



ACEEE
American Council for an Energy-Efficient Economy

2017
ANNUAL REPORT



Steven Nadel, executive director, and Penni McLean-Conner, board president

Message from ACEEE Leadership

We see energy efficiency as the heart of a clean energy future. This vision guided our 2017 efforts to advance efficiency and make it affordable for everyone. We put a face on efficiency by telling stories of how it improves people's lives—with jobs, lower energy bills, cleaner air, improved health, community resilience, and climate change mitigation.

The year was filled with firsts. We released our first utility scorecard and began new work—including our first video series—at the nexus of energy, health, and the environment. We also helped launch the first voluntary labeling program for pumps and other industrial products.

Our work had clear impacts. We advanced efficiency policies and programs in states from Maryland to Arizona. We sparked grassroots action in Memphis to reduce the energy burden of low-income residents. Abroad, we helped India organize its first national conference on energy efficiency and its first state scorecard.

We are pleased to share the highlights of our 2017 work: research and analysis on strategies to promote efficiency, technical assistance to more than 25 states and 20 cities, and peer-to-peer utility working groups with more than 80 participating utilities. We remain the top convener in energy efficiency and a leader in the field.

This year we noted the passing and hailed the lasting contributions of two giants in our energy efficiency community: physicists Art Rosenfeld and Marc Ross, both ACEEE founders.

We appreciate your support as we embrace the challenges and opportunities of building a clean energy future for all.

BOARD OF DIRECTORS

As of December 2017

Leadership

- Carl Blumstein, *Chairman*
California Institute for Energy and Environment
- Penni McLean-Conner, *President*
Eversource Energy
- Alison Silverstein, *Secretary*
Independent Consultant
- Timothy M. Stout, *Treasurer*
E Source

Board Members

- Janice Berman
Pacific Gas and Electric Company
- Scott Bernstein
Center for Neighborhood Technology
- Denise Fairchild
Emerald Cities Collaborative
- Mandy Mahoney
Southeast Energy Efficiency Alliance
- Monica Martinez
Ruben Strategy Group
- Steve Morgan
Clean Energy Solutions, Inc.
- Francis J. Murray, Jr.
New York State Energy Research and Development Authority (formerly)
- Clay Nesler
Johnson Controls
- David Parekh
United Technologies Research Center
- Dan W. Reicher
Stanford University
- Gene Rodrigues
ICF International
- Michael Sachse
New Enterprise Associates
- Mitchell Simpson
Arkansas Energy Office
- Susan Stratton
Northwest Energy Efficiency Alliance
- Jud W. Virden, Jr.
Pacific Northwest National Laboratory
- Stephen Wiel
Collaborative Labeling and Appliance Standards Program
- Kathrin Winkler
Independent Consultant



Clockwise from top-left: Therese Langer, Transportation Program director, discusses light-duty fuel economy in an ACEEE video; Brendon Baatz, Utilities Program manager, speaks at a press conference for Maryland's EmPOWER program (Photo: Campfire Communications); Dave Ribeiro, senior researcher, Local Policy Program, on a panel discussing resilience with Maryke van Staden of ICLEI (Photo: ICLEI).



Countered federal threats

Faced with deep federal funding cuts, ACEEE successfully made the economic case for energy efficiency programs through fact sheets and outreach on Capitol Hill. Congress ultimately increased 2018 funding for most of these programs. We also helped prevent rollbacks of Obama administration progress by building support for ENERGY STAR® and appliance efficiency standards.

Defended vehicle fuel economy standards

As the new administration moved to roll back standards for cars and light trucks, ACEEE defended them, highlighting their multiple benefits. We calculated that the standards would save the owner of an average 2025 car more than \$1,000 over the vehicle's lifetime at the same time as it reduced emissions of greenhouse gases and other pollutants. We helped defend the fuel efficiency rule for heavy trucks, testifying before regulators and providing analysis for advocates.

Advanced state and local efforts

We expanded our *2017 State Energy Efficiency Scorecard* to spur healthy competition among states' efficiency efforts. For the first time, we measured how states reach underserved low-income communities. We gave states data and technical assistance to defend and improve their policies and programs. For example, our research showed that Maryland's EmPOWER program, squarely in the governor's crosshairs, would save customers \$4 billion on their utility bills and create an estimated 68,000 new jobs. The governor dropped his opposition. "ACEEE's analysis crushed any possible reason for opposing the program's extension," said Brian Toll of the Maryland Building Performance Association.

Our *2017 City Energy Efficiency Scorecard*, efficiency self-scoring tool, and technical assistance helped cities understand how they could improve their efforts. "Thank you to ACEEE for continuing to push cities around America to lead on sustainability and in the fight against climate change," said Phoenix Mayor Greg Stanton.



Left: Taylor Fearington, business development manager: "My main job is to help ... design, build, and ultimately sell a more efficient home." Right: Tiffany Perrin, weatherization technician: "I got into weatherization because I wanted to see more of the benefits of sealing a home.... It helps make me a better carpenter." (Photos: Daniel M.N. Turner)

Tackled energy burden of low-income households

To help make energy affordable for everyone, we assessed 70-plus utilities' low-income efficiency programs, finding that those in the Southeast generally receive less funding per residential customer than programs in other parts of the country. We worked to attract investments that could address this inequity by expanding our low-income and multifamily utility working groups to more than 80 utilities, providing a forum for peers to share successful approaches. This work built on our groundbreaking 2016 research, which found that, on average, low-income households spend three times more of their income on energy bills than other households. That research had a strong impact in Memphis, as described by the headline of a Natural Resources Defense Council blog post: "When a Study Singled Out Memphis' Unfairly High Power Bills, Grassroots Groups Took Action."

Launched health and environment program

ACEEE launched a new program to document the sizable health and environmental benefits of saving energy, including a reduced incidence of childhood asthma attacks. We built ties to public health groups, began groundbreaking research, and developed a directory of 78 programs that improve both efficiency and health in buildings. We also produced a three-part video series that tells the stories of

families whose health improved after their homes had efficiency upgrades.



Ronald Denson, Jr., public health analyst, discusses programs that save energy and benefit participants' health at the 2017 National Conference on Energy Efficiency as a Resource.

Spotlighted efficiency jobs

Energy efficiency has a great story when it comes to jobs, a top priority for any policymaker. New data show that efficiency supports at least 2.25 million jobs—more than the solar, wind, nuclear, and coal industries combined. We touted these data in blog posts and in our multimedia project, People Who Save Energy, featuring interviews with workers and their customers. We also conducted jobs analyses for cities and states, helping them make the case for efficiency investments.



Left: Nikia Pickett, Baltimore mom of son with asthma: "After weatherization, I can definitely say I noticed a change. No more drafts coming in and out of the house or exposure to the outside elements that trigger his asthma. Those things significantly decreased his asthma attacks." Right: Brenda Kelsor, West Virginia homeowner: "After they insulated [my house], my light bill has gone down dramatically." (Photos: Daniel M.N. Turner)

Identified smart building technologies

Buildings hold enormous potential to save energy. To help realize that potential, we explored smart technologies and found they can reduce a building's energy use by about a fifth while simultaneously increasing worker productivity. We provided technical analysis and worked with stakeholders to promote another promising option: ultra-low energy buildings for new construction and retrofits. We also helped draft building code provisions, pushed for more aggressive standards with net-zero energy requirements, and convened an industry and government working group to improve the efficiency testing of next-generation heating and cooling systems.

Developed industry labeling

Many consumers recognize the blue ENERGY STAR and yellow EnergyGuide labels, both identifying energy-saving products. ACEEE had previously helped expand and update these labels, and to build on that success, we helped launch a voluntary label for commercial and industrial pumps. Our Extended Motor Product Label Initiative brought together the US Department of Energy, trade organizations, and nongovernmental organizations. The Hydraulic Institute then created the Pump Energy Rating label and testing program. We estimate such labeling will save businesses tens of millions of dollars each year

in electricity costs. Up next: new labels for fans and air compressors.

Expanded utility work with first scorecard

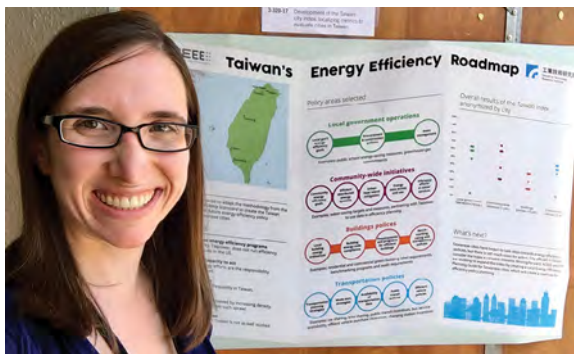
We evaluated the 51 largest US electric utilities in order to boost efficiency's role in the rapidly changing utility industry. Our first-ever utility scorecard found striking regional differences, identified the best and worst performers, and highlighted cutting-edge programs and utility business models. The rankings drew tremendous interest among utility leaders and others. The scorecard had more downloads than any of our other 2017 reports, and a Massachusetts utility cited the findings during its annual meeting for senior leaders.

Explored behavioral approaches

Why do people invest in making their homes more efficient? It's not just about money. Our research found that people have a number of reasons for making these investments, including comfort and health. That finding helped us identify the best ways to talk about home upgrades. Using similar behavioral insights, we worked with a large health care provider in the Southeast to engage employees in saving energy. We explored related topics at our Behavior, Energy, and Climate Change Conference, co-convened with Stanford University and the University of California, Berkeley.



Attendees network between sessions at the 2017 National Conference on Energy Efficiency as a Resource in Litchfield Park, Arizona. (Photo: Harley Bonham Photography)



Ariel Dreihobl, senior local policy research analyst, presents findings from research on Taiwan cities at a conference hosted by ACEEE's European counterpart, ECEEE.

Expanded international work

ACEEE expanded its work abroad to scale up energy savings. We helped India's Alliance for an Energy-Efficient Economy prepare its first national conference and develop a state scorecard and a vehicle-rating project. We worked with cities in Taiwan and Canada to advance their efficiency efforts. We continued to be involved in the start-up of the China Council for an Energy-Efficient Economy, and we worked with the Oman Authority of Electricity Regulation to collect energy data that will inform new efficiency policies and programs.

Convened dynamic mix of events

We helped educate energy efficiency professionals and engage new stakeholders by holding conferences that drew nearly 2,000 attendees. Our

six events explored human behavior, financing, water heating, industry trends, market transformation, and efficiency as a utility resource. In memory of Linda Latham (who helped found ENERGY STAR), we provided scholarships so that promising future leaders could attend.

Built public awareness

To broaden our reach, we added content to our popular, consumer-focused SmarterHouse website, including a video for homeowners on how to save energy. We launched the Shrink Your Dorm Print multimedia campaign for college students, promoted by dozens of universities and featured in *USA TODAY*. We began a video initiative and produced two dozen videos to enliven the energy efficiency story. We boosted social media promotion of our work, which was cited in at least 1,700 articles in national and local media, including the *The New York Times*, *The Washington Post*, *Forbes*, *Fortune*, and *CNN Money*.

Led national efforts

Continuing to take a leadership role among efficiency advocates, we hosted a federal strategy group and the Energy Efficiency Communications Network (EECN), comprising two dozen groups from across the country. With EECN partners, we planned the second annual Energy Efficiency Day in October, garnering official proclamations from the US Senate, five states, and two dozen cities and counties.



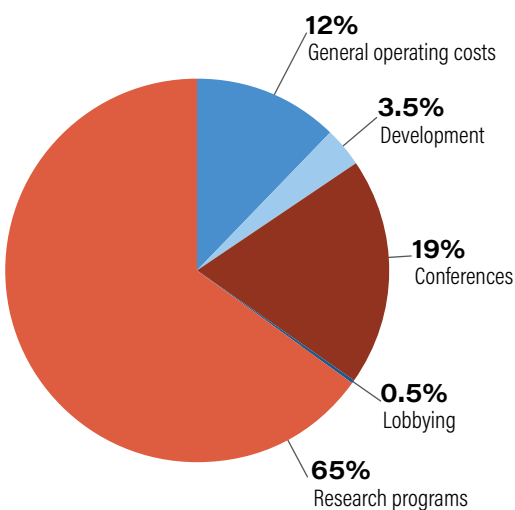
ACEEE staff volunteers make Thanksgiving meals at a Washington, DC, charity.

ACEEE financial overview

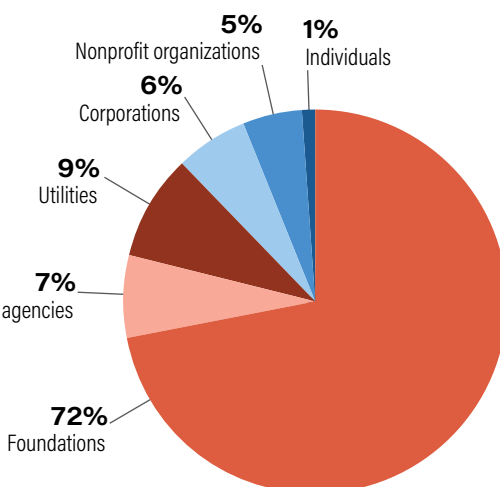
In 2017, ACEEE's unrestricted revenues totaled \$9.6 million, including contributions from foundations, public agencies, utilities, corporations, nonprofit organizations, and individuals.

Total unrestricted operating expenses for the year were \$9.4 million. Expenditures for research programs and conferences accounted for 84% of these expenses. Development costs and lobbying costs were 3.5% and 0.5%, respectively, with the remaining 12% attributable to general operating costs. Total unrestricted reserves were \$4.7 million, which is equivalent to about six months of expenses.

Expenses



Revenue



Learn more about ACEEE supporters: <http://aceee.org/about/aceee-finances>



Rev. Jemonde Taylor, rector, St. Ambrose Episcopal Church: "Energy efficiency is important to me and the congregation, because we can see how our energy use has gone down.... The congregation will be able to save money and live with a clean and clear conscience that we are doing something positive." (Photo: Daniel M.N. Turner)

"Through research and outreach, ACEEE plays a leading and critical role in the energy efficiency community."

— John Godfrey, Samsung Electronics America

"Please keep your research reports coming. I've found myself searching for ACEEE research on various issues."

— Commissioner Abigail Anthony, Rhode Island Public Utilities Commission

"ACEEE's analysis crushed any possible reason for opposing the program's extension."

— Brian Toll, Maryland Building Performance Association

"Thank you to ACEEE for continuing to push cities around America to lead on sustainability and in the fight against climate change."

— Phoenix Mayor Greg Stanton

"I worked with ACEEE before. They're a nonprofit that does really great energy work across the country."

— New Orleans City Councilmember Susan Guidry

"I find the Hot Water Forum to be a fantastic venue for everything to do with water heating."

— David Villarroel, Natural Resources Canada

ACEEE
American Council for an Energy-Efficient Economy