

LICKING VALLEY

RURAL ELECTRIC COOPERATIVE CORPORATION

P. O. Box 605 • 271 Main Street West Liberty, KY 41472-0605 (606) 743-3179



January 29, 2025

RECEIVED

FEB 14 2025

PUBLIC SERVICE COMMISSION

Director of Engineering Public Service Commission 211 Sower Boulevard P.O. Box 615 Frankfort, KY 40602

Dear Sir:

Enclosed you will find Licking Valley Rural Electric Cooperative Corporation's Electric Distribution Utility Annual Reliability and Accountability Report for the year ending 2024.

If additional information is needed, please let us know.

Sincerely,

Chris Murphy

Superintendent of Operations

Chi Mupt

CM:cjc

Report prepared for:

LICKING VALLEY RURAL ELECTRIC COOPERATIVE CORPORATION

Prepared by:

Chelsea Cantrell csteele@lvrecc.com 606-743-7500 2024 Annual Reliability Report

Major Event Days

SAIDI Value 323.1634

First Date Used to Determine T'Med------January 06, 2024

Last Date Used to Determine T'Med----- December 29, 2024

Number of T'MED in Report Year---23 (14 Storms) (9 Substation outages)

System Reliability Information and Results

System-Wide Information

Total meters 17,926

Total Circuits 37

System-Wide Results

Excluding MED

Reporting Year		5 Year Average	
SAIDI	158.225	153.1656	
SAIFI	1.4274	1.37594	

Including MED

Reporting Year		5 Year Average
SAIDI	481.3889	796.7202
SAIFI	2 5766	2 3868

Ten Worst Performing Circuits and Major Outage Category Without T'Med for SAIFI Index:

Substation	Circuit	SAIFI Value	Major Cause
Zachariah	Lee Co. Circuit	3.4700	Planned
Oakdale	Highland Circuit	3.2443	Right of Way Out
Helechawa	Belknap Circuit	3.1508	Right of Way Out
Crockett	Williams Creek Circuit	2.8787	Right of Way Out
Campton	Stillwater Circuit	2.7209	Right of Way Out
Helechawa	Cannel city Circuit	2.5355	Right of Way Out
Campton	Vortex Circuit	2.1908	Right of Way Out
Sublett	Gun Creek Circuit	1.9665	Planned
Maggard	Flat Fork Circuit	1.7328	Planned
Sublett	Lakeville Circuit	1.7258	Animals

Ten Worst Performing Circuits and Major Outage Category Without T'Med for SAIDI Index:

Substation	Circuit	SAIDI Value	Major Cause
Zachariah	Lee Co. Circuit	474.9268	Planned
Helechawa	Belknap Circuit	461.5966	Right of Way Out
Sublett	Lakeville Circuit	409.5592	Planned
Crockett	Williams Creek Circuit	331.4850	Consumer Caused
Oakdale	Highland Circuit	327.7845	Right of Way Out
Maggard	Rockhouse Circuit	283.1211	Planned
Campton	Stillwater Circuit	211.6328	Right of Way Out
Maggard	Flat Fork Circuit	205.7110	Planned
Helechawa	Cannel City Circuit	200.5631	Right of Way Out
Hot Mix	Wrigley Circuit	200.3209	Equipment Fail

System-Wide SAIFI, SAIDI, and CAIDI for the past 5 years, Includes T'Med

	2020	2021	2022	2023	2024
SAIFI	1.5720	2.9104	2.6595	2.2158	2.5766
SAIDI	244.7829	2511.0391	382.7452	363.6448	481.3889
CAIDI	155.71	862.78	143.92	164.1144	186.8311

System-Wide SAIFI, SAIDI, and CAIDI for the past 5 years, Excludes T'Med

	2020	2021	2022	2023	2024
SAIFI	1.2360	1.3721	1.5963	1.2479	1.4274
SAIDI	163.5087	152.2485	153.4598	138.3854	158.2255
CAIDI	132.29	110.96	121.2224	118.6471	110.8487

Circuits With SAIFI or SAIDI Value Higher Than 5 Year Average

Substation # 1, Zachariah Substation, located on Hwy 1036 at the edge of Wolfe and Lee Counties.

Circuit #1, Lee Co Circuit; this circuit serves areas of Little Sinking, Big Sinking, Lee Co and Big Bend Road.

This circuit has approximately 34.4 miles of line and serves approximately 200 consumers.

This circuit was cut out in 2017.

Causes and percentages for this circuit:

Cause	%SAIFI	%SAIDI
Planned	24%	15%
Unknown	12%	10%
Right of Way Out	6%	2%

Circuit 5 Year Average SAIFI--.2.1016

Reporting Year, 2024, SAIFI—3.4700

Circuit S Year Average SAIDI—305.5149

Reporting Year, 2024, SAIDI—474.9268

In order to complete necessary repairs safely, serviceman had to turn power off until repairs were completed.

Substation # 2, Oakdale Substation, is located at Athol on HWY 52

Circuit # 2, Highland Circuit; this circuit serves areas of Highland Rd, Rt 30 and Houston.

This circuit has approximately 63.7 miles of line and has approximately 356 consumers.

This circuit was cut out in 2016-2017.

Causes and percentages for this circuit:

Cause	% SAIFI	% SAIDI
Right of Way Out	59%	44%
Equipment Fail	12%	9%
Planned	3%	1%

Circuit 5 Year Average SAIFI—2.0487

Reporting Year, 2024, SAIFI—3.2443

Circuit 5 Year Average SAIDI—242.4389

Reporting Year, 2024, SAIDI—327.7845

Substation # 3, Helechawa Substation, located on Hwy 205 in Wolfe County.

Circuit # 2, Cannel City Circuit; this circuit serves areas of Upper Stacy Fork, Cannel City, Johnson Fork, Adele and Cow Creek.

This circuit has approximately 123.7 miles of line and has approximately 829 consumers.

This circuit was cut out in 2017-2019.

Causes and percentages for this circuit:

Cause	% SAIFI	% SAIDI
Right of Way Out	72%	48%
Planned	13%	5%
Right of Way In	2%	2%
Right-of-Way Crew	1%	

Circuit 5 Year Average SAIFI—1.3082

Reporting Year, 2024, SAIFI—2.5355

Circuit 5 Year Average SAIDI—110.5553

Reporting Year, 2024, SAIDI—200.5631

Substation # 3: Helechawa Substation, located on Hwy 205 in Wolfe County, near exit 57 off Mountain Parkway.

Circuit # 4, Belknap Circuit; this circuit serves the areas of Hwy 1094, Banks Fork, Hwy 378, Lower Taulbee Fork, and Davis Fork.

This circuit has approximately 67.1 miles of line and serves approximately 356 consumers.

This circuit was cut out in 2017 -2019.

Causes and percentages for this circuit:

Cause	SAIFI	SAIDI
Right of Way Out	57%	55%
Planned	20%	15%
Unknown	5%	2%
Animals	2%	1%

Circuit 5 Year Average SAIFI—2.5564

Reporting Year, 2024, SAIFI—3.1508

Circuit 5 Year Average SAIDI—303.0137

Reporting Year, 2024, SAIDI—461.5966

Substation # 4, Hot Mix Substation, located on Sugar Camp Road in Morgan County.

Circuit # 1; Elkfork Circuit; this circuit serves areas of HWY 1161, HWY 172, Cow Branch, Indian Creek.

This circuit has approximately 45.5 miles of line and serves approximately 282 consumers.

This circuit was cut out in 2019-2020.

Causes and percentages for this circuit:

Cause	% SAIFI	% SAIDI
Equipment Failure	45%	24%
Planned	3%	2%
Right of Way Out	2%	2%
Unknown	2%	7%
Animals	1%	1%

Circuit 5 Year Average SAIFI—.8018

Reporting Year, 2024, SAIFI—1.2135

Circuit 5 Year Average SAIDI—68.2377

Reporting Year, 2024, SAIDI—75.7484

Equipment fail is out of our control.

Substation # 4, Hot Mix Substation, located on Sugar Camp Road in Morgan County.

Circuit # 2; Liberty Road Circuit; Liberty Rd, and Rt 7.

This circuit has approximately 15 miles of line and serves approximately 121 consumers.

This circuit was cut out in 2019-2020.

Causes and percentages for this circuit:

Cause	% SAIFI	%SAIDI
Unknown	39%	79%
Planned	31%	4%
Animals	31%	17%

Circuit 5 Year Average SAIFI—.2978

Reporting Year, 2024, SAIFI—.3001

Circuit 5 Year Average SAIDI—23.1789

Reporting Year, 2024, SAIDI—32.2850

We will have to do more research to find a cause of line being out.

Substation # 4, Hot Mix Substation, located on Sugar Camp Road in Morgan County.

Circuit # 4; 519 Circuit; this circuit serves areas of HWY 772, HWY 1002, HWY 519, Frank Blevins Rd., Hickory Rd, Zag Rd.

This circuit has approximately 123.8 miles of line and serves approximately 913 consumers.

This circuit was cut out in 2019-2020.

Causes and percentages for this circuit:

Cause	% SAIFI	% SAIDI
Planned	13%	5%
Right of Way Out	4%	2%
Consumer Caused	3%	1%
Right of Way In	1%	1%
Unknown	1%	1%
Equipment Failure	1%	1%

Circuit 5 Year Average SAIFI—.9132

Reporting Year, 2024, SAIFI—.9728

Circuit 5 Year Average SAIDI - 95.6376

Reporting Year, 2024, SAIDI—78.9282

In order to complete necessary repairs safely, serviceman had to turn power off until repairs were completed.

Substation # 4, Hot Mix Substation, located on Sugar Camp Road in Morgan County.

Circuit # 5; Wrigley Circuit; this circuit serves areas of Wrigley, Redwine, Hwy 711 and Blairs Mill.

This circuit has approximately 66.1 miles of line and serves approximately 403 consumers.

This circuit was cut out in 2019-2020.

Causes and percentages for this circuit:

Cause	% SAIFI	%SAID1
Planned	33%	24%
Equipment Fail	30%	39%
Right of Way Out	3%	1%
Unknown	1%	1%
Animals	1%	

Circuit 5 Year Average SAIFI—.9375

Reporting Year, 2024, SAIFI—1.2139

Circuit 5 Year Average SAIDI—93.1111

Reporting Year, 2024, SAIDI—20.3209

Substation #5, Maggard Substation, located on Rt. 1081 at Coon Creek in Magoffin County.

Circuit #1; Rockhouse Circuit, this circuit serves areas of Improvement Fork, Rockhouse, and Logville.

This circuit has approximately 38.1 miles of line and serves approximately 277 consumers.

This circuit was cut out in 2013 & 2014.

Causes and percentages for this circuit

Cause	% SAIFI	% SAID!
Planned	45%	51%

Circuit 5 Year Average SAIFI—1.4869

Reporting Year, 2024, SAIFI—1.5956

Circuit 5 Year Average SAIDI- 165.3903

Reporting Year, 2024, SAIDI—283.1211

Substation # 5; Maggard Substation, located on Rt 1081 at Coon Creek in Magoffin County.

Circuit # 2, Flat Fork Circuit; this circuit serves areas of Coon Creek, Mud Lick, Flat Fork, Mine Fork and Litteral.

This circuit has approximately 54.4 miles of line and serves approximately 500 consumers.

This circuit was cut out in 2013 & 2014.

Causes and percentages for this circuit:

Cause	% SAIFI	%SAIDI
Planned	40%	32%
Right-of-Way Out	11%	13%
Unknown	2%	2%
Animals	2%	1%
Equipment Failure	1%	2%
Right of way in	1%	1%

Circuit 5 Year Average SAIFI—1.6404

Reporting Year, 2024, SAIFI—1.7328

Circuit 5 Year Average SAIDI—267.0229

Reporting Year, 2024, SAIDI—205.7110

In order to do necessary repairs safely, serviceman had to turn power off until repairs were completed.

Substation # 6, Sublett Substation, located on Rt 7 near Royalton in Magoffin County.

Circuit # 2; Lakeville Circuit; this circuit serves areas of Rt. 7, Lakeville, Mill Br, Far Middle Fork and Route 30.

This circuit has approximately 67.3 miles of line and serves approximately 632 consumers.

This circuit is currently being cut.

Causes and percentages for this circuit:

Cause	SAIFI	SAIDI
Animals	26%	10%
Right of Way Out	9%	34%
Consumer Caused	3%	2%
Planned	3%	1%
Right of Way Crew	2%	1%

Circuit 5 Year Average SAIFI—1.0415

Reporting Year, 2024, SAIFI—1.7258

Circuit 5 Year Average SAIDI—162.6351

Reporting Year, 2024, SAID!—409.5592

In Animal problem areas, we will have to put more guards up on the transformer poles.

Substation # 6, Sublett Substation, located on Rt 7 near Royalton in Magoffin County.

Circuit # 4; Gun Creek Circuit; this circuit serves areas of Gun Creek, Blaze Br., Fletcher Br.

This circuit has approximately 13.7 miles of line and serves approximately 146 consumers.

This circuit was cut out in 2012 & 2013.

Causes and percentages for this circuit:

Cause	SAIFI	SAIDI
Planned	45%	33%
Right of Way Crew	42%	50%
Unknown	11%	14%
Animals	2%	2%

Circuit 5 Year Average SAIFI—1.1955

Reporting Year, 2024, SAIFI—1.9665

Circuit 5 Year Average SAIDI—154.42773

Reporting Year, 2024, SAIDI—129.5269

Substation # 7, Campton Substation, located on Rt 15 in Campton, Wolfe County.

Circuit #1, Pine Ridge Circuit, this circuit serves areas of Hwy 715, Pine Ridge, and Quillen Chapel.

This circuit has approximately 48.7 miles of line and serves approximately 741 consumers.

This circuit was cut out in 2015 & 2016.

Causes and percentages for this circuit:

Causes	% SAIFI	% SAIDI
Planned	37%	7%
Right of Way Out	26%	2%
Right of Way In	6%	1%
Animals	5%	
Right of Way Crew	4%	
Unknown	2%	

Circuit 5 Year Average SAIFI—.5026

Reporting Year, 2024, SAIFI—.5805

Circuit 5 Year Average SAIDI—35.4420

Reporting Year, 2024, SAIDI—55.5684

Substation #7, Campton Substation, located on Rt 15 in Campton, Wolfe County.

Circuit #2, Stillwater Circuit, this circuit serves areas of Stillwater, Hwy 191, Holly and Rosedale.

This circuit has approximately 139 miles of line and serves approximately 1118 consumers.

This circuit was cut out in 2015 & 2016.

Causes and percentages for this circuit:

Causes	%SAIFI	% SAIDI
Right of Way Out	51%	22%
Planned	17%	16%
Unknown	3%	5%
Animals	2%	2%
Equipment failure	1%	2%

Circuit 5 Year Average SAIFI—2.3151

Reporting Year, 2024, SAIFI—2.7209

Circuit 5 Year Average SAIDI—262.5319

Reporting Year, 2024, SAIDI—211.6328

Substation #7, Campton Substation, located on Rt 15 in Campton, Wolfe County.

Circuit # 4, Elkins Road Circuit; this circuit serves areas of Sandy Ridge, Mullins Point, Elkins Road and Bear Pen.

This circuit has approximately 41.4 miles of line and serves approximately 322 consumers.

This circuit was cut out in 2015 & 2016.

Causes and percentages for this circuit:

Cause	%SAIFI	%SAIDI
Planned	20%	15%
Right of Way Out	13%	6%
Animals		1%

Circuit 5 Year Average SAIFI—.9284

Reporting Year, 2024, SAIFI—.8732

Circuit 5 Year Average SAIDI—97.8252

Reporting Year, 2024, SAIDI—98.3369

Substation #8, Index Substation, located on Rt 191 at Index in Morgan County.

Circuit # 1, Caney Circuit, this circuit serves areas of Malone, Stacy Fork, Vance Fork, and Caney.

This circuit has approximately 47.8 miles of line and serves approximately 419 consumers.

This circuit was cut out in 2021-2022.

Causes and percentages for this circuit:

Cause	%SAIFI	% SAID
Planned	46%	54%
Unknown	4%	20%
Animals	2%	40%
Right of Way Out	1%	7%

Circuit 5 Year Average SAIFI—.7777

Reporting Year, 2024, SAIFI—1.2529

Circuit 5 Year Average SAIDI—59.5639

Reporting Year, 2024, SAIDI—27.6139

Substation# 9, Maytown Substation, located on Rt 1010 in Morgan County.

Circuit # 1, Ezel Circuit; this circuit serves areas of Ezel, Greasy, Little Blackwater, Hwy 772 and Upper Long Branch.

This circuit has approximately 119.1 miles of line and serves approximately 823 consumers.

This circuit was cut out in 2014-2015.

Causes and percentages for this circuit;

Cause	% SAIFI	% SAIDI
Planned	34%	6%
Unknown	21%	7%
Consumer Caused	13%	2%
Animals	12%	3%

Circuit 5 Year Average SAIFI—.7543

Reporting Year, 2024, SAIFI—1.0763

Circuit 5 Year Average SAIDI—62.8208

Reporting Year, 2024, SAID1—94.4720

Substation #10, Crockett Substation, located on Hwy 172 in Morgan County.

Circuit # 2; Williams Creek Circuit; this circuit serves areas of Hwy 437, Upper and Lower Sandlick, Hwy 172.

This circuit has approximately 83.5 miles of line and serves approximately 536 consumers.

This circuit was cut out 2020-2021.

Causes and percentages for this circuit:

Cause	% SAIFI	% SAIDI
Right of Way Out	51%	22%
Consumer Caused	23%	35%
Planned	13%	6%
Animals	2%	1%
Right of Way In	1%	1%
Unknown	1%	0%

Circuit 5 Year Average SAIFI—1.3141

Reporting Year, 2024, SAIFI—2.8787

Circuit 5 Year Average SAIDI—150.0267

Reporting Year, 2024, SAIDI—331.4850

Vegetation Management Plan

Licking Valley Rural Electric Cooperative Corporation has an aggressive vegetation program and has contracted B M C Contracting to address our cooperatives right-of-way requirements. Our cooperative likes to maintain a sixty (60) foot ground to sky right-of-way clearance on new and existing accounts; however, some variety in right-of-way clearance is based on geography/terrain, line voltages and property owner issues. At this time BMC Contracting is contracted to cut or trim on each side of the lines no less than 20 feet and no more than 30 feet and at least 4 foot below the neutral. Secondary lines have 4-foot swing path cut. If needed another crew is used to take care of call-ins and hot spots.

LVRECC is currently working on a ten (10) year rotation cycle. BMC Contracting has a crew that is cutting each substation by circuit. They also have an hourly crew that cuts hot spots, new right-of-way and consumer reports. Yard trees are dealt with on a case-by-case basis and will be trimmed as much as homeowner will allow (4 foot minimum below our neutral) or taken down if they will agree. In addition to BMC; the cooperative has a bush hog that is used for right-of-way clearing when time allows. The cooperative has a right-of-way foreman that oversees BMC contacting crews. BMC Contracting primarily does our Herbicide Treatment, mostly in the months of May through September. As time allows the cooperative also does some Herbicide Treatment