A Touchstone Energy® Cooperative

1511 14,000 Road, P.O. Box 368, Altamont, KS 67330
866-784-5500
www.twinvalleyelectric.coop

TWIN VALLEY ELECTRIC CO-OP
NEWS

FROM THE CEO

Reliability Requires Investment


Angie Erickson

As your local power provider, Twin Valley's mission has always been simple: keep the lights on and support the communities we serve. But behind every switch, every warm home, and every business that opens its doors is a complex system that requires constant care. Reliable electricity doesn't happen by accident. It requires ongoing investment in our local grid — through system repairs, maintenance, upgrades, and the integration of new technologies that help us operate smarter and more efficiently.

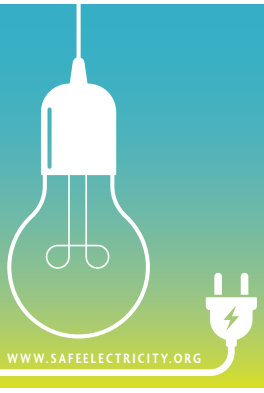
Much of the energy system we rely on today was built decades ago. While it continues to serve us well, age alone means that components must be repaired or replaced to maintain performance and safety. From poles and wires to transformers and substations, every part of the grid has a lifespan. Routine maintenance helps extend that lifespan, but eventually, equipment must be updated to meet modern standards. These proactive investments reduce the likelihood of outages, shorten restoration times when disruptions do occur and create a stronger backbone for our growing community.

The demands on the electric grid are also evolving. Homes and businesses today use more electricity than ever, and that trend will only continue. Electric vehicles, advanced HVAC systems, smart appliances and new commercial facilities add load to the local distribution system. As these

Continued on page 12C ▶

SAFETY TIP

During a power outage, unplug and turn off electrical devices to avoid power surges when power is restored. Leave one light on so you know when the power comes back on. While the power is out, use flashlights instead of candles to reduce fire risk.



SOURCE: WWW.SAFEELECTRICITY.ORG

The Power Surge: Factors Driving the Rising Demand for Electricity

ARTICLE PROVIDED BY NRECA

Across the U.S., the demand for power is climbing at one of the fastest rates in decades. As the economy becomes more reliant on electricity and data centers continue to sprout up in many parts of the country, electric cooperatives are preparing to meet the challenges that skyrocketing demand brings.

The North American Reliability Corporation — the watchdog for the U.S. electric grid — recently released the 2025-2026 winter reliability assessment, which echoed other recent reports, including longer-term outlooks that expect sufficient energy resources during normal conditions but potential supply shortfalls and outages under more intense weather conditions.

Extreme weather, coupled with other factors driving increased demand, poses challenges for electric utilities, including cooperatives, in their mission to provide reliable power around the clock.

Several key factors are driving increased demand — including economic growth, expanded manufacturing, data center development and increased electrification in transportation. Together, these trends are reshaping how much electricity we consume and how quickly utilities like Twin Valley must adapt to meet future needs.

One of the biggest drivers of rising demand is increased electrification. More homes and businesses are transitioning to electricity for home heating, water heating and transportation. EVs are becoming more common on the road, and many states are offering incentives to help consumers make the switch. Additionally, electric heat pumps are replacing traditional furnaces in many homes due to their efficiency. These transitions mean greater energy use and increased pressure on our electric grid.

Data centers and the growth of advanced manufacturing are also contributing to higher electricity use. As businesses expand and new industries take root, the demand for reliable, high-capacity power is increasing. The resurgence of domestic manufacturing has led to major construction of facilities. These facilities often require substantial energy loads, and many operate continuously to keep production lines running. This growth brings jobs and investment, but it also requires solutions for the pressures put on the electric grid.

Population growth and housing development are also contributing to rising demand in some areas, and everyday life is becoming more energy-dependent, too. Smart appliances, connected devices, home offices and entertainment systems are adding to overall consumption, even as efficiency improves.

While increased demand presents new challenges for electric utilities, it also creates significant opportunities for co-ops and the communities they serve, including job growth, steady revenue, downward pressure on residential electric rates, and improved infrastructure. Electric co-ops are responding by planning carefully for the future — investing in grid modernization and offering programs and services to help co-op members conserve energy.

Twin Valley, along with their power supplier, Kansas Electric Power Cooperative (KEPCo), continually evaluates available generation sources, anticipates future transmission needs, and explores technologies that help manage peak load. Strategic planning is critical to ensuring the grid can support everything from EV charging to large-scale manufacturing plants.

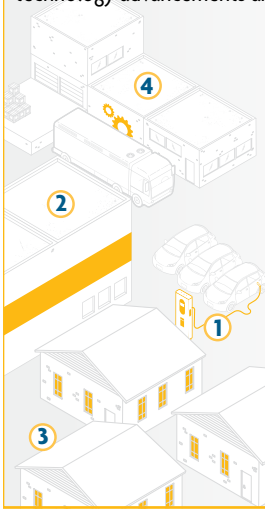
Electricity powers nearly every aspect of today's economy, and its role will only grow stronger. As electrification accelerates, long-term planning becomes more important than ever.

Twin Valley Electric is ready to meet rising demand in our local communities. Through innovation, investment and collaboration, we are preparing for a more reliable and resilient energy future.

NRECA is the national trade association representing nearly 900 local electric cooperatives. From growing suburbs to remote farming communities, electric co-ops serve as engines of economic development for 42 million Americans across 56% of the nation's landscape.

Why is the Demand for Electricity Rising?

Demand for electricity in the U.S. is booming. Power consumption nationwide is set to increase by at least **38 GIGAWATTS** by 2028 — enough electricity to power 3,600 homes for a year. To meet this demand, a combination of new power plants, grid upgrades and energy storage technology advancements are required. Here are some key factors driving increased demand.



1. **INCREASED ELECTRIFICATION:** Electric vehicle adoption, electrification of home heating and industrial electrification are increasing overall U.S. energy consumption.
2. **DATA CENTERS:** Driven by explosions in AI, cryptocurrency and cloud computing, total U.S. data center load is projected to increase by **65%** by 2050.
3. **ECONOMIC GROWTH:** Residential power consumption is expected to increase by **14% TO 22%** through 2050 due to increases in population and steady economic growth.
4. **MANUFACTURING GROWTH/ONSHORING:** New, expanding and "onshored/reshored" manufacturing capacity driven by federal incentives is expected to increase industrial demand by **13,000 GIGAWATT-HOURS** per year.

Reliability Requires Investment

Continued from page 12A ▶

technologies take hold, the grid must be able to support increased demand while maintaining the reliability our members expect. Strategic upgrades are essential to ensuring we can meet these needs both today and in the decades ahead.

Implementing innovative technologies into the grid is not just a convenience — it is a necessity for ensuring reliability in an increasingly complex energy landscape.

While these improvements require thoughtful planning and financial investment, the return is significant. A stronger grid supports economic growth, improves service quality and enhances safety for our crews and community.

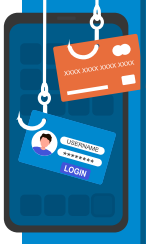
Most importantly, it ensures that the essential power you rely on is available whenever you need it.

Our commitment to reliability runs deeper than infrastructure alone. It reflects our responsibility to the people and communities we serve. Every upgrade, every repair and every technology we deploy is an investment in your daily life — from the comfort of your home to the success of local businesses and schools.

We know that powering our community means preparing for the future, not just maintaining the present. By investing in our local grid today, we are building the foundation for a brighter, more resilient tomorrow.

TIPS TO AVOID UTILITY SCAMS

Enrolling in autodraft payments with your utility provider can help prevent certain types of utility bill scams. Rest easy knowing your bill is paid automatically through a pre-arranged, secure channel. Autodraft payments also eliminate the risk of exposing checks and personal banking info through the mail. SOURCE: AARP



FEMA Partnerships Help Keep the Lights On

When a storm rolls through, Twin Valley Electric is ready to respond. Our crews work around the clock to restore power, repair damage, and make sure every member's lights come back on as quickly and safely as possible. But when that damage is severe, the cost of rebuilding can add up quickly — and that's where the Federal Emergency Management Agency (FEMA) steps in to help.

Most people think of FEMA responding to natural disasters that make national news, such as hurricanes or widespread wildfires. But electric co-ops also rely on FEMA after smaller, localized events — the kinds of storms that may not always make national headlines but can still cause significant damage.

A few inches of ice or a sudden flash flood can snap utility poles, damage substations, and leave miles of power lines on the ground. In rural areas, where electric co-ops serve fewer members across larger territories, repairing that damage can be especially challenging and expensive. FEMA assistance helps ensure those costs don't fall entirely on co-op members and that power can be restored quickly without putting financial strain on small communities.

FEMA's Public Assistance program helps co-ops like ours rebuild critical infrastructure after disasters, large or small. This essential partnership ensures we can focus on restoring power and supporting our community rather than worrying about how to fund large-scale repairs.

The FEMA Act of 2025 is making its way through Congress and aims to modernize the agency's programs, making it easier and faster for essential service providers like Twin Valley to restore and rebuild. It's an important step toward keeping disaster recovery fair, efficient and focused on the people who depend on reliable electricity every day.

Whether it's a large-scale storm or a localized event that only affects a few towns, FEMA's support helps electric co-ops do what we do best — serve our members and keep the lights on, no matter what Mother Nature brings.

FIXING FEMA

FEMA partnerships are essential in restoring power to co-op communities, providing assistance beyond headline-making weather events.

We support the FEMA Act of 2025, a bipartisan effort to reform and modernize FEMA.

Portable Power Stations for Power Outages

How to stay safe and keep your devices running

If the power goes out due to an emergency, you don't want to be left in the dark. Portable power stations are compact, rechargeable battery systems that can keep essential devices, like phones, medical equipment, lights and even refrigerators, running during an outage.

They're easy to use, safe to operate indoors, and many can be recharged through a wall outlet, your car or solar panels. Here's what you need to know to choose the right one.

PORTABLE POWER STATION BASICS

Think of a portable power station as a high-capacity rechargeable battery designed for emergencies, travel or off-grid use. Unlike traditional generators, they produce zero emissions, operate silently, need very little maintenance and don't require gasoline. Most models have three main components:

- **BATTERY:** stores the energy
- **INVERTER:** converts stored energy to usable household power
- **PORTS AND OUTLETS:** USB, AC, and DC connections for your devices

FEATURES TO LOOK FOR:

- **PASS-THROUGH CHARGING:** allows you to power devices while the unit is charging
- **BATTERY MANAGEMENT SYSTEM:** provides built-in safety features to prevent overcharging, overheating and shorting out circuits

To maintain your system, store it in a cool, dry place and keep it clean to ensure maximum lifespan and performance.

HOW TO CHOOSE THE RIGHT POWER STATION SYSTEM

The system that's right for you depends on three things:

- What you want to power (lights, phone chargers, refrigerator, medical equipment, etc.).
- How long you need power (a few hours during an outage or days without electricity).
- Where you'll use it (at home, in an RV, camping or during travel).

When comparing battery systems, you'll see two key ratings:

- **CAPACITY:** How long it can power your devices. This indicates the total energy stored in the battery. The higher the watt-hour (Wh) rating, the longer it can run your devices.
- **OUTPUT:** Which devices it can power. This is the maximum amount of power the system can deliver simultaneously.

Think of a portable power station as a high-capacity rechargeable battery designed for emergencies, travel or off-grid use. Unlike traditional generators, they produce zero emissions, operate silently, need very little maintenance and don't require gasoline.

The output must meet or exceed the wattage (W) required by the device you want to run.

EXAMPLE: A battery with a 500-watt-hour (Wh) capacity and 1000-watt (W) output could run a 1000 W device (like a small space heater or microwave) for about 30 minutes.

If you need to power multiple devices at once — like your refrigerator and lights — make sure their combined wattage stays below the unit's output limit and that the total running time fits within the capacity.

Be mindful that some appliances, especially those with motors such as fridges or power tools, have a higher starting wattage than their running wattage. For safety, add a 20% buffer to your calculations and look for surge output capability.

POWER STATION CATEGORIES

Power stations range from lightweight units to hefty systems that may require wheels or two people to move. Here's a quick breakdown:

- **SMALL CAPACITY:** 100-500 Wh
  - Powers phones, laptops, Wi-Fi routers, small lights
  - Weighs less than 10 pounds.
- **MEDIUM CAPACITY:** 500-1500 Wh
  - Powers mini fridge, small appliances, fans
  - Weighs 30-50 pounds
- **HIGH CAPACITY:** 1500-3000-plus Wh
  - Powers a full-size fridge, microwave, multiple devices
  - Weighs up to 135 pounds

STAY POWERED WHEN IT MATTERS

Portable power stations are a safe and flexible way to keep essential devices running during an outage or emergency, and many are compact enough to take with you anywhere. When choosing a system, think about how much power you need, how long you need it to last, and whether portability or extra features are important to you.

If you want to power your entire home, research whole-home battery systems or gas generators. Your utility may offer incentives or rebates, so it's worth asking before you buy.