Attention Seniors!

Would you like $500

to help pay for your post-secondary education?

You don't have to be an honor student, just sign up for a study guide and complete the questionnaire!

To qualify, your parent/guardian must be an active member of Roseau Electric Cooperative and you must answer a questionnaire about your Cooperative that provide's electricity to your home. Roseau Electric will be awarding five scholarships, $500 each for the best result at least 75% plus a chance to win $50 cash award just for scoring over 50% on the questionnaire. A couple of hours of study time could pay off with a $500 scholarship!

Where else can you make money like that?

Roseau Electric Cooperative, Inc.
A Touchstone Energy® Cooperative

Roseau Electric Cooperative Inc
1107 3rd St NE
PO Box 100
Roseau MN 56751

Phone 218-463-1543 or
888-847-8840
Fax: 218-463-3713
Email:
lpeppel@roseauelectric.com

WHY DO WE OFFER THESE SCHOLARSHIPS?

Older members have remained active in the co-op by attending the annual meetings and participating in the decision-making process, but the younger generations have not taken as active a role. We feel that it is extremely important that young people continue to take an active interest in their co-op, a business they own.

Roseau Electric Cooperative is pleased to offer you this chance to help with your college expenses while at the same time become acquainted with the utility that your parents own and control. There is a good chance that one day you will also be a member-owner of the Cooperative.

In the spring we deliver these study materials to students who are interested in competing for the scholarships. This year, due to Covid-19, our program has changed. This study guide will include a separate page with essay-type questions. The completed page should be returned to your guidance counselor and they will proceed to deliver to our Member Services office C/O Lori Peppel. The winning recipient from each of the school districts will have had their forms evaluated by a select panel from REC. The $50 cash prizes will be awarded to each of the randomly drawn contestants who score at least 50%. All winners will be notified of the results shortly after all the tests have been checked.

If you have any questions about eligibility or anything else concerning this contest, you may contact Lori Peppel at 218-463-1543 or 1-888-847-8840

GIVE IT A SHOT – WHAT HAVE YOU GOT TO LOSE?

Thank you for participating and ***Good Luck!***

Roseau Electric Cooperative

1107 3rd St NE
P O Box 100
Roseau Minnesota 56751
218-463-1543 / 888-847-8840

(Information from annual meeting dated April 6, 2019.
Due to COVID 19, the 2020 meeting has been postponed)

MANAGEMENT STAFF	POSITION
Tracey A. Stoll	General Manager
Ryan Severson	Assistant Manager
Jeremy Lindemann	Member Service Manager
Mike Millner	Line Superintendent
Alex McMillin	Office Manager

DIRECTORS

Mark Sax – District 9 - Chairman	Grygla, MN 56727
Jim Hallan – District 1 - Vice Chairman	Warroad, MN 56763
Collin Jensen – District 4 - Secretary/Treasurer	Roseau, MN 56751
Wes McFarlane – District 2	Warroad, MN 56763
Dale Moser – District 3	Salol, MN 56756
Roger Amundson – District 5	Roseau, MN 56751
Ed Walsh – District 6	Badger, MN 56714
Mike Wahl – District 7	Greenbush, MN 56726
Shawn Gust – District 8	Strathcona, MN 56759

Total Consumers: 6536
Employees: 25
Miles of Line: 1,820 overhead
Miles of Line: 354 underground
Annual Meeting: April
Board Meetings: fourth Wednesday of the month
Counties served: Roseau, eastern Marshall, NW part of Beltrami, northern tip of Lake of the Woods (Northwest Angle)
Wholesale Power Source: Minnkota Power Cooperative
Date System Organized: 1940
Date Energized: 1944
Monthly Newsletter: Volts & Views

Electricity… what would we do without it? Well, we would be back to the good 'ol days…

Would YOU like $500
To Help with College Expenses???
(or Qualify for $50 Cash Prize)

This year ***Roseau Electric Cooperative*** will award $500 scholarships; one in each of our 5 school districts plus five $50 cash random drawing prizes based on minimum score. Students must be high school seniors and have parents or guardians who are active members of Roseau Electric Cooperative. This means that most students who attend the following schools would be eligible:

- Badger School
- Greenbush/Middle River School
- Grygla School
- Roseau School
- Warroad School

Students not living in one of the above areas could also be eligible if their parents or legal guardian are members because they own other property that is served by Roseau Electric, such as a business or a cabin or seasonal home.

Roseau Electric participates in this program because it gives us an opportunity to acquaint you with who we are and what the co-op is all about. Knowing the information in this handout will help you do well on the test. This test is not about just electricity; it is about REC and other electric cooperatives like REC.

Facts About Roseau Electric Cooperative and America's Other Rural Electric Systems

Rural electric cooperatives are consumer-owned utilities that were established to provide electric service to rural America when investor-owned utilities would not. To become a member, you must sign a membership application, pay the applicable fee, and buy electricity from the electric cooperative. Three of the main cooperative principles are open membership, democratic control, and the profits belong to the members. Consumer cooperatives owned and controlled by the people they serve, are nonprofit enterprises, but pay more than $1.4 billion in state and local taxes each year. Each member (consumer-owner) receives one vote and all margins (profits) are returned to the members in the form of capital credits. Electric cooperatives retire over $600 million in capital credits annually.

Electric cooperatives are an integral part of the $364 billion electric utility industry. They play a critical role in our nation's economy, in local communities and employ 70,000 people in the United States. They own assets worth $150 billion, own and maintain 2.5 million miles, or 42%, of the nation's electric distribution lines covering three quarters of the nation's landmass but distribute only about 11% of the nation's electricity. There are 903 rural electric systems which form a rural electric network across the United States. Most are distribution systems that deliver electricity to residential and other consumers. Rural electric systems serve about 19 million farms, homes, schools, churches, commercial enterprises, and other establishments in 2,500 (80%) of the 3,141 counties or county-type areas of the United States.

Although America's rural electric systems serve more than 42 million people, they average only 7 consumers per mile of line and collect annual revenues of approximately $15,000 per mile of line. Investor-owned utilities (such as Minnesota Power and NSP – Northern States Power) average 34 customers per mile of line and collect $75,500 per mile of line annually, and publicly owned utilities (such as the City of Badger, Greenbush, etc.) typically also have many customers and collect more income per mile of line annually than rural utilities. For this reason, rural Americans were denied access to central station electricity (electricity generated in a central location and distributed to many customers via power lines) until the creation of REA (the Rural Electrification

Administration). Rural electric cooperative goals are not to make a profit. Their goal is only to make enough money to maintain their system and serve their members with an adequate and reliable supply of electricity.

A typical rural electric system is about 76 years old with 2,900 miles of line and 13,000 consumers in portions of three counties. Roseau Electric Cooperative has 2174 miles of line and 6536 consumers, which is 3.01 consumers per mile. Counties served: Roseau, eastern Marshall, NW part of Beltrami, northern tip of Lake of the Woods (the Northwest Angle).

Cooperatives, such as Roseau Electric Co-op, are non-profit organizations. Any margin (profit) left at the end of the year is credited to the capital credit accounts of the consumer-owners (also known as the members) based on how much electricity each consumer-owner purchased during that year. REC generally returns a portion of the accumulated capital credits in September of each year. *Roseau Electric Cooperative has returned many thousands of dollars to its consumer-owners. Investor-owned utilities (IOU) and municipal systems do not return their profits to their consumers. In contrast, IOUs can have 20, 50, or more customer accounts per mile of line. That means much more revenue to spread out the expenses and the cost of delivering electricity.*

The Cooperative has 9 districts and the members from that district elect a director to represent them. The directors serve a 3-year term. Each family purchasing electricity from Roseau Electric has a membership in the co-op and one vote.

POWER Generation and Transmission

Some co-ops are called G&T's because they both generate and transmit electricity to meet the power needs of distribution co-ops. Nationwide, there are 65 generation and transmission cooperatives, owned by their member systems. 50% of the power distributed by rural electric systems is generated by rural electric generation and transmission (G&T) cooperatives. All the wholesale power purchased by Roseau Electric comes from Minnkota Power Cooperative, a G&T, headquartered in Grand Forks. Most of this power is generated in North Dakota at the Milton R. Young coal-burning plant located efficiently on the coal fields. Once the coal has been mined, the land is restored to near-original condition at a cost of about $60,000 per acre. More than 30% of the cost of producing lignite coal goes towards reclaiming the land to be at least as productive as it was prior to mining. Minnkota Power Cooperative operates this coal-fired plant and owns most of it. They also have an agreement with the coal supplier to provide coal until the year 2042. Because Minnkota is also a cooperative owned by those it serves, REC is a part-owner of the generating plant along with 10 other rural cooperatives in Minnesota and North Dakota. Any margins (profits) earned are passed on to its members.
Minnkota Power generates 1,236 MW of electricity from several different sources. 59% comes from lignite coal, 9% from hydro, 29% from wind, and 3% from a mixture of diesel & biomass.

ENVIRONMENTAL STEWARDSHIP

In the United States, Minnkota Power is one of the nation's leaders in renewable energy when compared with other G & T in the nation. Of the total electricity they generate, 29% is generated from wind and 9% from hydro power. Their coal fired power plant is located in Oliver County along with five of the state's seven coal fired power plants and has received an A rating from the American Lung Association's "State of the Air" Annual Report.
Minnkota Power is committed to 100 percent compliance with all environmental regulations. Proactive leadership and emission control equipment enable the cooperative to meet strict state and federal environmental standards. Minnkota Power made a major investment of more than $425 million in environmental upgrades from 2006 to 2011 at the Young Station. The results from these upgrades were a 95% reduction in sulfur dioxide (SO2), 60% reduction in nitrogen oxides (NOx), 60% reduction in mercury, and 99.9% removal efficiency in fly ash.

RENEWABLE ENERGY

In 2007, Minnesota mandated that 25 percent of our electric energy must come from a renewable resource by 2025. Minnesota has also stated that our (Minnkota) existing Hydroelectric (water power) plant (109MW) cannot be counted as renewable energy. Minnkota Power, our G&T, was very aggressive in finding these renewable sources early. Minnkota has a 25-year contract for purchasing 357MW of wind capacity with NextEra Energy Resources which is one of the largest owner/operators of wind turbines in the United States. By doing this, we not only met but exceeded the required mandate 15 years ahead of schedule. *The challenge is this…if you were a homeowner reliant on solar(sunlight) or wind to provide as much power as you need, what do you do when the sun isn't shining and the wind isn't blowing? You could run a gas generator, or when the technology provides for big battery storage…is it still clean energy? What did it take to manufacture the products in the first place? Was it clean energy? We need to consider this, and we certainly do keep it in the forefront of our business considerations when communicating with REC member/owners. REC wants individuals to have safe and reliable electricity.*

On the Federal level, the EPA (Environmental Protection Agency) announced quick and very aggressive mandates in 2015 to reduce even more carbon dioxide outputs than the previous $425 million project had accomplished. The electric cooperatives are asking for adequate time to make sure the very expensive and irrevocable decisions are made wisely because the cost and reliability of electric service will be affected.

ASSOCIATIONS

STATEWIDE ORGANIZATIONS In 38 of the 47 states where rural electric systems are located, there are statewide organizations that represent members' interests and coordinate such services as communications, training, purchasing, billing, and research. Statewide organizations are financed through dues from member cooperatives and revenues from services. They vary in size and resources. **MREA** (Minnesota Rural Electric Association) is REC's partner organization.

NRECA, the National Rural Electric Cooperative Association, formed in 1942, represents the national interests for rural electric systems. NRECA provides legislative services and programs in management training, insurance, public relations, and advertising – all designed to help rural electric systems serve their consumer-owners effectively and efficiently. NRECA and its members also support supplemental energy and environmental research and administer a program of technical advice and assistance in the development of rural electric systems in 37 countries. NRECA is also financed by dues and revenues.

Rural Utility Service (**RUS**, but formerly REA-Rural Electrification Administration) is a federal agency in the US Department of Agriculture that administers insured and guaranteed loan programs and provides technical assistance for rural electric systems. Since 1961, RUS (Rural Utility Services) borrowers have helped start and expand new commercial, industrial, and community facility projects, producing new jobs and helping to strengthen the economy in their communities.

Since 1967, Cooperative Finance Corporation (**CFC**) has provided credit and industry-leading financial products to America's local, not-for-profit, consumer-owned electric cooperatives and rural utility systems. A member-owned, nonprofit association that is exempt from federal taxes pursuant to section 501(c)(4) of the Internal Revenue Code. CFC provides a range of services including financing for infrastructure such as distribution lines and power plants, emergency lines of credit so power can be restored quickly after a disaster, loan syndications and loan resale, strategic planning and financial analysis, financial education and training, and much more. Many cooperatives borrow money for infrastructure projects from the government through the Rural Utilities Service (RUS), an arm of the U.S. Department of Agriculture. However, access to federal funding can require additional time and requirements, which may be difficult to meet. CFC was formed to supplement the loan programs of RUS, with over 900 members to date

MILESTONES

Rural Americans were denied electrical service due to the low volumes in rural areas. No one wanted to make the large investment to bring power to a limited number of consumers. They were in it for the money, not for the people.

REA On May 12, 1935, President Franklin D. Roosevelt, by Executive Order 7037, created the Rural Electrification Administration (REA). In May 1936, the Rural Electrification Act was passed by Congress. It also established a loan program to finance qualified entities willing to provide electric service in rural areas, with preference to nonprofit enterprises. Under the provisions of the Rural Electrification Act, the REA made direct loans to rural electric cooperatives, such as Roseau Electric Cooperative. Power to rural areas became a reality due to the availability of financing and the desire of local leaders to form rural electric cooperatives. In 1995, the REA was renamed the RUS (Rural Utility Services). Other sources of financing are now the National Rural Utilities Cooperative Finance Corporation (CFC), CoBank, and the Federal Financing Bank (FFB).

ROSEAU ELECTRIC COOPERATIVE, INC.

Roseau Electric Cooperative is an electric distribution cooperative providing power to more than 6,400 rural customers in Roseau, and parts of Lake of the Woods, Marshall and Beltrami Counties. As a distribution cooperative, we purchase electricity and distribute and sell it over more than 2,000 miles of REC-owned power lines.

Roseau Electric Cooperative Power Association has been delivering reliable electric energy to its consumer-owners since 1944. Your Cooperative continues to do so today, using technology and innovative services to meet the needs of agricultural, commercial, and residential consumers alike. Consumer cooperatives, owned and controlled by the people they serve, are non-profit enterprises, but do pay taxes. Each family that purchases electricity from Roseau Electric has a membership in the co-op and one vote. Any margin (profit) left at the end of the year is credited to the capital credit accounts of the consumer-owners (also known as the members) based on how much electricity each consumer-owner purchased during that year. Roseau Electric generally returns a portion of the accumulated capital credits each year. The Cooperative is governed by a board of 9 directors elected by the members at the Annual Meeting.

The Roseau Electric Cooperative came into existence after an earlier attempt to organize in 1938 had failed. A handful of progressive farmers revived the movement in the summer of 1940 and on July 18th approximately 250 people were present for the Cooperative's organizational meeting held at the Courthouse in Roseau. At the incorporation meeting Henry Jensen of Roseau was elected president; Albert S. Brandt, Vice-President and Jalmer Wellen, Secretary-Treasurer.

Henry Jensen served in the dual capacity of president of the board, plus project coordinator and was the driving force from the start. REA officials in Washington approved a loan of $218,000 for line construction on August 14, 1941, and actual construction on the line began the following January. The board united forces with North Star of Baudette and Border Electric of International Falls to build the Border Counties generating plant in Warroad. REA officials rejected contractor bids for being too high, so local farmers were hired to do the line construction with Cooperative equipment.

In the spring of 1943, all work on the project was suspended by the US Government because of the war, but work was resumed in the spring of 1944. Forrest Ammerman, eventual line superintendent, and August Bourque, eventual general manager, (and the first manager) were hired in May of that year as the first full time employees of the Cooperative. In November 1944, Roy Bloom of Warroad, was the first member of the Roseau Electric Cooperative to have his farm energized. 289 more services were energized that year.

The Cooperative's headquarters was originally in a "cubbyhole" in the courthouse and was moved to the Helgeson building in 1941. Later the office was maintained in the Flagstad building until being moved to its 903 Third Street location in 1949. (this is now a dental office). We are now located in the old Messelt Ford dealership building at 1107 Third Street, after moving here in May of 2006.

The small Border Counties generating plant in Warroad was retired in 1956. Roseau has purchased power and been a member of the Minnkota Power Cooperative, Grand Forks since that time.

The original general manager was August Bourque, who served in that capacity until his death in 1955. He was succeeded by Meredith Haslerud whose 32-year career was highlighted by securing a $250,000 loan for Marvin Window after their fire in 1961, and his efforts that provided central station power to the Northwest Angle in the fall of 1973. Mr. Haslerud died in December 1987. Michael Adams succeeded him in 1988 and held this position until he retired in December of 2011. Our current General Manager is Tracey Stoll, who became the fourth manager in the history of the Co-op in January of 2012. *Note: there may be some of you who are related to some of these 'elders' in the electric co-op world!*

TELECOMMUNICATIONS

In August 1986, the National Rural Telecommunications Cooperative (NRTC) was formed to foster the development and growth of satellite technology in rural America. NRTC, based near Washington, DC, is a joint venture of NRECA and CFC with support of the National Telephone Cooperative Association (NTCA). NRTC began their mission with large-dish, C-Band satellite television programming. NRTC is also involved with Wild Blue internet service which provides high speed internet service by satellite. Roseau Electric has recently ventured in the rural broadband scene, much in the same way as the 1940s with establishing rural electric service. Once again, providing a needed service to those who are unable to receive it.

TOUCHSTONE ENERGY

Roseau Electric Cooperative is a Touchstone Energy Cooperative. We have joined with more than 753 electric cooperatives from 46 states to form this nationwide alliance and a new brand of energy: Touchstone Energy. While not providing electric power, per se, this communication company embraces core values which are integrity, accountability, commitment to community, and innovation. We have combined forces because we all agree that providing outstanding customer service and being active in and committed to our local communities is a large aspect of our job. You see this name and logo on our materials, as well as on TV. We continue to offer the same great, reliable service and affordable rates, backed by the strength of a national identity.

OPERATION ROUND UP

Roseau Electric Cooperative started/joined Operation Round Up in May 2013. Many local organizations benefit from Operation Round Up. It is a voluntary member-driven fund-raising program of REC, which is designed to provide financial assistance for worthwhile projects and charities in the area. Operation Round Up directors are appointed by Roseau Electric board of directors and must be members of the cooperative. The cooperative's general manager is a non-voting member of the board. If a member chooses to be part of Operation Round Up, their electric bill is "rounded up" to the next higher dollar. For example, if a bill is $96.47, the computer will round up the bill to $97. The additional 53 cents will be placed in the trust. Over 90 percent of REC members have chosen to participate in Operation Round Up and have donated almost $147,000 to local charitable and community-based programs.

ELECTRICITY 101

Current is the flow of electrons through a wire (or other conductor), measured in amps(amperes), electricity.

An ampere is a unit measuring the quantity of force flow of electric current in a circuit.

A volt is a unit of electric force that measures the pressure of electricity. In the United States, the two standard residential voltages are 120 volts and 240volts.

A watt is the standard unit of electric power in the United States. Electrical power measured in watts is equal to the voltage times the current ampere.

A kilowatt is the basic unit of electrical demand, equal to 1,000 watts. The average daily household demand (excluding home heating) is 15 to 30 kilowatts.

A Kilowatt-hour is the basic measure of one thousand watts of electricity acting over a period of one hour. Or one kilowatt-hour is the amount of electric energy required to operate a 100-watt bulb for ten hours. Your monthly electric bill will be calculated by this number times the rate, which today is 13 cents per kWH. (main meter usage)

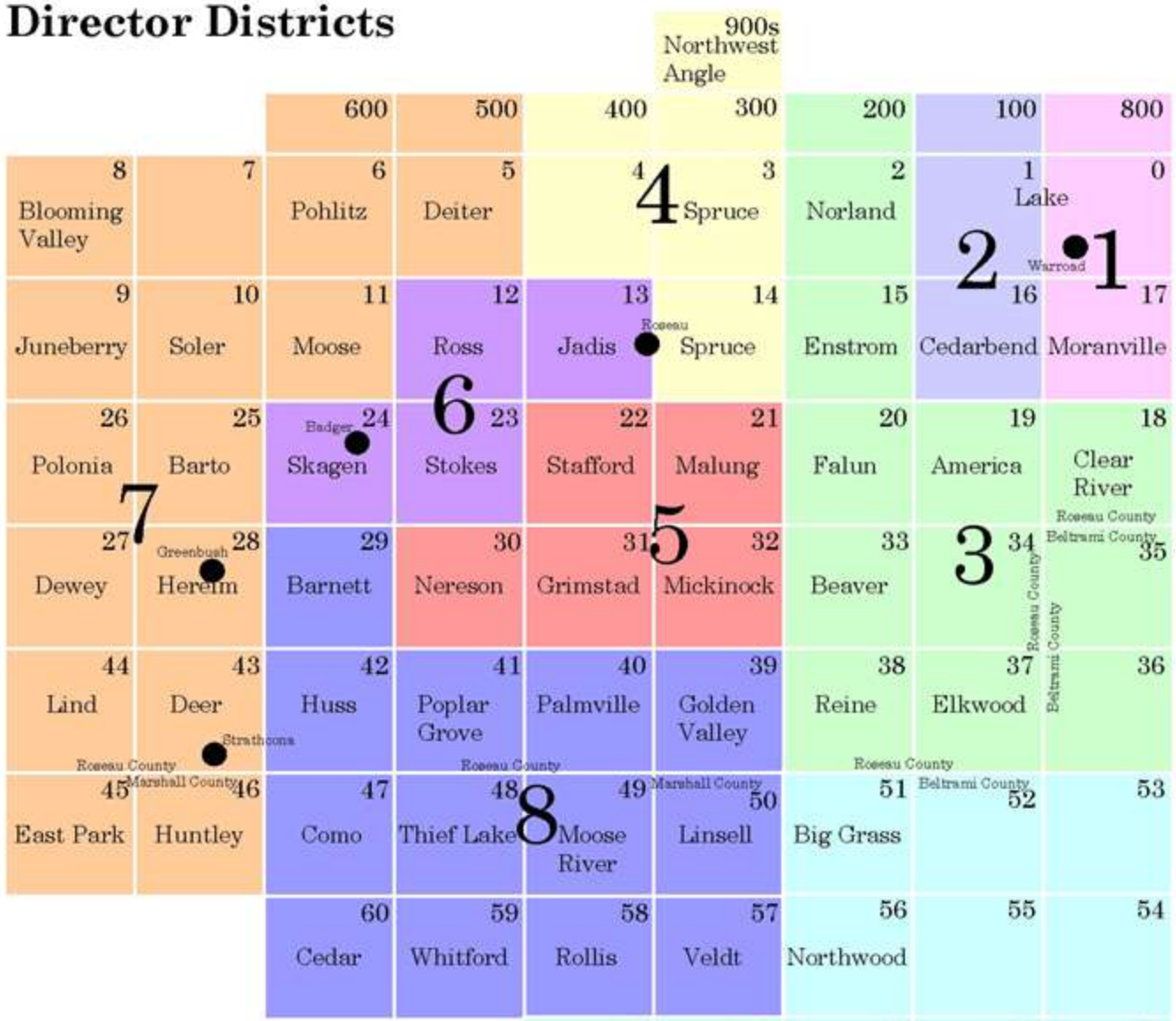
A meter is a device that measures the amount of electricity used. It sends signals to the office almost daily with kWh readings, to calculate charges to the customer/members.

Electricity Generation
Generation is the process of converting mechanical energy into electrical energy, or electricity. Generation facilities are the first link in the chain in providing electricity to customers. There are about 3,200 electric utilities throughout the United States, but less than 700 of them operate facilities that generate electric power. Once electricity is generated, it needs to be transported via high-voltage transmission lines. Some companies provide both generation and transmission functions; these are called G&Ts. Generation and transmission cooperatives (G&Ts) are usually referred to as "power supply cooperatives." Cooperatives account for approximately 5 percent of total utility generation and 10 percent of utility sales to ultimate consumers each year.

Electricity Transmission
Transmission is the process of carrying high voltages of electricity from generation facilities over long distances. Many counties in the United States are served by a single utility, and some parts of the country have more than 10 electric utilities operating in a county. In order to move electricity among utilities, an extensive system of high-voltage transmission lines is operated by the nation's larger utilities. This transmission network permits electricity trading between utilities; without transmission facilities, electricity could not be moved from power plants to the thousands of distribution systems serving millions of consumers of electric power. (Minnkota Power Cooperative is a “G&T”.)

Electricity Distribution
Distribution is the process of carrying electricity from transmission substations to homes and businesses. Many electric utilities are exclusively distribution utilities - that is, they purchase wholesale power from others to distribute it, over their own distribution lines, to the ultimate customer. For example, a distribution cooperative is a cooperative that maintains the distribution lines and equipment necessary to deliver to our member-owners the electricity that arrives in our service area’s substations via transmission lines. (Roseau Electric Cooperative is a “distribution cooperative”.)

Roseau Electric Cooperative
Director Districts



District 1 ..... James Hallan
District 2 ..... Wes McFarlane
District 3 ..... Dale Moser
District 4 ..... Collin Jensen
District 5 ..... Roger Amundson
District 6 ..... Ed Walsh
District 7 ..... Mike Wahl
District 8 ..... Shawn Gust
District 9 ..... Mark Sax