FENN RURAL ELECTRIFICATION ASSOCIATION

NEWSLETTER

February 2021 – Issue 87

Annual General Meeting Update

As reported in the last newsletter, Alberta REAs have been working with Rural Utilities to identify methods that would accommodate holding an Annual General Meeting (AGM) that was not in-person. Rural Utilities has put forward an option that would allow alternative methods of voting. Currently we are in communication with Rural Utilities regarding that option and also to determine a reasonable timeline to facilitate an AGM. We will keep you posted.

The Life of a Power Pole

From Forest to FENN REA

Wood poles have been an essential part of North America's electrical infrastructure for more than a century. The first documented use of wood poles was in 1844 with the development of the telegraph and the need to support telegraph wires. Subsequently wood poles were utilized to distribute electricity.

In 1908, standards for round timbers and specifically for wood utility poles were developed, defining the sizes and characteristics allowed. Over the same time, standards for pressure treating wood poles with preservatives to extend their service life were also developed. Through research, testing and development of new technologies, we've learned more about the structural capabilities of poles, reflected in today's standards. In Canada, wood pole standards are administered by the CSA.

The life of a power pole starts deep in the forest where trees are judged for length, straightness, taper and other characteristics that may impact the load-carrying abilities. Interestingly in a typical stand of conifers, only 7 percent of the trees have the qualities needed to make a utility pole.

Trees are harvested and transported to a manufacturing facility, where the bark is removed and the pole is shaped to make it as straight as possible. Each pole is reviewed, graded and assigned a class as defined by industry standards. The characteristics reviewed include grain orientation, presence of decay, knots and splits.

As longevity and durability are essential requirements for utility poles, they are treated with preservatives and those preservatives are not just on the surface, they are infused deep into the wood to provide long-lasting protection. Preservative treating creates a chemical barrier that protects wood poles, allowing them to remain in service for decades.

Once treated, core samples are taken from the poles and analyzed to ensure that quality and durability standards are met before being placed into service.

So… that utility pole took a long journey to perform its vital task of distributing FENN REA electricity to members.

For power outages, emergency power troubles and service requests, contact the distribution system operator for FENN REA: **ATCO Electric**
Phone toll-free: 1-800-668-2248

FENN REA
Box 31,Fenn, Alberta T0J 1K0
Phone: c/o Philip Jarmin, 1-403-740-9384
Email: fennrea@gmail.com
www.fennrea.com

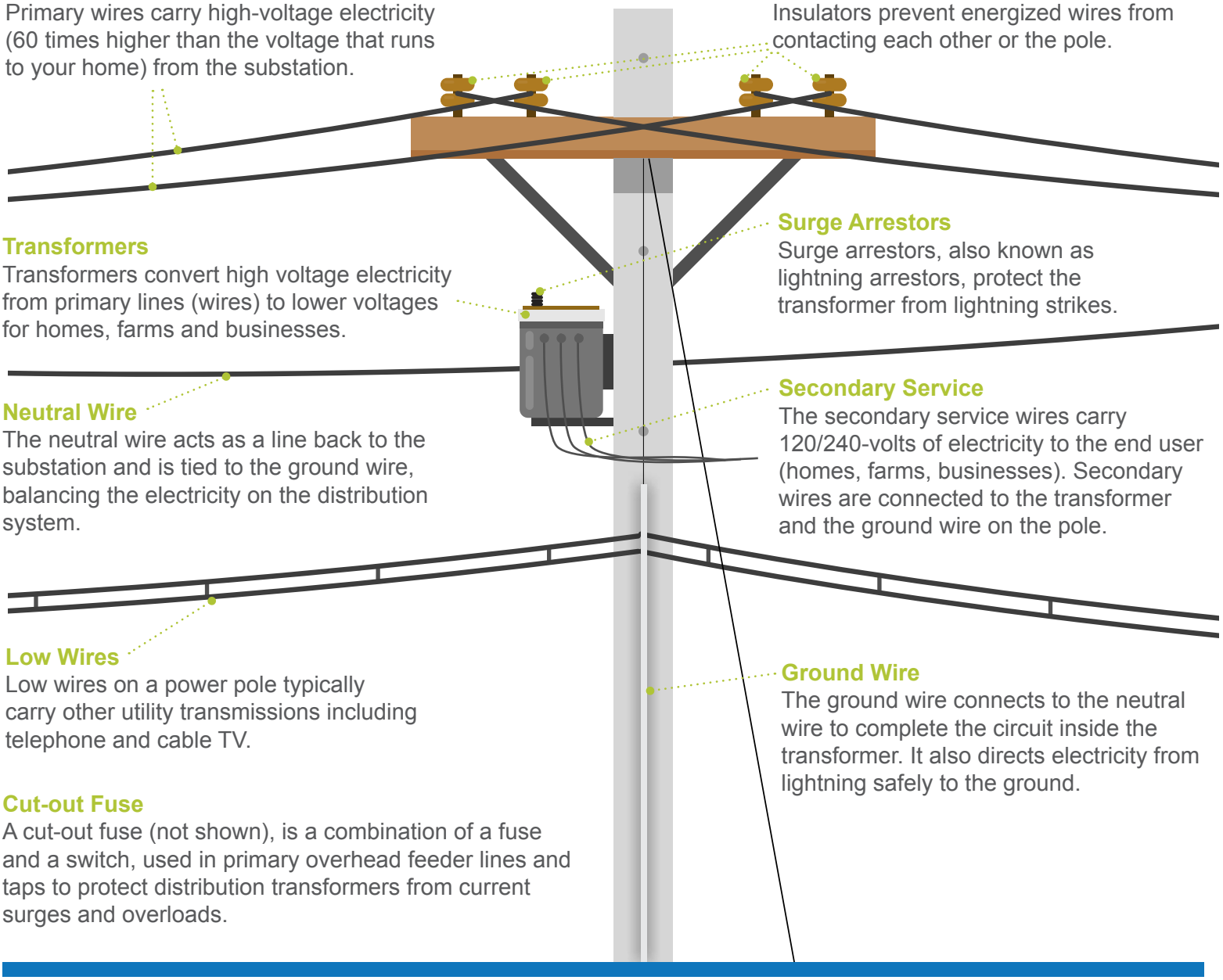
Battle River Power Coop
Member Care & Billing
Box 1420, Camrose AB T4V 1X3
Phone toll-free:1-877-428-3972
Email: brpc@brpower.coop
www.brpower.coop

What's on that Power Pole?

Once the approved power pole becomes a vital component within the FENN REA distribution system, it is outfitted with equipment to fulfill its task. Equipment varies according to location and the service provided. The illustration below shows some basic equipment found on distribution system power poles.

Primary Wires
Primary wires carry high-voltage electricity (60 times higher than the voltage that runs to your home) from the substation.

Insulators
Insulators prevent energized wires from contacting each other or the pole.



Transformers
Transformers convert high voltage electricity from primary lines (wires) to lower voltages for homes, farms and businesses.

Surge Arrestors
Surge arrestors, also known as lightning arrestors, protect the transformer from lightning strikes.

Neutral Wire
The neutral wire acts as a line back to the substation and is tied to the ground wire, balancing the electricity on the distribution system.

Secondary Service
The secondary service wires carry 120/240-volts of electricity to the end user (homes, farms, businesses). Secondary wires are connected to the transformer and the ground wire on the pole.

Low Wires
Low wires on a power pole typically carry other utility transmissions including telephone and cable TV.

Ground Wire
The ground wire connects to the neutral wire to complete the circuit inside the transformer. It also directs electricity from lightning safely to the ground.

Cut-out Fuse
A cut-out fuse (not shown), is a combination of a fuse and a switch, used in primary overhead feeder lines and taps to protect distribution transformers from current surges and overloads.

Regulated Rate Option (RRO)

The RRO rate may increase or decrease from month to month as it is priced on the open market and subject to many factors relating to supply and demand. If you do not have a contract with an electricity retailer, then you receive the default RRO rate.

For February 2021, the RRO is priced at $0.08558 per kWh, which is reflected on your enclosed bill. For March 2021, the Battle River Power Coop monthly RRO billing rate for FENN REA members is $0.06763. The RRO rate is also listed on www.fennrea.com.

Members are free to purchase electricity services from a retailer of their choice. For a list of retailers, visit ucahelps.alberta.ca or call 310-4822 (toll free in Alberta).

Information on **FENN REA's Code of Conduct Compliance Plan** can be found on our website: www.fennrea.com