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1/6/2026

WEST RIVER ELECTRIC ASSOCIATION INC.

2026 Wildfire Mitigation Plan

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1 Introduction/Executive Summary

Wildfire mitigation is essential in West River Electric Association's (WREA's) operational practices. We may sell electricity, but the main reason for our existence is to provide service to our members. A significant part of providing service to our members is taking all practical actions available to prevent the devastation that a wildfire could bring to the members and communities we serve. WREA's Wildfire Mitigation Plan, with its goals and metrics, takes an active approach in achieving these goals. The Plan formalizes the co-op's ongoing vegetation management, asset inspection and maintenance, communications plans, and restoration processes.

1.1 Purpose of the Plan

The Plan describes WREA's strategies, programs, and procedures to mitigate the threat of electrical equipment ignited wildfires, and addresses the unique features of its service territory, such as topography, weather, infrastructure, grid configuration, and areas most prone to wildfire risks. This includes the maintenance of its transmission and distribution (T&D) assets as well as the management of vegetation in the ROWs that contain these assets.

WREA's Board of Directors reviews and approves the Plan as needed, while the Manager of Operations is responsible for its implementation. The Wildfire Mitigation Plan is a living document that will receive regular reassessment as projects and initiatives are completed. Primary accountability for plan implementation resides with the System Coordinator.

1.2 Objectives of the Wildfire Mitigation Plan

The main objective seeks to implement an actionable plan to create increased reliability and safety while minimizing the likelihood that WREA's assets may be the origin or contributing factor in the ignition of a wildfire. This plan was developed to be consistent with current industry best management practices and comply with current South Dakota State law and National Electric Safety Code (NESC) regulations and guidelines. To help develop the Plan, WREA compared emerging technologies that not only reduce the likelihood of a service interruption, but also minimize the risk of ignition from the fault causing the outage.

The secondary objective is to measure, through the annual evaluation of certain performance metrics, the effectiveness of the specific wildfire mitigation strategies. Where a particular action, program component or protocol proves unnecessary or ineffective, WREA will assess whether modification or replacement is suitable.

1.3 Utility Profile and History

Founded in 1939, West River Electric Association's emerged during a transformative period in American history, when rural communities were first gaining access to electricity. The Rural Electrification Act of 1936 was instrumental in making this possible, and West River Electric was established to bring power to the sparsely populated regions of western South Dakota.

Headquartered in Wall, S.D., West River Electric has proudly served the counties of Haakon, Jackson, Meade, Pennington, Oglala Lakota, and Ziebach for over 80 years. With a steadfast commitment to providing reliable electricity at the lowest possible cost, we currently serve more than 15,000 member-owners. Our infrastructure spans over 2,500 miles of power lines, covering nearly 100% of a 4,500 square-mile area in western South Dakota.

As a member of Basin Electric, one of the nation's largest and most advanced power supply networks, West River Electric provides cost-based electric service to over 20,000 meters, supporting a wide range of customers from small residential homes to large commercial, institutional, and industrial loads. Our diverse energy portfolio includes clean coal-fired plants in North Dakota and Wyoming, hydroelectric power from the Missouri River, a peaking plant in Vermillion, as well as wind turbines, solar energy, natural gas turbines, nuclear power, and waste heat recovery systems.

A nine-member board of directors, elected by the members, governs WREA. The Board determines policy and selects the CEO responsible for the co-op's overall management and operations.

1.4 The Service Area

West River Electric Association's headquarters is located in Wall, SD with a branch office in Rapid city as well as an outpost in Enning. The cooperative provides electricity to more than 15,600 rural and suburban members and more than 20,100 metered services in five counties in western South Dakota. The co-op's 4,500 square mile service territory includes plains, foothills, and urban areas. West River Electric Association's maintains 2,650 miles of overhead, underground, and transmission lines with an average of 7.7 meters per mile of line.

Figure 1. Service Area

2 Overview of Utility's Fire Prevention Strategies

This Wildfire Mitigation Plan integrates and interfaces with West River Electric Association's existing operations plans, asset management, and engineering principles, which are themselves subject to change. Future iterations of the Wildfire Mitigation Plan will reflect any changes to these strategies and will incorporate new best management practices as they are developed and adopted.

2.1 Strategy and Program Overview

Five main components comprise the proposed wildfire prevention strategies, which align with West River Electric Association's best practices. Together, they create a comprehensive wildfire preparedness and response plan with a principal focus on stringent construction standards, fire prevention through system design, proactive operations and maintenance programs, specialized operating procedures, and staff training.

- **Design & Construction:** West River Electric Association's design and construction consist of system equipment, infrastructure design, and technical upgrades. These practices aim to improve system hardening to prevent contact between infrastructure and fuel sources to minimize West River Electric Association's electrical system's risk of becoming an ignition source. Examples include wildlife guards and insulated equipment to reduce contacts.
- **Inspection, Maintenance, and Record Keeping:** West River Electric Association's inspection and maintenance strategies consist of pro-active line patrol, diagnostic activities, and various maintenance methods to ensure all equipment and infrastructure are in excellent working condition. Line patrol and inspection, deficiencies, corrections and maintenance are documented to ensure accountability and compliance.
- **Operational Practices:** Pro-active, day-to-day actions include safety training.
- **Situational & Conditional Awareness:** This component consists of methods to improve system visualization and awareness of environmental conditions. The practices in this category aim to provide tools to strengthen the Plan's other features. For example, West River Electric Association monitors numerous websites, including the National Weather Service (NWS), InciWeb, and Great Plains Dispatch @ wildcad.net.
- **Response & Recovery:** This strategy consists of West River Electric Association's

procedures in response to wildfire, de-energization, and other emergency events. This component aims to formalize protocols for these situations and efficient communications, emergency response, and recovery efforts. Table 1 summarizes West River Electric Association's programs and activities that support wildfire prevention and mitigation, along with a timeframe for implementation.

2.2 Timeframes of Preventative Strategies and Programs

The five components have several strategies and programs, most already implemented. The remaining are situational and not limited to any timetable, scheduled for completion over several years, under evaluation, or in the initial stages. The strategies and programs below fall into one or more of the five implementation timeframes:

- 1) Currently implemented
- 2) Implemented before the upcoming fire season
- 3) Completed annually or on schedule per relevant code
- 4) In the evaluation stage
- 5) Implemented on as-needed basis/protocols in place
- * Ongoing program with no defined completion date

Table 1. Mitigation Strategies/Activities

DESIGN AND TIMEFRAME	
Strategic undergrounding of distribution lines	4*
Field recloser to vacuum-type breaker change-out program	4
Covered jumpers and animal guards	5*
Non-expulsion fuses in select high-risk areas	4
Avian protection construction standards	1*
Substation perimeter fencing for security and protection	1
INSPECTION AND MAINTENANCE	
Infrared inspections of substation equipment	1
Unmanned Aerial Vehicle (UAV) T&D line inspections	5

Wood pole intrusive inspection and testing	1
INSPECTION AND MAINTENANCE (cont.)	
T&D system vegetation management program	1
Enhanced T&D vegetation right-of-way maintenance	1
Distribution system line patrols and detailed inspections	1
Enhanced line patrols prior to fire season	1
OPERATIONAL PRACTICES	
Work procedures and Fire Hazard training for persons working in locations with elevated fire risk conditions	2
Community outreach/wildfire safety awareness	4*
Staff safety training and orientation for vegetation management work	1
Fire suppression equipment on worksite during fire season	5
Provide liaison to county offices of emergency services (OES) during fire event	5
SITUATIONAL AWARENESS	
Weather Monitoring in the service area	1
Monitor weather stations	5
Monitor active fires in service area	1
RESPONSE AND RECOVERY	
Coordination with local Department of Emergency Management	5
Customer assistance programs for post-disaster recovery	5
Line patrols before re-energization	1

3 Utility Demographic

3.1 Service Area Description

3.1.1 Location

West River Electric Association, Inc., with headquarters at Wall, South Dakota, serves a rural area consisting of portions of Pennington, Meade, Ziebach, Jackson, and Oglala Lakota counties in western South Dakota.

WREA serves the towns of Wall, New Underwood, Box Elder, Union Center, Enning, Scenic, and Interior. With the greatest growth occurring in the Rapid City and Box Elder areas. As the boundaries of Rapid City expand, large residential developments and commercial accounts are more and more frequent.

In South Dakota, utility territories are established by statute. New loads of 2,000 kilowatts or more of contracted minimum demand may be served by any utility chosen by the consumer and approved by the South Dakota Public Utility Commission regardless of territory.

WREA's source of power is Rushmore Electric Power Cooperative (Rushmore), which presently consists of eight participating distribution cooperatives. Rushmore is a participating member of Basin Electric Power Cooperative (Basin). Rushmore purchases approximately 13% of its power from the Western Area Power Administration (Western) and the balance from Basin. Western rate increases (including the adder for low water levels) impact WREA's total power costs. The loss of allocation and reliance on an ever-increasing proportion of Basin power impacts power costs at the Rushmore level. Unpredictable national political activities involving coal and natural gas generation, carbon taxes, and/or the sale or restructuring of the power marketing administrations or their allocations, will have a substantial impact on WREA's rates.

3.1.2 Climate

Elevations range from 2,000 to 4,000 feet. The average annual precipitation in the area ranges from 17.7 to 18.3 inches. Temperatures can vary, with extremes of minus 24 degrees to 107 degrees above zero. Average winter low is 11 degrees. The average high temperature in summer is 87 degrees. Water is not usually plentiful because of the average annual precipitation.

The type of predominate vegetation consists of grasses, both native and cultivated types. Most trees have been planted, with the exception of those occurring naturally along streams and in the foothills. Water levels are often minimal in the summer months, with some streams being depleted. Water quality and quantity vary considerably within the area. Well depths vary from shallow to over 2,500 feet.

3.1.3 Population

Population projections for the area served by WREA show an increased rate of growth starting in 2021. CEO of Elevate Rapid City, Tom Johnson, says nearly 30,000 to 40,000 people are expected to be moving to the Black Hills within the next 10 years. It would be estimated that about a quarter of these would be in WREA territory. The greatest center of growth continues to be in the area surrounding Rapid City. The influx of new industry there has contributed to a housing shortage. Much of the new home construction is occurring in the cooperative's service area. The selection of Ellsworth Air Force Base for the new B-21 bomber base has increased construction in the area. The expansion of Rapid City into the cooperative's service area has resulted in a growing opportunity for commercial and industrial development.

Other areas within Pennington and Meade counties have shown considerable residential growth during the last decade. "Country-living" continues to be a popular lifestyle choice. Several new rural subdivisions have been platted during the past few years and they filled with new homes almost immediately. Some commercial and industrial development is occurring outside of the Rapid City area.

3.1.4 Economy

Although agriculture continues to be the cornerstone of the rural economy, the scenic Black Hills and the growth of the Rapid City metropolitan area contribute to an increasing economic diversity. Although seasonal in nature, tourism in the area continues to grow. Legalization of gambling in Deadwood has spurred development in the northern hills and the Sturgis Motorcycle Rally has increased August loads.

The Rapid City metropolitan area offers the greatest opportunity for increases in both commercial and industrial growth within WREA's service territory. Ellsworth Air Force Base outside Rapid City is the area's largest employer.

3.1.5 Transportation Facilities

Surface transportation facilities in the cooperative's service territory meet present needs. Rapid City Regional Airport provides commercial service to hubs in Denver, Minneapolis, Dallas, Los Angeles and Chicago. Deregulation of the airline industry has resulted in less competition, fewer carriers and flights, and higher prices. Intrastate and regional flights, if available, are costly compared to similar routes from metropolitan airports.

3.1.6 Transmission & Distribution

West River Electric Association utilizes its own transmission lines and substations as well as those shared with Western Area Power Administration (WAPA) and Black Hills Electric Cooperative (through our Rapid Area Transmission System (RATS)). The transmission is 115Kv as well as 69kv sub transmission. The distribution system is operated at 7.2 kV and 14.4Kv.

3.2 West River Electric Association's Asset Overview

Due to West River Electric Association's service territory's size, the co-op has a vast number of substations, miles of overhead transmission lines, and overhead/underground distribution line assets to deliver power to its members. Table 2 depicts a high-level description of its assets.

Table 2. Asset Description

ASSET CLASSIFICATION	ASSET DESCRIPTION
Transmission Line Assets	Approximately 29 miles of conductor, transmission structures and switches at 69 kilovolt (kV). As well as 2 miles at 115KV
Distribution Line Assets	Approximately 2,034 miles of overhead (OH) and 624 miles of underground (UG) conductor, cabling, transformers, voltage regulators, capacitors, switches, lined protective devices operating at 7.2 kV or 14.4KV.
Substation Assets	Major equipment such as power transformers, voltage regulators, capacitors, reactors, protective devices, relays, open-air structures, switchgear, and control houses in 11 substation/switchyard facilities.

4 Risk Analysis and Risk Drivers

To establish a baseline understanding of the risks and risk drivers involved, West River Electric Association examined its exposure to known fire-related hazards. Although inherent risks exist in operating an electric utility, there are strategies and processes to better plan and manage them. The overall goal seeks to determine the residual risk level after applying all mitigation factors to the initial inherent risk.

4.1 Fire Risk Drivers Related to Construction and Operations

West River Electric Association staff evaluated other utility's fire causes and applied its own field experience to determine the critical potential risk drivers. The categories listed below were identified as having the potential for causing powerline sparks and ignitions:

- Foreign contact
- Equipment/facility failure
- Vehicle impact
- Standard expulsion fuses
- Cross-phasing

These drivers associated with each category are discussed below but may not be limited to the following:

4.1.1 Foreign Contact

Utilities typically install bare wire conductors supported by insulators on overhead powerlines. The benefits include a much lighter and easier conductor to work with and a more cost-effective method to deliver energy than insulated/covered wire. However, a bare wire is more susceptible to contact from foreign objects such as wildlife, vegetation, and third-party equipment. Protection equipment helps isolate faults, but there are time delays associated with circuit breakers, reclosers, and fuses. These time delays are not fast enough, in many cases, to prevent all sparking before tripping. Ejected molten metal, sparks, or burnt foreign objects can potentially ignite any fuels in the vicinity of the fault. Any foreign objects, such as vehicles, animals, or debris that come in contact with conductors, poles, or guy wires, can create a faulted condition and potentially emit sparks.

4.1.2 Equipment/facility Failure

Equipment malfunction can occur during its service life for many reasons. Most equipment requires regular maintenance for optimal performance. Even though West River Electric Association's qualified personnel do regularly scheduled inspection and maintenance on all system equipment, internal defects not visible or predictable can cause destructive equipment failure resulting in the ejection of sparks and/or molten metal. The failure of hotline clamps, connectors, and insulators can result in wire failure and wire to ground contact. Transformers and capacitor banks can have internal shorts, potentially resulting in the ejection of materials, which could be an ignition source.

4.1.3 Wire to Wire Contact

High wind events are potential causes of wire-to-wire contact during fire season. Conductors can sway under these conditions, and if extreme, wire-to-wire contact can occur. When two or more energized conductors touch, they can emit sparks or cause fuses to open, emitting sparks and ejecting material. A vehicle impacting a pole, or livestock rubbing on guy wires, and re-energizing conductors can cause a "galloping" condition, resulting in wire to wire contact.

4.1.4 Standard Fuses

The utility industry typically installs expulsion fuses on the transformer and tap-lines to protect and isolate parts of the system that have experienced a faulted condition. Expulsion fuses utilize a tin or silver-link element in an arc-tube that vents gas and potentially molten metal to the atmosphere to extinguish an arc created by a faulted condition. The molten metal, however, can be a source of ignition for fire.

4.2 Topography and Climate

Within West River Electric Association's service territory and the surrounding areas, the following are additional risk drivers for wildfire:

- Drought
- Vegetation Type
- High Winds
- Lightning
- Red Flag Warning Conditions
- Wildland Urban Interface
- Access

4.2.1 Drought

Western South Dakota can experience abnormally dry conditions during late summer and fall, quickly exacerbating prolonged periods of drought.

4.2.2 Vegetation Type

The service area topography ranges from scattered stands of pine forest to vast open range areas characterized by widespread stands of sage and grasses.

4.2.3 High Winds

Western South Dakota can experience 30 to 40 mph winds throughout the year with sporadic higher- speed gusts. However, these winds may cause tree branches to break free and come into contact with an electric conductor or blow trees outside the right-of-way (ROW) into the

power lines. High wind gusts may also blow objects such as tarps and lawn furniture into the conductors. Vegetation and foreign objects in the lines can result in faults, arcing, or downed lines, sometimes causing an ignition.

4.2.4 Lightning

Twenty million lightning strikes hit the ground in the U.S. every year¹. Many possible effects of a direct strike to power lines or structures include flashovers, ignition of the wood pole, melted and broken conductor, or ground wire damage. West River Electric Association has taken steps to mitigate the damaging effects of lightning on its system by installing shield wire above on most of the existing transmission line and all new transmission line construction. Lightning arrestors have been installed on most of the distribution system.

¹ National Lightning Detection Network (NLDN)

¹ Product citation: *Dillon, Gregory K. 2015. Wildfire Hazard Potential (WHP) for the conterminous United States (270-m GRID), version 2020 classified. 3rd Edition. Fort Collins, CO: Forest Service Research Data Archive. <https://doi.org/10.2737/RDS-2015-0047-3>*

4.2.5 Red Flag Warning Conditions

The National Weather Service issues different warnings at the onset or possible onset of critical weather and dry conditions, which could rapidly increase wildfire activity. A Red Flag Warning (RFW), the highest alert, is released when weather events may result in extreme fire behavior within 24 hours. A Fire Weather Watch, one level below an RFW, goes out when weather conditions over the next 12-72 hours put fire danger at a high level.

During an RFW, West River Electric Association crews limit activities in elevated fire risk areas. If critical work must happen in an elevated fire risk area, vegetation management and line crews have fire suppression equipment on-site, including fire extinguishers, fire flapper, and shovels.

4.2.6 Wildland Urban Interface (WUI)

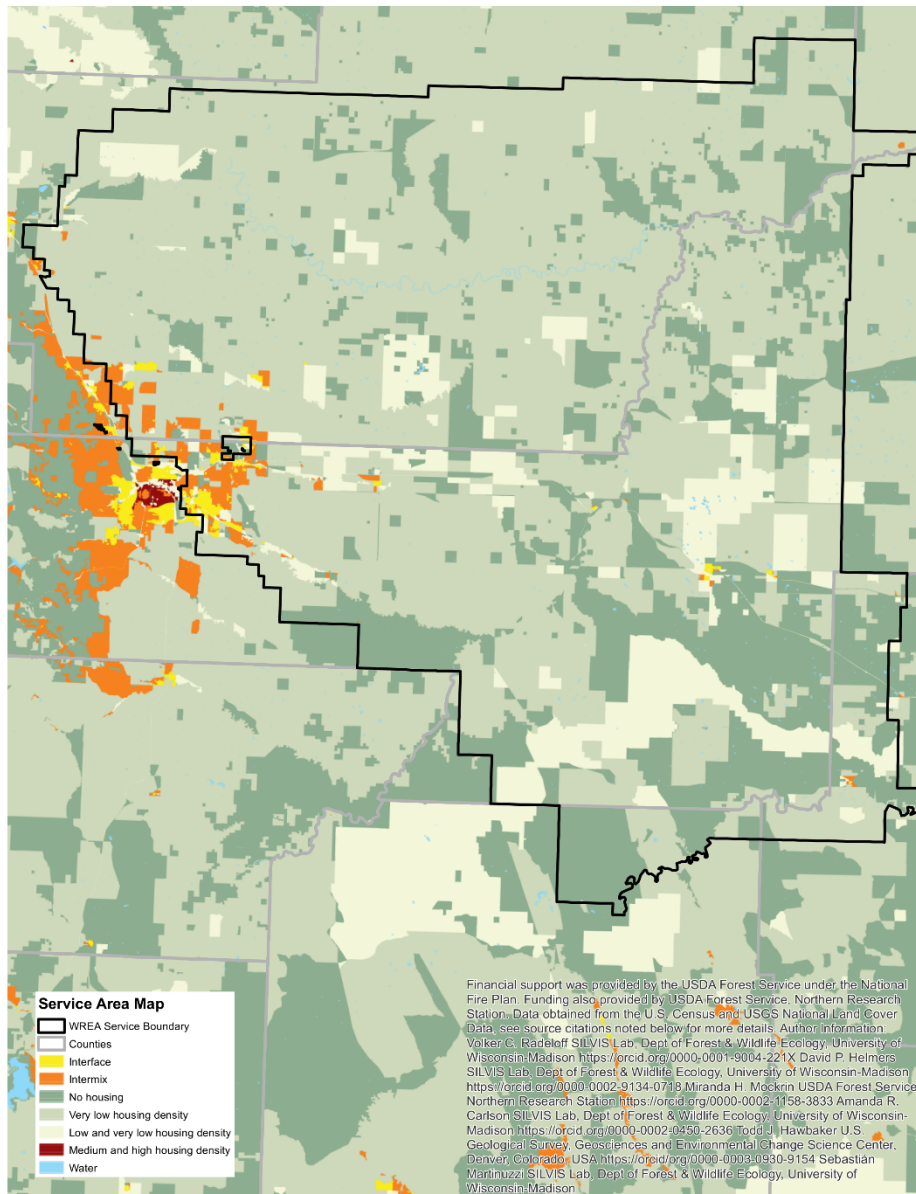
The wildland-urban interface defines an area where houses and other infrastructure are in or

adjacent to areas prone to wildfire. West Rivers' recent population growth has led to an increase in residential development in wildland areas. Growth in WUI designated areas results in an increased chance of more wildfire ignitions since electrical powerlines must traverse these wildlands to reach customers. Figure 2 shows areas of WUI throughout our service territory.

The USFS has established five classes of WUI in its assessment:

- **WUI Intermix:** Areas with ≥ 16 houses per square mile and ≥ 50 percent cover of wildland vegetation
- **WUI Interface:** Areas with ≥ 16 houses per square mile and < 50 percent cover of vegetation located < 1.5 miles from an area ≥ 2 square miles in size that is ≥ 75 percent vegetated
- **Non- WUI Vegetated (no housing):** Areas with ≥ 50 percent cover of wildland vegetation and no houses (e.g., protected areas, steep slopes, mountain tops)
- **Non-WUI (very low housing density):** Areas with ≥ 50 percent cover of wildland vegetation and < 16 houses per square mile (e.g., dispersed rural housing outside neighborhoods)

Figure 2. Wildland Urban Interface



4.2.7 Access

Portions of the service area have steep hills with thick vegetation making access to certain areas of the cooperative service territory difficult to access. Other portions of our service territory are gentle rolling hills and grassy plains that are much more accessible.

4.2.8 Other Potential Risk Factors

Construction projects by non-West River Electric Association crews are another possible cause of ignition. Construction equipment, vehicles, and non-utility personnel working near power lines can contact conductors, causing a faulted condition. Excavation work performed without locating underground utilities is another hazard.

West River Electric Association employs an appropriately trained and well-informed workforce. Crews regularly perform switching, construction, and maintenance activities. The tools and vehicles can be sources of sparks or ignition as well. For example, a vehicle driven over dry grass/brush can cause ignition when vegetation comes into contact with a hot surface of the vehicle's undercarriage. For these reasons, West River Electric Association equips its vehicles with fire suppression equipment and trains its staff to respond to fires and properly use fire suppression equipment.

4.3 Key Risk Impacts

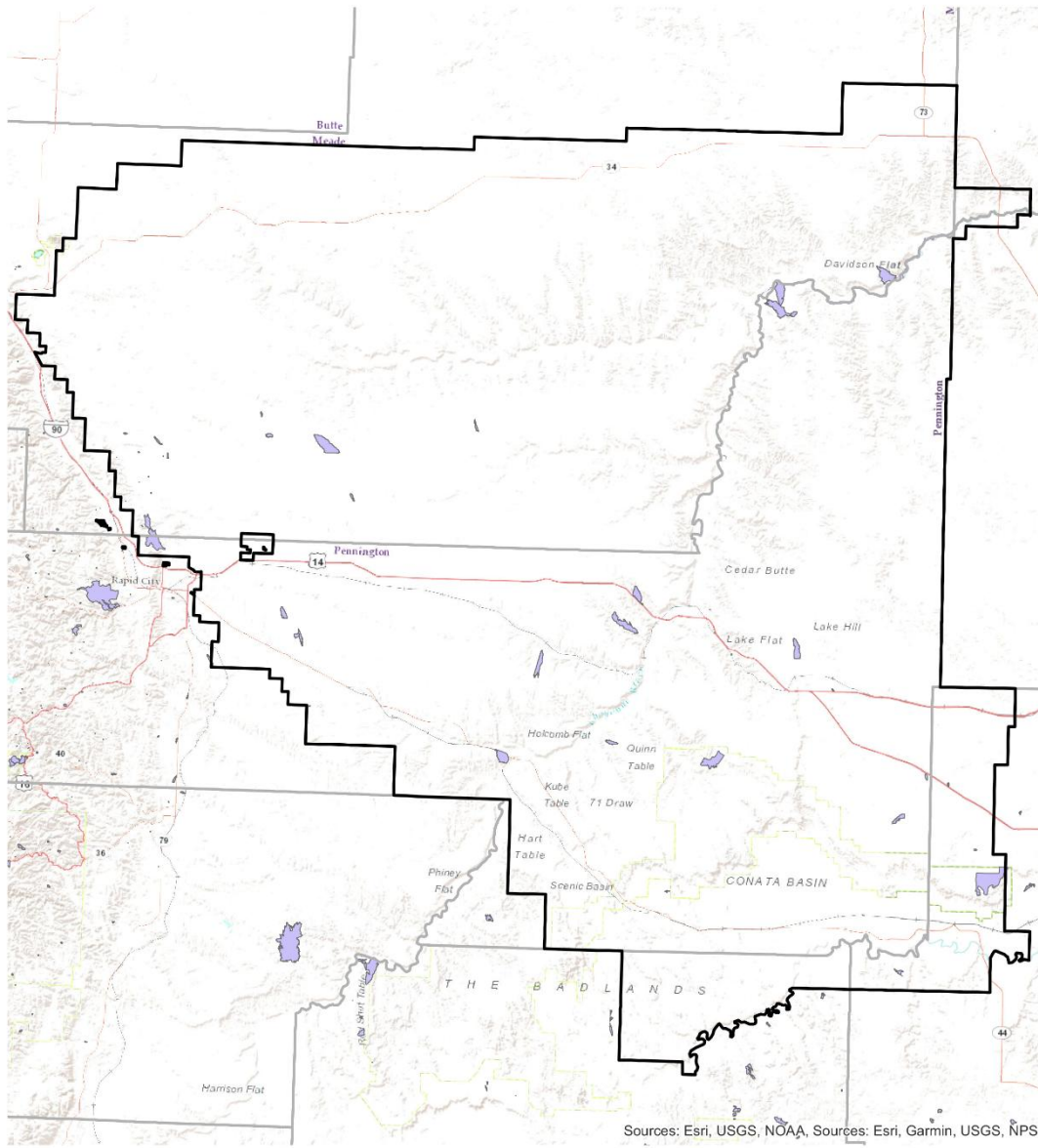
The risks have many possible outcomes. The list below outlines some of the worst-case scenarios and consequences:

- Personal injuries or fatalities to the public, employees, and contractors
- Damage to public and/or private property (structures, equipment, livestock, etc.)
- Damage and loss of West River Electric Association owned infrastructures and assets
- Impacts on reliability and operations
- Damage claims and litigation costs, as well as fines from governing bodies
- Damage to West River Electric Association's reputation and loss of public confidence

4.4 Wildfire History and Outlook

Historically fire seasons are the months of June, July, August, and September. The last several years have trended towards “year-round” fire season with fires occurring in every month of the year.

Figure 3. Historic Wildfire Perimeters 2000-2021



Service Area Map
 WFIS Interagency Perimeters
 WREA Service Boundary
 Counties

5 Wildfire Prevention Strategy and Programs

West River Electric Association has proactively implemented many measures to address potential wildfire risks over the years. The Wildfire Mitigation Plan outlines existing fire mitigation efforts and identifies new processes West River Electric Association may employ moving forward.

Generally, the Wildfire Mitigation Plan describes specific programs West River Electric Association has embarked on to mitigate wildfire risks. Many of the programs, however, are multi-year and programmatic. While some have an immediate startup period, full implementation may occur when processes and methods mature. West River Electric Association is currently looking into pilot programs, including an aerial patrol program utilizing a drone employing infrared (IR) technology and high-resolution photography.

Several of West River Electric Association's current strategies and programs do not fall within any timeframe but remain situational based on certain real-world events. These conditions are predominantly weather and vegetative fuel-related and not associated with time periods (e.g., in 2025 or within five years). Similarly, West River Electric Association's emergency preparedness and response plans, post-incident recovery, restoration, and remediation activities and programs to support customers impacted by a wildfire are event-driven and are not timeframe-dependent. The co-op updates these practices as new information emerges and then adopts improved practices. Furthermore, all administrative-related programs such as risk analyses, performance metrics, and monitoring of this Wildfire Mitigation Plan occur at regular or annual intervals. The following table shows activities that will address key wildfire risk factors.

Table 3. Activities That Address Wildfire Risk Factors

RISK FACTOR	PROPOSED MITIGATION
Fuel Source	• Vegetation Management • Line Inspections • ROW Maintenance • Enhanced inspection intervals in high-risk areas
Wire to Wire Contact	• National Weather Service monitoring • Undergrounding of distribution lines
Contact from Objects	• Wildlife guards • Increased vegetation clearances • Avian protection program • Insulated equipment
Equipment Failure	• Routine maintenance • Focused design and construction standards to reduce ignition sources • Transmission and distribution line detailed inspections and biennial patrols • Intrusive pole testing (cycle) • Pole replacement program • SCADA monitoring of substation equipment • Infrared inspections of substation equipment
Field Work	• West River Electric Association worker/contractor education on fire ignition sources • Tailgate meetings before fieldwork • Land agencies fire season requirements

5.1 Transmission and Distribution System Operational Practices

5.1.1 Situational Awareness Tools

West River Electric Association utilizes various operational and situational awareness tools to determine when de-energization or alternative operational practices are appropriate. They are listed below:

- Weather data such as wind speed, wind direction, air temperature, barometric pressure, and relative humidity.
- Red Flag Warning Map
- National Weather Service
- National Oceanic and Atmospheric Administration, Fire Weather Outlook

5.1.2 Fire Precautionary Period

Historically, Western South Dakota fire season occurs between July and September, with mid-to-late August most vulnerable to extreme fire conditions. For this Wildfire Mitigation Plan, the Fire Precautionary Period is April 1st to November 1st of any year.

During this Fire Precautionary Period, West River Electric Association and Contractor crews shall:

- Abide by the requirements of this Wildfire Mitigation Plan and be responsible for patrolling and preventing fires caused by vegetation management activities.
- Take all steps necessary to ensure co-op employees, subcontractors, and their employees prevent ignitions directly or indirectly during their work activities and operations.
- Permit and assist with periodic testing and inspection of required fire equipment. Operators shall certify compliance with specific fire precautionary measures in this Wildfire Mitigation Plan before beginning operations during the Fire Precautionary Period and shall update such certification when operations change.
- Equipment service areas, parking areas, and gas and oil storage areas shall be cleared of all flammable material for a radius of at least 10-feet unless otherwise specified.

5.1.3 Recloser Operational Practices

There are over 175 reclosers on various distribution lines in West River Electric Association's system. West River Electric Association does not typically disable automatic reclosing functions at its

substations nor in the field due to weather- related conditions. Before line work or clearing operations, the reclosers are set to the “one- shot” alternate setting to block the reclosing function. To disable, co-op personnel will physically go to each recloser to change the setting. West River Electric Association continues to assess resetting reclosers in high- risk areas to “one-shot” mode when conditions suggest imminent fire danger. By placing reclosers in “one-shot” mode, they are more sensitive to line disruptions and protect the system with rapid disconnect/de-energization of power lines.

5.1.4 Public Safety Power Shutoffs

Public Safety Power Shutoffs (PSPS) are a recent development in the strategies used by electric utilities to help keep people and communities safe. A PSPS preemptively de-energizes power lines during high wind events combined with hot and dry weather conditions. West River Electric Association, in consultation with the local emergency managers evaluates the efficacy of a PSPS. When considering a PSPS, West River Electric Association also examines the impacts on fire response, water supply, public safety, and emergency communications.

West River Electric Association considers the external risks and potential consequences of a PSPS while striving to meet its main priority of protecting the communities and members we serve. They include:

- Potential loss of water supply to fight wildfires due to loss of power at production wells and pumping facilities.
- Negative impacts on emergency response and public safety due to disruptions to the internet and mobile phone service during extended power outages.
- Loss of key community infrastructure and operational efficiency that occurs during power outages.
- Medical emergencies for members of the community requiring powered medical equipment or refrigerated medication. Additionally, the lack of air conditioning can negatively impact medically vulnerable populations.
- Negative impacts on medical facilities.
- Traffic congestion resulting from the public evacuation in de-energized areas can lengthen response times for emergency responders.
- Negative economic impacts from local businesses forced to close during an outage.

- The inability to open garage doors or motorized gates during a wildfire event can lead to injuries and fatalities.

The risks and potential consequences of initiating a PSPS are significant and extremely complex. Based on the above considerations, West River Electric Association reserves the option of implementing a PSPS when conditions dictate. While West River Electric Association believes the risks of implementing a PSPS far outweigh the chances of its electric overhead distribution system igniting a catastrophic wildfire, the PSPS provides a last resort tool and another option in a crisis.

On a case-by-case basis, West River Electric Association has historically and will continue to consider de-energizing a portion of its system in response to a known public safety issue or response to a request from an outside emergency management/response agency. Any de-energizing of the lines is performed in coordination with critical local partner agencies keeping all parties' best interests in mind. If conditions on the ground indicate that a wildfire threat is imminent, West River Electric Association's personnel have the authority to de-energize select distribution circuits. A decision is based on multiple triggers accompanied by the West River Electric Association system's unique understanding, including any enterprise risks involved. No single element is determinative. West River Electric Association relies on weather data from various sources, including the National Weather Service.

Risk triggers for the potential to de-energize circuits:

- Imminent fire danger
- Critically dry vegetation that could serve as fuel for a wildfire
- High temperatures/Low humidity levels
- RFW declaration by the NWS
- Projected high wind events in high-risk areas
- Mandatory fire orders in effect (as directed by any Agency Incident Commander)
- On-the-ground observations from West River Electric Association or other agency field staff
- Active wildfire in the service area

West River Electric Association will monitor the evolution of PSPS implementation by other area electric utilities to continue to refine its evaluation of this vital topic.

5.2 Infrastructure Inspections and Maintenance

West River Electric Association performs multiple time-based inspections on its T&D facilities, which play an essential role in wildfire prevention. Recognizing the hazards of equipment that

operate high voltage lines, West River Electric Association maintains a formal inspection and maintenance program for distribution, transmission, and substation equipment. West River Electric Association currently patrols its system regularly and is increasing the frequency of inspections in high-risk areas. The following sections outline inspection practices for West River Electric Association assets. Table 4 summarizes the inspection schedule for all assets.

Table 4. Inspection Program Summary

ASSET CLASSIFICATION	INSPECTION TYPE	FREQUENCY
Overhead Transmission	Detailed Patrol Inspections	Every 2 years
	Intrusive Pole Test	Every 15 years
Overhead Distribution	Detailed Patrol Inspections	Every 2 years
	Intrusive Pole Test	Every 15 years
Underground Distribution	Safety Patrol Inspection	As needed
	Detailed Inspection	Every 5 years
Substations	Detailed Inspection	Monthly
	Infrared Inspection	Annually

5.2.1 Definition of Inspection Levels

1. **Safety Patrol Inspection:** A simple visual inspection of applicable utility equipment and structures designed to identify obvious structural problems and hazards. Patrol inspections may occur during other company activities.
2. **Detailed Inspection:** Individual pieces of equipment and structures receive a careful visual examination, and through the use of routine diagnostic testing, as appropriate, and (if practical and if useful information gathered) opened and the condition of each rated and recorded.
3. **Intrusive Inspection:** Involving the movement of soil, boring holes in the pole above and

below the ground line, checking for decay, and installing a fumigant.

5.2.2 Detailed Patrol Inspections

Detailed checks include system and vegetation patrols and inspections. West River Electric Association monitors vegetation during its system patrols and performs vegetation management. Inspections and maintenance employ measures intended to protect the worker, the general public, and the system's reliability. Any deficiencies are reported and corrected.

Electric utility operators must perform routine safety patrols of overhead electric supply lines and accessible facilities. The maximum interval between safety patrols is two years. Inspection of substations must occur within a 45-day maximum schedule.

West River Electric Association personnel look for visible signs of defects, structural damages, broken hardware, sagging lines, and vegetation clearance issues. Any anomalies found are addressed based on the severity of the defect. Patrol inspections happen during a two-year cycle on all transmission and distribution lines and equipment. In higher risk areas and before fire season, routine safety inspections transpire annually.

5.2.2.1 Detailed Line Inspection Description

Detailed Line Inspections (DLI) consist of walking and driving to examine all West River Electric Association poles, conductors, and equipment. Visual aids assist with evaluating and detecting potential damage to above-ground components. “Sound” and intrusive tests on the wood poles detect decay or rot during detailed inspections.

Inspectors are looking for:

- Mechanical damage
- Loose hardware
- Guy wire and anchor condition
- Disconnects and fuse holder condition
- Insulators and conductor condition
- Condition of transformers and reclosers
- Ground conductors and moldings
- Pole ID signs and other minor hardware

- Raptor nests
- Wood rot
- Fire damage
- Third-party attachments

DLIs happen on an ongoing 5-year schedule on all overhead and underground distribution equipment.

5.2.3 GIS Mapping

An electric distribution utility uses a network of physical facilities to provide electric power and energy to customers connected to those facilities throughout a geographical area. Each component of the distribution system (i.e., asset) and each meter have an approximate physical location and associated data. To plan, construct, maintain, operate, and manage the electric distribution network, it is necessary to create, manage, and utilize this geospatial data. West River Electric Association has integrated GIS mapping technology into its inspection and maintenance program and records and maps all inspections and service work to ensure all assets are inspected and repaired on the prescribed schedule.

5.2.4 Wood Pole Testing and Treatment

To maintain West River Electric Association wood poles, a formal Wood Pole Assessment Plan was initiated with the goal to inspect 10% of the system each year. Wood pole inspections are carried out on a planned basis to determine whether they have degraded below National Electric Safety Code (NESC) design strength requirements with safety factors.

A third-party contractor inspects and tests all poles on a cycle meeting the interval recommended in RUS Bulletin 1730B-121. Circuits are identified, mapped, and scheduled for inspection and testing using latest industry standards and practices. Poles suspected of deficiencies are subjected to intrusive inspection to determine and identify problems such as rot, decay, or insect damage. All poles that are non-thru bore, as well as thru bore poles older than 20 years are subjected to intrusive inspection. Based on the results of the intrusive test, wood treatments are then administered.

5.2.5 Substation Inspections

West River Electric Association inspects substations on a monthly cycle. Qualified personnel will use prudent care while performing inspections following all required safety rules to protect themselves, other workers, the general public, and the system's reliability.

The substation inspection involves a thorough look at the system to confirm that there are no structural or mechanical deficiencies, hazards, or tree trimming requirements. Individual pieces of

equipment and or structures receive careful visual examination and routine diagnostic tests as appropriate.

5.2.6 Prioritization of Repairs

West River Electric Association considers and prioritizes maintenance work by assessing the most urgent needs. The inspector will document the overhead and underground systems' condition, recording defects, deterioration, violations, safety concerns, or any other factors requiring attention on the inspection records. The inspection shall focus on any hazards that could affect the system's integrity or the safety of line workers and the public.

Inspection data (overhead & underground) will be prioritized and issued as follows:

Priority I – Public endangerment

- 1) Protect the public from danger by barricading or guarding.
- 2) Repair or replace immediately or within 24 hours.

Priority II – For activities that need material, equipment, or change of conditions where noted deficiencies do not present an immediate hazardous condition.

- 1) Monitor the situation to ensure that it does not deteriorate into a PRIORITY I hazard.
- 2) Repair, replace, or correct within 2 to 4 weeks.

Priority III – Where the deficiencies or exposures require engineering or redesign. (This may include moving or rebuilding a line or other extensive construction.)

- 1) Warn public in the immediate vicinity, (e.g. The owner of a sign under the line.)
- 2) Monitor the situation to ensure that it does not deteriorate into a Priority I hazard
- 3) Repair, replace, or correct within 4 to 6 weeks.

Other – Repairs are needed but no hazard is present or expected.

- 1) Repair, replace, or correct when convenient or in the area (not to exceed six months).

5.3 Vegetation Management (VM)

West River Electric Association has tree trimming crews, including contractors, who maintain vegetation on all West River Electric Association transmission and distribution power line requirements

for public safety and fire prevention. Vegetation in proximity to power lines is systematically trimmed on an ongoing basis. Work performed to the guidelines above provide reasonable service continuity, public safety, and guards against forest fire damage caused by supply conductors.

When conducting routine maintenance of power lines and related equipment, West River Electric Association makes efforts to identify and remove high-risk fuel sources as needed. West River Electric Association crews also address vegetation concerns in response to service calls or identify at-risk vegetation while performing day-to-day operations.

5.3.1 West River Electric Association Tree Trimming and Removal Guidelines

West River Electric Association meets the minimum standards for conductor clearances from vegetation to provide safety for the public and utility workers, reasonable service continuity, and fire prevention. As an operator of electric supply facilities, West River Electric Association keeps appropriate records to ensure that timely trimming occurs to maintain the designated minimum clearances.

5.3.2 West River Electric Association Priorities

The following circuits are given priority in the clearance work schedule. Crews inspect these areas on an annual basis before the fire season.

- Forested Areas
- Prairie Land

5.3.3 Hazard Trees

A subset of Danger Trees², a Hazard Tree, is defined as any tree or portion of a dead, rotten, decayed, or diseased tree and may fall into or onto the overhead lines. These trees sometimes sit outside the easement or ROW. West River Electric Association works with landowners in removing hazardous trees to help mitigate potential contacts.

5.3.4 ROW Trimming Specifications

Trees or vegetation encroaching power lines are trimmed or felled as needed. West River Electric Association crews make an ongoing effort to clear any such hazard by removing any tree or brush directly under the power line.

² As defined by ANSI 300 Part 7 standards

The following are optimal right-of-way dimensions at the time of trimming.

- 10' minimum width for overhead secondary routes
- 10' minimum width for underground routes of all types
- 15' minimum width for overhead single-phase routes
- 20' minimum width for overhead multi-phase and single-phase routes constructed on cross-arms
- 40' minimum width for transmission line routes

5.3.5 Clear Cut ROW Specifications

All stumps are cut close and parallel to the ground level as possible to not leave a "spike" or angle cut stump in the ROW, which can damage tires or equipment.

5.3.6 Slash Treatment

The protocol for the treatment of the slash and debris generated by tree removal is as follows:

- West River Electric Association works with private landowners and government agencies to determine the collection and disbursement of slash and debris.

5.3.7 T&D System Vegetation Management Standards

West River Electric Association personnel perform ground-based inspections of tree and conductor clearances and hazard tree identification. Scheduled patrols ensure all lines are inspected for vegetation hazards and systematically trimmed on an annual basis. The patrols produce targeted areas for vegetation pruning or removal. Biennial ground-based field patrols ensure compliance with state and federal regulatory requirements. Crews aim to achieve up to 10 feet of clearance during tree work unless otherwise directed by West River Electric Association. The crews also clear vegetation from West River Electric Association's secondary wires, service drops, and pole climbing space as needed.

5.3.8 West River Electric Association/Contractor Tools and Equipment

Fire Tools and Equipment: During the fire season, West River Electric Association will try to meet the relevant minimum requirements while working on public lands. Fire tools are present on all vehicles and operating sites per Agency requirements.

5.4 Vegetation Management Trimming and Inspection Schedule

West River Electric Association personnel and contractors perform annual, ground-based inspections of tree conductor clearances and hazard tree identification for West River Electric Association ROWs and easements. Proactive maintenance during routine operations and prompt action during emergency events maintain system reliability, a safe work environment, and reduces fire danger. Scheduled patrols ensure all lines are inspected for vegetation hazards and systematically trimmed. On-going, year-round field patrols identify targeted areas for vegetation pruning or removal and ensure compliance with state and federal regulatory requirements.

Table 5 illustrates the vegetation inspection and trimming cycle for the various circuits based on the nominal voltage.

Table 5. Vegetation Management Schedules

ASSET CLASSIFICATION	OPERATION TYPE	FREQUENCY
115 & 69 kV Overhead Transmission	Trimming	Annually as needed
7.2 & 14.4 kV Overhead Distribution	Trimming	Annually as needed

5.5 Fire Mitigation Construction

West River Electric Association is taking steps to harden the electrical system with several upgrades and design changes. These designs stem from many decades of engineering experience and the adoption of emerging technologies. West River Electric Association's design practices continue to advance with the addition of newer safety and reliability-related technologies. This advancement recognizes the importance of understanding and adapting to the challenges brought on by the use of public land, development in the wildland urban interface, and climate change. The following sections describe these projects.

5.5.1 Avian Protection Program

Since 2011, West River Electric Association has employed design and construction standards in mind to protect raptor and migratory birds. These measures have substantially reduced the electrocution risk to raptors and the number of injured raptors. Concurrently, these measures have reduced the incidence of fire ignitions too. Crews install wildlife protective devices on the substation and pole-mounted equipment. The following avian protective measures include:

- Raptor Framing
- Insulated Equipment
- Wildlife Protective Guards

Linemen are trained in procedures contained in the Avian Protection plan annually. These procedures include step by step instructions on the five primary situations that linemen will encounter in the field regarding eagles, raptors, and their nests.

5.5.2 Undergrounding Conductor

The undergrounding of overhead distribution lines mitigates aesthetic impacts in urban areas and functions as a wildfire mitigation option in high fire risk areas. While undergrounding the system helps reduce the risk of wildfires and increase reliability in high winds, these facilities also take longer and cost significantly more to construct, maintain, and repair. In each four-year work plan, West River Electric Association strives to convert overhead distribution lines to underground where practical. The new EPR cabling provides increased reliability and should have a lifespan of 75 to 100 years.

5.6 Emerging Technologies

West River Electric Association initiates pilot projects to explore new technologies and best management practices, which help West River Electric Association staff to evaluate their

effectiveness and benefits. West River Electric Association may elect to integrate the technologies or practices into its various ongoing maintenance programs based on the outcomes.

5.7 Workforce Training

West River Electric Association has developed rules and complementary training programs for its workforce to reduce the likelihood of an ignition. All field staff is:

- Trained on the content of the Wildfire Mitigation Plan
 - Trained in proper use and storage of fire extinguishers
 - Required, during pre-job briefings, to discuss the potential(s) for ignition, environmental conditions (current and forecasted weather that coincides with the duration of work for the day)
 - Required to identify the closest fire extinguisher and other fire abatement tools
 - Required to report all ignition events to management for follow-up
 - Encouraged to identify deficiencies in the Wildfire Mitigation Plan and bring such information to management
-
- Trained in directional falling of trees
 - Trained in the use of tender and pumps
 - Trained on the maintenance of the equipment of ignition source

6 Emergency Response

6.1 Preparedness and Response Planning

West River Electric Association strives to minimize any disruptive event's impacts regardless of the size or scope while consistently focusing on the community's most critical systems and infrastructure.

6.1.1 Crisis Communication Plan

A critical component of West River Electric Association's emergency preparedness and response planning, which outlines the actions the co-op's Member and Public Relations department takes during a crisis. Useful tools include press releases, website notifications, and social media postings to effectively dispense accurate information to employees, co-op members, the general public, and the news media.

6.1.2 Crisis Communications Team

In a crisis, which can consist of a range of emergency conditions, multiple departments will collaborate to gather and disseminate information to the membership and media.

The CEO will determine and declare a crisis and implement the crisis communications plan when necessary. Designated administrative support staff might also assist with the planning and preparation of a response.

6.1.3 Public and Member Communications for Outages

West River Electric Association has a comprehensive communication plan with its members before and during unplanned outages. In coordination with the Manager of Operations and Manager of IT, the Manager of Communications and Public Relations communicates with members affected by the unplanned power outage through available channels. West River Electric Association provides as much notice as possible to inform affected members of scheduled maintenance outages.

Depending on the number of members impacted and the amount of time before the planned outage, the affected members receive a written notification via phone. Outage information is posted on the West River Electric Association webpage, SmartHub®, and Social media.

For unplanned outages, the Communications specialist uses the same communication channels as necessary.

6.1.4 Community Outreach

Public outreach to the community on the importance of wildfire mitigation helps reduce wildfire risk. West River Electric Association features articles in its Cooperative Connections magazine on wildfire preparedness and residential fire preventive measures. West River Electric Association also takes the opportunity to inform members of fire mitigation at our area meetings, annual meeting, and other community events. The community's involvement can play a significant role. As part of its holistic approach, West River Electric Association encourages its members to take proactive steps to safeguard their homes from wildfire danger and prepare for an emergency event. To help create an awareness of fire danger in the service area, West River Electric Association provides information on prevention and mitigation on its website and social media and works with public entities, including first responders and homeowners, regarding vegetation management.

Members can find useful fire mitigation information regarding:

- National Weather Service alerts
- Fire Season Preparation
- Fire Protection in the Wildland Urban Interface

6.1 Restoration of Service

West River Electric Association may elect to de-energize segments of its system due to extreme weather or by request from emergency responders. Inaccessible equipment or distribution lines will remain de-energized until accessible. Poles and structures damaged in a wildfire are assessed and rebuilt as needed before re-energization. West River Electric Association strives to send out member and media updates before de-energizing and will post update status reports when restoration efforts are underway and completed.

6.2.1 Service Restoration Process

After a wide-spread outage, West River Electric Association line crews take the following steps before restoring electrical service after a de-energization event. These measures intend to protect the worker, members, the public, and the system's reliability.

- **Patrol:** Crews patrol every de-energized line to ensure no hazards have affected the system during the outage. If an outage is due to wildfire or other natural disasters, as soon as it is deemed safe by the appropriate officials, crews inspect lines and equipment for damage, foreign contacts and estimate equipment needed for repair and restoration. Lines located in remote and rugged terrain with limited access may require additional time for inspection. West River Electric Association personnel assist in clearing downed trees and limbs as needed.
- **Isolate:** Isolate the outage and restore power to areas not affected.
- **Repair:** After the initial assessment, West River Electric Association staff meet to plan the needed work. Rebuilding commences as soon as the affected areas become safe. Repair plans prioritize substations and transmission facilities, then distribution circuits serving the most critical infrastructure needs. While the goal to re-energize all areas is as soon as possible, emergency services, medical facilities, and utilities receive first consideration when resources are limited. Additional crew and equipment are dispatched as necessary.
- **Restore:** Periodic customer and media updates of restoration status before full restoration are posted on social media platforms and West River Electric Association's website. After repairs are made, power is restored to homes and businesses as quickly as possible. Members, local news, and other agencies receive notification of restored electric service.

7 Performance Metrics and Monitoring

West River Electric Association continually develops performance metrics to monitor their efforts over time. The metrics provide a data-driven evaluation of performance to determine the Plan's effectiveness and identify areas for improvement. This section identifies West River Electric Association's management responsibilities for overseeing this Wildfire Mitigation Plan, including the operating departments and teams responsible for carrying out the various activities described in the previous chapters. This section also identifies the controllable metrics used to demonstrate compliance with this Wildfire Mitigation Plan.

7.1 Plan Accountability

The Board of Directors reviews and approves the Plan's adoption as needed, while the CEO and Manager of Operations oversee its implementation. The Communications Specialist communicates with the members, public safety, media outlets, first responders, local Offices of Emergency Management, and health agencies during emergency outages. The CEO and Communications Specialist determine when and how to notify outside agencies in cases of wildfire emergency events.

7.1.1 Operating Unit Responsibility

Table 6, on the following page, identifies the Departments responsible for tracking and implementing the various components of the Wildfire Mitigation Plan.

Table 6. Accountability of Plan Implementation

MITIGATION ACTIVITIES	RESPONSIBLE DEPARTMENT AND WORKGROUP
Risk Analysis	Manager of Operations
Wildfire Prevention Strategy Programs	
• T&D line patrols • 115 kV & 69 kV transmission line inspections • Wood pole intrusive inspections • Detailed line inspections • Substation detailed inspections • Infrared inspections • Disable reclosers • Planned de-energization • Vegetation management • Accelerated inspection schedule • Maintain positive relationship with government agencies	Operations and Engineering
Fire Mitigation Construction	
• Electronic reclosers • Wood pole replacement program • Undergrounding of distribution lines • Avian protection program	Operations and Engineering
Pilot Projects	
• Drone enabled inspections • Distribution Fault Anticipation • Remote Operations SCADA	Operations and Engineering
Emergency Preparedness	
• Public and agency communications during emergencies • Community outreach • Wildfire awareness content on the website • Crisis Communication Plan	Communications Specialist and Marketing

7.2 Monitoring and Auditing of the Wildfire Mitigation Plan

Metrics to gauge the success or shortcomings of the Wildfire Mitigation Plan and outlined programs follow in this section. As with other aspects of the Plan, these metrics will likely evolve in future iterations.

7.2.1 Metrics and Assumptions for Measuring Wildfire Mitigation Plan Performance

West River Electric Association uses the metrics listed in Table 7 on the following page to measure the Plan's performance and effectiveness. Tracking these metrics will help identify lines most susceptible to unexpected outages, time-of-year risks, and risks in the Moderate and High Fire Threat Tiers.

This Wildfire Mitigation Plan formalizes West River Electric Association's ongoing efforts to execute, measure, maintain, and improve its wildfire mitigation programs included in this document. West River Electric Association will reassess its operations and identify areas for improvement as more data becomes available and refine the Wildfire Mitigation Plan as needed.

Table 7. Performance Metrics

METRIC	RATIONAL	INDICATOR	MEASURE OF EFFECTIVENESS
Number of Utility Caused Ignitions	Demonstrates the effectiveness of the overall plan	Count of events	No material increase
Events Recorded with Fire Reference	Demonstrates the effectiveness of the overall plan	Count of events	Reduction in the general trend of events
Service Interruption Events with Fire Reference	Assess system hardening efforts	Count of events	Reduction in the general trend of events
Traditional Fuse Trip Event with Fire Reference	Gauge risk level	Count of events	Change in the general trend of events
Number of Customer Service Calls Re: At Risk Vegetation	Assess if VM Program has reduced customer concerns and risk events	Number of calls received	Reduction in the general trend of events
Power Line Down Event in Moderate and High WHP Tiers	Assigns risk to the root cause	Count of events	Reduction in the general trend of events

7.2.2 Programmatic Metrics

West River Electric Association outlines and schedules required work on an annual basis. Any incomplete work behind schedule is flagged for review or field verification. The cooperative aims to complete 100% of the work within the initially scheduled time frame; however, emergencies or other unforeseen contingencies can occur, requiring material and labor resources to be otherwise assigned.

When this happens, the delayed work receives prioritization for future time frames and then completed to allow for the electric system's safe and reliable operation following applicable requirements and industry standards. Table 8, on the following page, depicts the completion targets for various inspection and maintenance operations.

Table 8. Programmatic Metrics

PROGRAM	TARGET	METRIC DESCRIPTION
Distribution Line Inspections	95-100%	Inspections completed within the specified time intervals set for each inspection type.
Distribution Wood Pole Intrusive Tests	95-100%	Perform all wood pole invasive tests scheduled for the year. West River Electric Association's goal is to perform wood pole tests within 20 years of installation and every twelve years after that.
Transmission Structure Patrols	95-100%	Perform all scheduled patrols before the end of the year.
Distribution Vegetation Pruning/Clearing	95-100%	Complete scheduled respective tree work to prevent ignition and propagation of fire caused by West River Electric Association assets.
Transmission Vegetation Pruning/Clearing	95-100%	Complete scheduled respective tree work to ensure to prevent ignition and propagation of fire caused by West River Electric Association overhead assets.

7.3 Monitoring and Auditing of the Wildfire Mitigation Plan

The CEO and Operation and Engineering departments monitor the Wildfire Mitigation Plan and report its effectiveness to the Board of Directors on an annual basis. Annually, reports of the Plan's current progress and risk reduction impact are developed and circulated to appropriate utility staff to engender collaborative discussion to make changes to approved strategies. The Operations Manager, or their designee, updates leadership with recommendations or proposed action in enhancing the Plan's objectives over time.

The Wildfire Mitigation Plan annual review aligns with West River Electric Association's existing business planning process. This review includes a yearly assessment of the Wildfire Mitigation Plan programs and performance.

West River Electric Association's business planning process includes budgeting and strategic planning for a 3-5-year planning horizon.

7.3.1 Accountability

The Operations and Engineering Departments monitor the Wildfire Mitigation Plan's implementation and audits the specified objectives.

7.3.2 Identify Deficiencies in the Wildfire Mitigation Plan

The CEO is responsible for ensuring the Wildfire Mitigation Plan meets guidelines to help mitigate its assets' risk of becoming the source or contributing factor of a wildfire. Staff responsible for assigned mitigation areas must vet current procedures and recommend changes or enhancements to build upon the Plan's strategies. Due to unforeseen circumstances, regulatory changes, emerging technologies, or other rationales, deficiencies within the Wildfire Mitigation Plan are reported to the Board of Directors in the form of an updated Wildfire Mitigation Plan on an annual basis.

The Operations and Engineering personnel are responsible for spearheading discussions on addressing deficiencies and collaborating on solutions when updating the Wildfire Mitigation Plan. When deficiencies are identified staff and qualified stakeholders evaluate each reported deficiency to determine their validity and record further actions, as needed.

7.3.3 Monitor and Audit the Effectiveness of Inspections

In addition to the maintenance program, West River Electric Association continuously evaluates its facilities while performing other activities such as outage patrols, new business planning, replacements, and related fieldwork.

Monitoring the effectiveness of inspection practices occurs through ongoing tracking and analysis of annual results.

West River Electric Association has quality control processes embedded in its existing general practices. However, for specific programs, there is a formal quality control process. The following depicts a few of these programs.

7.3.4 Written Processes and Procedures

West River Electric Association documents its operational procedures and processes to maintain consistent and thorough implementation at all levels. Processes are reviewed and updated as needed to maintain the most efficient, effective, beneficial, and safety-driven methods and protocols.

7.4 Programmatic QA/QC processes

7.4.1 Distribution System Inspections

The Operations Manager manages the T&D line and substation assets and develops comprehensive inspection and maintenance programs. These programs ensure the safe operation of the T&D line and substation facilities.

Key imperatives are to:

- Reduce the risk of power-related wildfire.
- Meet federal regulatory requirements.
- Achieve reliable performance within mandated limits and to optimize capital and O&M investments.

Also, designated personnel regularly monitor inspection and corrective maintenance records and diagnostic test results to adjust maintenance plans and develop new programs. West River Electric Association follows the best industry practices to develop its maintenance programs.

West River Electric Association's Operations group administers the inspections and corrective maintenance. Upon the discovery of deficiencies, the Operation and Engineering department creates work orders. The priority for corrective maintenance centers on the immediate removal of hazards and to repair minor deficiencies according to the type of defect. Work orders are monitored throughout the year to ensure timely completion via regular internal reports.

7.4.2 Vegetation Management (VM)

Distribution system-related vegetation management work is field audited. Quality control efforts monitor program effectiveness and overall tree work performance. GIS-based tools track the quality assurance work to monitor the vegetation management program's effectiveness. The quality control results go under review, and deficient work is reissued to the crews for corrective action.

Appendix A: Plan and Mapping Disclaimers

WILDFIRE MITIGATION PLAN DISCLAIMER

The information provided in this report was developed by West River Electric Association staff and is intended for West River Electric Association's internal planning purposes only. West River Electric Association does not warrant the accuracy, reliability, or timeliness of any information in this report, and assumes no liability for any errors, omissions, or inaccuracies in the information provided. West River Electric Association shall not be held liable for losses caused by using this information. Portions of the data may not reflect current conditions. Any person or entity who relies on any information obtained from this report does so at their own risk. This report is presented solely for internal use AS-IS by West River Electric Association staff. West River Electric Association make no representations or guarantees expressed or implied regarding the accuracy or completeness of the report.

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