### **Co-op News**

### CECA

# There Is a Cooperative Difference



#### MESSAGE FROM GENERAL MANAGER ALAN LESLEY

**ALL ELECTRIC UTILITIES OFFER THE SAME PRODUCT**—but where it comes from makes a difference.

In the United States, most people receive their electricity from one of three types of utilities: 1) investor-owned, 2) municipally owned or 3) cooperative, which is owned and controlled by the people who use it. Let's take a closer look at these three types of ownership models and see why the difference matters to you.

In the investor-owned model, the corporation is owned by stockholders who may or may not be actual customers of the utility, and may or may not live in the area where the utility operates. Investor-owned utilities tend to be large corporations such as TXU Energy or NRG. They serve large cities, suburban areas and some rural areas, too.

In most cases, investor-owned utilities, or IOUs, have few employees interacting in the communities where they operate. Combined with outside investors, whose sole motive is to make a profit on their investment, this lack of community representation generally tends to lead to less personalized service. Consumer surveys confirm that IOUs have the lowest customer satisfaction ratings of all types of utilities. Nevertheless, about 72 percent of the U.S. population is served by investor-owned utilities.

Municipal electric systems, as the name implies, are government-owned. They can serve large cities such as San Antonio or Austin, or smaller areas such as Brownfield, Fredericksburg or College Station. In a municipal system, a city runs the utility with little direct oversight from the citizens who receive its power. About 16 percent of the market is served by municipal utilities.

Rural electric cooperatives serve the smallest number of consumers, about 12 percent of the national market, which equals 42 million people. In 47 states, there are more than 800 electric co-ops, including CECA.

It is worth noting that although co-ops serve the fewest people, co-ops' electric lines cover a disproportionately large share of the U.S. landmass—more than 75 percent. This is because co-ops provide power where others once refused to go, due to the service area's low population density.

Electric co-ops rank highest in member satisfaction among the three types of utilities because co-ops serve member-owners, not customers.

As the electric utility business continues to evolve, co-ops are committed to being there for members, to provide for electric energy needs and contribute to the development and well-being of the community. Unlike large investor-owned utilities, co-ops are rooted right here in Texas.

Over the years, CECA has answered the call to provide additional benefits and services because it is extremely important to us that our communites thrive and prosper. This is why we offer personal service, along with economic development, conservation and service programs.

There is a cooperative difference. You own the co-op, and we are here to serve you.



Your Touchstone Energy\* Cooperative 🔨

## BUTLER RURA

## Pole Attachment Audit Underway

**CECA IS CONDUCTING** a pole attachment audit across the CECA service territory. This audit has been contracted to and is being performed by representatives of TechServ Consulting & Training Ltd., based in Tyler. CECA conducts this audit periodically to verify the number of pole attachments on the system to ensure that the entities owning those attachments are being billed correctly.

TechServ will also be looking for safety violations that may result from certain pole attachments, such as low clearances and proximity to energized conductor equipment. Generally, pole attachments include communications cables from various telecommunications and cable companies throughout the service territory.

Representatives from TechServ will visit each pole location on the CECA system, working from the southern portion of the system toward the northern part. If you have questions, please contact CECA at 1-800-915-2533.

## **Helping Others Means Safety First**

**GOOD SAMARITANS ARE CHARACTERIZED AS PEOPLE** who have the desire to help those in need. Knowing how best to help in an emergency situation can mean the difference between life and death—for the victim and the Good Samaritan.

Electricity can be an unforeseen hazard, particularly when overhead power lines have fallen and made contact with vehicles, the ground or anything else that conducts electricity. The wire does not have to be sparking or arcing to be live. Always assume a power line is energized, and never touch or approach it.

If you come upon an accident scene involving a vehicle and downed lines, stay back and warn others to stay away. Make sure the occupants of the car stay inside the vehicle until the utility has de-energized the lines.

In a rare circumstance, the vehicle may catch fire. The only way the occupants can safely exit is to jump free and clear without touching the vehicle and ground at the same time. Advise them to jump and land with feet together, then hop away to safety. Looking silly may save their lives.

If you encounter any other accident situation in which you believe someone is in contact with electricity or has just suffered an electrical shock, here are some additional tips:

► Look first. Do NOT touch. The person may still be in contact with the electrical source and be energized. If there are others nearby, make sure they do not touch the person, either.

Call or have someone nearby call 911 and the electric utility.

► Turn off the source of electricity (i.e., circuit breaker or box)—if known and if safely possible. If you are not sure, wait for help from the emergency responders.

► Only once the source of electricity is off, check for signs of circulation (breathing, coughing or movement). Provide any necessary first aid.

▶ Prevent shock. Lay the person down, and, if possible, position the head slightly lower than the trunk of the body, with the legs elevated.

► Do not move a person with an electrical injury unless the person is in immediate danger.

Anyone who has come into contact with electricity should see a doctor to check for internal injuries, even if he or she has no obvious signs or symptoms.

If you come across an accident involving a power pole or downed lines, call 911 immediately and do not touch the vehicle, lines or pole—or anything in contact with them.





CECA

P.O. Box 729 Comanche, TX 76442

Operating in Brown, Callahan, Comanche, Eastland, Mills, Shackelford and Stephens counties

#### HEADQUARTERS

201 W. Wrights Ave. Comanche, TX 76442

#### EARLY OFFICE

1801 CR 338 Early, TX 76801

#### EASTLAND OFFICE

1311 W. Main St. Eastland, TX 76448

#### **OFFICE HOURS**

Comanche Office: Monday through Friday 7:30 a.m. to 4:30 p.m. Early Office: Monday, Wednesday and

Friday 7:30 a.m. to 4:30 p.m., closed from 1 to 2 p.m.

**Eastland Office:** Tuesday and Thursday 8 a.m. to 4 p.m.

#### YOUR LOCAL PAGES

This section of Texas Co-op Power is produced by CECA each month to provide you with information about current events, special programs and other activities of the cooperative. If you have any comments or suggestions, please contact Shirley at the Comanche office or at sdukes@ceca.coop.

### **Contact Us**

CALL US 1-800-915-2533 toll-free FIND US ON THE WEB WWW.ceca.coop

facebook.com/CECA.coop

# Make CECA Your Source for All Things Solar

**THE HOLIDAYS ARE LONG GONE.** We are all done with the turkey and trimmings, the gift-giving and the traveling, as well as the merriment of ringing in the new year. All that is left now are the fond memories. And the bill paying.

If you did much traveling during the holidays, you most likely traveled through some hillsides dotted with those muchtalked-about wind turbines. You may have even seen a few small ones at individual residences and businesses. A few of you may have even witnessed the occasional solar panel and wondered, "What's up with those new-fangled things?" and "I wonder if it's possible to lower my energy bill with one of those."

Today, the bulk of power in our part of Texas is generated at power plants across the state. As needs and regulations change, so do our power choices, and renewable energy continues to grow in popularity. With Texas being such an energy superpower, it is no wonder people are reviewing their options when



it comes to where and how they purchase their power.

The decision to go solar can be a tricky one. If you are one of those whose thoughts have turned to solar, you may have questions.

### SOLAR PANEL FAQS

#### What is solar energy?

Solar energy takes advantage of the sun's rays to generate heat or electricity. It is a renewable resource and unique for its ability to generate energy in a quiet, clean and consistent manner. Photons from the sun's energy are absorbed by solar panels and converted to electricity by creating a current inside the panels for the photons to move through. Texas receives more photons from the sun's energy than most other states in the country, making it a hotbed for solar activity.

#### How do solar panels work?

Photovoltaic cells in solar panels are made of layers of semiconductor material that convert sunlight into direct-current electricity. An inverter converts DC power into alternatingcurrent power, which can be used by your home. The more sunlight the solar panels receive, the more electricity they can produce.

#### Will I be able to go "off the grid" by installing solar panels?

It is possible to install a solar system large enough to power your entire home, but it is rare and incredibly expensive. Usually, the standard system will only help reduce your monthly power bill by supplementing your home's energy needs. On average, a typical system will produce approximately 500 kilowatt-hours per month. That's about a third of the 1,500 kWh consumed monthly by the average home in our area.

#### What happens to any excess energy that's generated?

CECA does not purchase any excess power created by your personal solar system. However, we do offer net metering, meaning that any excess power generated during the day is credited to your account to offset the power used at night.

#### Will I still have power during an outage?

For the safety of workers attempting to repair the outage, utility regulators require that solar systems connected to the electrical grid be shut off during outages. This prevents power from backfeeding into the lines, endangering the lives of those working to restore power. You will be required to install a transfer switch, which prevents this power from backfeeding and ensures that it only flows on your side of the meter.

#### Are solar systems durable?

As with any product, you need to ask questions to ensure that you are investing in a quality product. In general, solar panels are durable and hail-resistant and generally just need hosing off to keep clean.

#### Is solar cost-effective?

This is a touchy subject that has many variables and vantage points affecting the answer. Solar's cost-effectiveness can depend on your point of view of solar power's worth. The cost of solar has dropped dramatically over the past 10 years, and it looks like that trend will continue. Power costs in general, thanks to several factors, also have fallen in recent years, preventing solar from reaching parity with fossil fuels from a strictly business perspective.

#### Is it just a fad, or can I count on it to be around for a while?

For many folks, the use of solar panels to generate electricity is a recent technological development. In reality, however, the use of solar energy dates back to 1767, when a Swiss scientist named Horace-Benedict de Saussure built the "solar oven," an insulated, glass-faced box, generating temperatures of up to 230 degrees from sunlight. The solar oven is still in use and is a favorite among science projects. Additionally, there is a plethora of solar products on the market today, ranging from solar chargers and lights to radios, rodent repellents, and even freezers and wooden airplane model kits. So our guess is that solar is here for the long haul. How extensively the technology will develop is yet to be seen.

As any product, you need to ask questions to ensure that you are investing in a quality product. Be sure to include CECA in your list of places to go to for information and advice.

#### Is solar power right for my situation?

Now, that's a question that only you can answer, but our answer is that it depends on a number of factors. First and foremost, what will you use it for? If it's for backup power in an emergency, stop here! Solar systems are tied to the grid for safety reasons, so when the power goes out, your solar system will shut down, as well. If it is for environmental reasons or for supplemental power, your next step is to do your research. Be sure to include CECA in your list of places to go to for information and advice.

#### Is there anything else I should consider about solar power?

A south-facing roof is typically the preferred direction for the placement of solar panels. Do trees shade the roof at any time? Next to darkness, shade is the natural enemy of solar panels. Is your roof structure capable of accepting the weight of solar panels and any other load, say, wind and snow? Based

### Will Solar Panels Work for You?

 Solar panels work best when your roof faces south.

 If your roof receives a fair amount of shade, solar panels are not a good option for renewable energy.

> Your roof must be able to support the weight of solar panels, plus the weight of other loads, such as wind and snow.

There are many factors to consider before installing solar panels on your roof, so talk to the energy experts at your local electric co-op first.





# SOLAR ENERGY

#### FIND SOLAR

#### findsolar.com

Are you interested in installing a solar system at your home but are unsure of the expense? This tool takes your home's location, energy use, and state and federal incentives into account to calculate potential costs and benefits. It also provides an estimate of how much time is needed before your investment pays off, which often determines a photovoltaic system's feasibility.

#### **U.S. DEPARTMENT OF ENERGY**

#### eere.energy.gov/solar

The Office of Energy Efficiency and Renewable Energy, part of the U.S. Department of Energy, offers excellent sources of information on solar energy, from answers to frequently asked questions to information on the federal Solar America Initiative. A comprehensive Solar Timeline tracks the renewable resource from ancient use to future applications.

## NATIONAL RENEWABLE ENERGY LABORATORY nrel.gov/solar

The National Renewable Energy Laboratory fine-tunes the performance of solar power technologies and researches new ways to harness the sun's energy. Check this site for industry news, programs and in-depth information on specific technologies.

#### SOLAR DECATHLON

#### solardecathlon.gov

Drawing on college students from around the world, the U.S. Department of Energy-sponsored Solar Decathlon showcases cutting-edge applications of solar technology. Teams compete to meet a list of criteria related to energy efficiency and sustainability, including powering small, home-grown buildings for a week on the National Mall in Washington, D.C. Pick a team and cheer it on! on your home's average usage for the past year, and the cost of the solar system, how much of that average cost can be covered?

#### Are there programs available to help with my investment?

CECA's Member Services Department is available to discuss the different avenues for dealing with this cost, which include community solar programs, as well as financing options from outside dealers. There is a 30 percent tax credit that helps soften the blow of the initial costs. Who gets this credit varies depending on how you pay for the system.

#### But will it lower my bill?

Installing solar panels in any array on your property could quite possibly lower your monthly electric bill. But when considering the cost of installation and equipment, one must weigh the odds before making a final decision. Installation expenses can quickly reach epic proportions, and one must make the decision as to whether it is worth the investment. The price of solar is declining at a fast pace, which bodes well for future solar projects.

#### What questions should I be prepared to ask of a solar dealer?

Do careful research and know the facts before buying a solar system and choosing with whom you will do business. With every relatively unknown product, there are those who might try to take advantage of uneducated buyers. Additionally, you will want to consider your location. As in real estate, location is everything when it comes to the actual production and output of these renewable systems.

Get all the details from the salesperson in writing and don't depend on him or her as your sole source of information. Many times, advice from these experts is based on ideal situations that rarely exist. Knowing the facts before visiting with a salesperson could give you a distinct advantage when it comes to making informed decisions concerning what's best for your individual situation.

Find out the total installed cost of the system—all parts, installation, interconnection—and how much maintenance will be required before you make a purchase. If the system has a warranty, be sure you know what it does and doesn't cover; you want one that covers parts and labor. Don't hesitate to ask for names and contact information of individuals in your area who have purchased similar systems from the same vendor. Ask them about performance and reliability.

Know the rules your power provider has for distributed generation systems, and don't depend on the salesperson to provide those rules or buy-back rates to you.

#### Work with your cooperative

CECA has been in the business of providing you energy for 76 years. So when you're considering whether investing in a renewable energy source is right for you, come by our office or call. There are many options to choose from, and we are here to assist you in your decision.

# Safety Essentials for Your Home

**MAKE SURE YOUR FAMILY IS SAFE FROM ELECTRICAL DANGERS.** Safe Electricity provides a checklist of basic electric safety essentials to help you keep your home safe from electrical fire and shock hazards:

**Check outlets for loose-fitting plugs.** Replace missing or broken wall plates so wiring and components are not exposed. If you have young children at home, install tamper-resistant outlets or cover unused outlets with plastic safety caps.

**Never force plugs into outlets.** Do not remove the grounding pin to make a threeprong plug fit a two-prong outlet. Avoid overloading outlets with adapters and too many appliance plugs.

Make sure cords are not frayed or cracked, placed under carpets or rugs, or located in high-traffic areas. Do not nail or staple them to walls, floors or other objects.

**Use extension cords only on a temporary basis**—not as permanent household wiring. Make sure they have safety closures to protect children from shock and mouth burns.

**Check wattage to make sure that lightbulbs match the fixture requirements.** Replace bulbs that have higher wattage ratings than recommended. Screw bulbs in securely so they do not overheat.

Make sure outlets near water are equipped with ground-fault circuit interrupters. Critical areas include the kitchen, bathrooms, laundry, basement, garage and outdoors. Test these outlets monthly to ensure that they are working properly.

Make sure fuses are properly sized for the circuit they are protecting. If you do not know the correct rating, have an electrician identify and label the correct size to be used. Always replace a fuse with the same size you are removing.

If an appliance repeatedly blows a fuse, trips a circuit breaker or gives you an electrical shock, immediately unplug it and have it repaired or replaced. Look for cracks or



Just because there are enough outlets doesn't mean there's enough amperage to safely power everything. Be careful not to overload circuits.

damage in wiring and connectors. Use surge protectors to protect electronics.

**Check periodically for loose wall receptacles, wires or loose lighting fixtures.** Listen for popping or sizzling sounds behind walls. Immediately shut off then professionally replace light switches that are hot to the touch and lights that spark or flicker.

As you continue to upgrade your home with more lighting, appliances and electronics, your home's service capacity may become overburdened. If fuses blow or trip frequently, have a professional determine the appropriate service requirements for your home.



#### CECA MEMBER COOKBOOK VOLUME II

## We Need Your Recipes!

IT HAS BEEN THREE YEARS SINCE CECA PUBLISHED Volume I of our member recipes into a spiral-bound cookbook. We know you have been cooking since then and have new recipes. We would love for you to share those recipes with us to be placed into our newest edition of the cookbook. Recipes can be sent to CECA, P.O. Box 729, Comanche, TX 76442, or emailed to sdukes@ceca.coop.

## Power Tip

Save energy and money by lowering your water heater thermostat to 120 degrees. This will also slow mineral buildup and corrosion in your water heater and pipes.