooperative has built 5.5 megawatts of solar, and is proceeding on another 10 megawatt project, to go along with close to 1,000 of its members either owning or waiting to install some form of distributed generation. The New Hampshire Electric Cooperative, hitting their net metering cap that would limit rooftop solar, determined it was in their

members' best interest to permanently lift the cap. They lowered the compensation rate by 25 percent for residential customers (although they increased it for commercial customers) and will allow more rooftop solar development.³⁴

Restoring Democracy

At Jackson Energy Cooperative, Randy Wilson's landslide loss wasn't for naught. Proxy votes were outlawed shortly after the election in 2009.³⁵ On-bill financing was instituted at the cooperative in 2010 as part of a pilot program with the Mountain Association for Community Economic Development. In 2013, an incumbent board member was defeated by a newcomer.

Other cooperatives have also reformed their ways through member-focused efforts. The Pedernales Electric Cooperative survived a scandal, and emerged with reform candidates on its board of directors. A member bill of rights was passed, opening up the elections, nominations, and giving members full access to records and meetings for the first time. The new board members formalized goals for 30 percent renewable energy in power capacity by 2020 and new energy efficiency savings.³⁶

In 2010, community advocates of the Beartooth Electric Cooperative in Montana proposed bylaw revisions after bad management decisions over the coal-fired Highwood Generation Station were exposed.³⁷ As the Highwood deal failed, Beartooth's G&T cooperative went bankrupt. Beartooth successfully exited the G&T as a result of the settlement, and just last year saw their first rate decrease in a decade. According to the Northern Plains Resource Council, Beartooth is now one of the most transparent and member-responsive cooperatives in the state.

Cooperative members across the nation are demanding change and organizing. Groups such as Kentuckians for the Commonwealth have suggested a cooperative members' bill of rights.³⁸ Georgia Watch, a consumer protection advocacy group, even made a helpful study and checklist to determine if an electric cooperative is truly democratic.³⁹ The Northern Plains Resource Council has made a chart for member-owners to easily see how their electric cooperative is performing (below).

	YES HOW IS YOUR CO-OP DOING?												
	BYLAWS Online	BOARD Meeting Minutes Online	BOARD Voting By Mail	annual Meeting Date Online	net Metering Policy Online	ALLOWS Net Metering >10 kw	Member Choice for Net Metering True-up Date	AGGREGATE Net Metering	opportunity For Community Solar	on-Bill Financing For Energy Efficiency			
BEARTOOTH Electric													
BIG HORN Electric													
FERGUS Electric													
FLATHEAD Electric													
MCCONE Electric													
MISSOULA Electric													
PARK Electric													
ravalli Electric													
SOUTHEAST Electric													
SUN RIVER Electric													
TONGUE RIVER Electric													
YELLOWSTONE VALLEY ELECTRIC													
	Source: Northern Plains Resource Council												

A Cooperative Future

Electric cooperatives stand at the crossroads.

The heavy reliance on outsourcing their local authority has resulted in economic strains, tension between the local and generation and transmission cooperatives, and member disillusionment. At its worst, it has placed cooperatives in a nearly untenable net of long-term obligations for dirty and increasingly expensive power or in a scandal of abused member trust.

Fortunately, the solution lies in the best of the cooperative movement. Delta-Montrose and other distribution cooperatives are re-taking some of their local authority to emphasize clean and affordable local power generation. Roanoke and other cooperatives are providing low-cost financing to help members reduce energy costs and make the grid more efficient. Beartooth is modeling transparency and member engagement toward more effective stewardship of cooperative resources.

Cooperatives may face their greatest challenge since the inception of rural electrification in the 1930s, but with their members, they have the power to overcome.

Recent ILSR Publications:

Mighty Microgrids by Matt Grimley and John Farrell, February 2016 Independent Business Report by Stacy Mitchell and Olivia Lavecchia, February 2016 SandyNet Goes Gig: A Model for Anytown, USA by Chris Mitchell, November 2015 Building Local Equity: ILSR'S Impact in 2015 by Jen Foy and Stacy Mitchell, November 2015 Hawai'i at the Energy Crossroads by Matt Grimley and John Farrell, July 2015 Comcast's Big Gig Rip-Off by Hannah Trostle and Chris Mitchell, July 2015 Public Rooftop Revolution by John Farrell and Matt Grimley, June 2015 Beyond Utility 2.0 to Energy Democracy by John Farrell, December 2014 Walmart's Dirt Energy Secret by Stacy Mitchell and Walter Wuthmann, November 2014 Correcting Community Fiber Fallacies by Chris Mitchell, October 2014 Walton Family Undermining Rooftop Solar by Stacy Mitchell, October 2014

Footnotes:

- 1. Doyle, Jack. *Lines Across the Land*. Environmental Policy Institute: Washington D.C. 1979.
- Leitman, Michael; Olivier, Dave; Schloss, Zach and Tucker, Russell. "Affordable Electricity and Economic Development: The Role of Electric Cooperatives in the 21st Century." *National Rural Electric Cooperative Association*. 2014. (Accessed March 21, 2016). http://www.nreca.coop/wpcontent/uploads/2014/09/Final_NRECA_Affordable_Electricity_White_Paper.pdf.
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