

<b>Exhibit No.:</b>	
<b>Issue(s):</b>	<b>2022 Stipulation and Agreement CPR Audit Rate Base</b>
<b>Witness:</b>	<b>Michelle Antrainer</b>
<b>Type of Exhibit:</b>	<b>Rebuttal Testimony</b>
<b>Sponsoring Party:</b>	<b>Spire Missouri Inc.</b>
<b>Case Nos.</b>	<b>GR-2025-0107</b>
<b>Date Prepared:</b>	<b>May 30, 2025</b>

**SPIRE MISSOURI INC.**

**GR-2025-0107**

**REBUTTAL TESTIMONY**

**OF**

**MICHELLE ANTRAINER**

**TABLE OF CONTENTS**

**REBUTTAL TESTIMONY OF MICHELLE ANTRAINER ..... 1**

**I. INTRODUCTION..... 1**

**II. 2022 STIPULATION AND AGREEMENT AND CPR AUDIT ..... 1**

**III. AMORTIZATIONS..... 3**

**IV. RATE BASE TREATMENT FOR CERTAIN ASSETS ..... 4**

**V. CONCLUSION ..... 8**

**EXHIBITS:**

**Exhibit MLA-R1: Response to Staff Data Request 0229.1**

**REBUTTAL TESTIMONY OF MICHELLE ANTRAINER**

**I. INTRODUCTION**

1  
2  
3  
4  
5  
6  
7  
8  
9  
10  
11  
12  
13  
14  
15  
16  
17  
18  
19  
20  
21

**Q. PLEASE STATE YOUR NAME AND BUSINESS ADDRESS.**

A. My name is Michelle Antrainer, and my business address is 700 Market Street, St. Louis, MO 63101.

**Q. ARE YOU THE SAME MICHELLE ANTRAINER THAT SUBMITTED DIRECT TESTIMONY IN THIS CASE?**

A. Yes, I am.

**Q. WHAT IS THE PURPOSE OF YOUR REBUTTAL TESTIMONY?**

A. The purpose of my rebuttal testimony is to address various issues and positions taken by Staff of the Missouri Public Service Commission (“Staff”) witness Claire M. Eubanks, PE and Missouri Office of the Public Counsel (“OPC”) witness John A. Robinett relating to Spire Missouri Inc.’s (“Spire Missouri” or the “Company”) November 4, 2022 Full Unanimous Stipulation and Agreement (“2022 Stipulation and Agreement”), inclusive of the Continuing Property Record Audit (“CPR Audit”). I also respond to recommendations regarding Spire Missouri’s amortizations, rate base treatment, and asset disallowance.

**II. 2022 STIPULATION AND AGREEMENT AND CPR AUDIT**

**Q. REGARDING THE CPR AUDIT THAT RESULTED FROM PARAGRAPHS 35-44 OF THE 2022 STIPULATION AND AGREEMENT, STAFF WITNESS EUBANKS STATES IN HER TESTIMONY IT IS NOT CLEAR THE EXTENT TO WHICH SPECIFIC THIRD-PARTY AUDIT RECOMMENDATIONS WILL BE IMPLEMENTED BY SPIRE MISSOURI. HOW DO YOU RESPOND?**

1 A. Spire Missouri received and submitted to the parties the Grant Thornton CPR audit findings  
2 on February 27, 2025. The Company’s response to the recommendations was provided in  
3 response to Staff data request 0229.1, which is included as exhibit MLA-R1. Spire  
4 Missouri plans to address all recommendations by implementing new procedures and  
5 processes and adding new reports for verifying systems reconcile. The Company will  
6 review the recommendations that require system automation with the Information  
7 Technology team to determine the feasibility and timeframe for making these changes.

8 **Q. MS. EUBANKS ADDITIONALLY NOTES THAT IN RESPONSE TO STAFF**  
9 **DATA REQUESTS, SPIRE MISSOURI REPRESENTS CERTAIN ACTIONS**  
10 **WILL BEGIN IN APRIL 2025. PLEASE PROVIDE FURTHER INFORMATION**  
11 **REGARDING THESE ACTIONS.**

12 A. The Company has started the process of reconciling the Power Plan and Maximo systems  
13 for meter assets. A mass retirement resulting from the systems reconciliation was  
14 completed for Missouri East diaphragm meters in March 2025. For Spire Missouri West  
15 diaphragm meters, the systems reconciliation was completed, and the applicable mass  
16 retirement is planned to be completed during the May 2025 financial close process.

17 **Q. STAFF WITNESS EUBANKS RECOMMENDS THE COMMISSION ORDER**  
18 **SPIRE MISSOURI TO: (1) PROVIDE A DETAILED ROADMAP OF ITS**  
19 **PROCESS IMPROVEMENTS RELATED TO METERS, MAINS, AND SERVICE**  
20 **LINES NO LATER THAN THREE MONTHS FROM THE EFFECTIVE DATE OF**  
21 **RATES IN THIS CASE; (2) IMPLEMENT NEW POLICIES AND PROCEDURES**  
22 **NO LATER THAN SIX MONTHS FROM THE EFFECTIVE DATE OF RATES IN**  
23 **THIS CASE; (3) FILE ALL NEW AND REVISED POLICIES AND PROCEDURES**

1 **IN THIS CASE NO LATER THAN SIX MONTHS FROM THE EFFECTIVE DATE**  
2 **OF RATES IN THIS CASE; AND (4) IDENTIFY ANY NECESSARY TARIFF**  
3 **REVISIONS NO LATER THAN SIX MONTHS FROM THE EFFECTIVE DATE**  
4 **OF RATES IN THIS CASE. HOW DO YOU RESPOND TO THESE**  
5 **RECOMMENDATIONS?**

6 A. Spire Missouri's response to the Grant Thornton recommendations includes a high-level  
7 plan for implementation purposes along with preliminary timeframes for updating  
8 applicable policies and procedures. The recommendations involving system automation  
9 will require additional time to complete a cost-benefit analysis along with proposing  
10 alternatives if automation is not currently a feasible option. The Company agrees a more  
11 formal plan will assist in the tracking of these changes.

12 **Q. OPC WITNESS ROBINETT RECOMMENDS THAT ALL ITEMS THAT GRANT**  
13 **THORNTON WAS NOT ABLE TO FIND AND VERIFY DURING THE AUDIT**  
14 **SHOULD BE REMOVED FROM SPIRE MISSOURI RECORDS. DO YOU AGREE**  
15 **WITH THIS RECOMMENDATION?**

16 A. No. Spire Missouri maintains that additional company investigation is required before  
17 simply retiring assets from the company's records. Reconciliations between systems are  
18 being completed and applicable retirements are occurring upon completion of these record  
19 reviews. An overall approach will allow better tracking and avoid any duplication of  
20 adjustments.

21 **III. AMORTIZATIONS**

22 **Q. ON PAGES 31 AND 33 OF HIS TESTIMONY, OPC WITNESS ROBINETT**  
23 **RECOMMENDS THE COMMISSION ORDER CREATION OF A REGULATORY**

1 ASSET WITH NON-RATE BASE TREATMENT AND GRANT RECOVERY OF  
2 THE NEGATIVE RESERVE BALANCE AT DECEMBER 31, 2024, FOR CAST  
3 IRON MAINS IN MISSOURI EAST. MR. ROBINETT STATES THE  
4 REGULATORY ASSET WOULD BE APPROXIMATELY \$6 MILLION TO  
5 BRING THE CURRENT RESERVE DEFICIENCY BACK TO ZERO, AND THAT  
6 THE OPC RECOMMENDS A THREE-YEAR AMORTIZATION OF THAT  
7 BALANCE. ADDITIONALLY, MR. ROBINETT STATES OPC RECOMMENDS  
8 ANY FUTURE SHORTFALL OR NEGATIVE RESERVE SHOULD ALSO BE  
9 TREATED AS A NON-RATE BASE REGULATORY ASSET AND ONLY BE  
10 GRANTED A RETURN OF NOT ON. HOW DO YOU RESPOND TO THIS  
11 RECOMMENDATION?

12 A. Spire Missouri understands Mr. Robinett’s concern but recommends that for assets without  
13 an identified retirement date any negative reserve should be addressed through an increased  
14 depreciation rate. The use of depreciation rate changes follows the accepted accounting  
15 procedure for asset cost recovery. The Company’s depreciation witness, John Spanos of  
16 Gannett Fleming is recommending an increased depreciation rate for Missouri East’s cast  
17 iron main plant account that will address the existing negative reserve balance.

18 **IV. RATE BASE TREATMENT FOR CERTAIN ASSETS**

19 **Q. OPC WITNESS ROBINETT STATES ON PAGE 32 OF HIS TESTIMONY THAT**  
20 **“SPIRE MISSOURI SHOULD BE GRANTED A NON-RATE BASE ASSET FOR**  
21 **THE RESERVE DEFICIENCY RELATED TO THE CONVERSION TO**  
22 **ULTRASONIC METERS.” DO YOU AGREE WITH MR. ROBINETT’S**  
23 **RECOMMENDATION?**

1 A. Spire Missouri agrees with Mr. Robinett’s proposed treatment of the diaphragm meter  
2 reserve deficiency but wanted to reiterate that the reserve deficiency existed prior to the  
3 introduction of the ultrasonic meters. I recommended similar treatment for this asset  
4 reserve deficiency in my direct testimony only with a shorter recovery period. For all  
5 meters not being replaced with ultrasonic technology that will remain in plant account  
6 381000, Company witness, John Spanos, is recommending a shorter service life and an  
7 increased depreciation rate to prevent this situation from reoccurring.

8 **Q. ON PAGE 32 OF HIS TESTIMONY, OPC WITNESS ROBINETT RECOMMENDS**  
9 **THE COMMISSION DISALLOW RETURN ON THE INVESTMENT IN SPIRE**  
10 **MISSOURI EAST FOR ACCOUNT 397.1 COMMUNICATION ERT/AMR,**  
11 **STATING IN HIS OPINION SPIRE MISSOURI BY ITS REPLACEMENT**  
12 **ACTIONS WILL LIKELY CREATE A RESERVE DEFICIENCY BY PLACING**  
13 **NEW MODULES ON EXISTING METERS NOT YET TO THE SAMPLING 10-**  
14 **YEAR DATE THAT WILL NOT REACH THE EXPECTED LIVES OF THE**  
15 **MODULES. DO YOU AGREE WITH THIS RECOMMENDATION?**

16 A. No. ERT module installation is necessary to move all Spire Missouri East customers off  
17 the Landis and Gyr system prior to the contract expiration. While the current plan is to  
18 replace the existing diaphragm meters with the attached ERT device when the meter  
19 reaches the ten-year age for testing, other factors could impact the treatment of these assets.  
20 The diaphragm meter and the related ERT device may be needed for any customer who  
21 opts out of using an advanced meter.

22 The Company agrees that any AMR devices included in plant account 397.1 should  
23 be treated consistent with the diaphragm meter reserve deficiency and be transferred to a

1 regulatory asset and amortized over a reasonable period. These AMR devices are  
2 dependent on use of the Landis and Gyr network so the devices will no longer be used and  
3 useful after the contract expiration.

4 **Q. ON PAGE 32 OF HIS TESTIMONY, OPC WITNESS ROBINETT RECOMMENDS**  
5 **THE COMMISSION DISALLOW 50% OF THE RETURN ON THE**  
6 **ULTRASONIC METERS IN-SERVICE TO DATE BECAUSE SPIRE'S**  
7 **CUSTOMERS HAVE NOT SEEN THE BENEFITS BECAUSE METERS ARE**  
8 **STILL BEING READ BY VAN ROUTES AND INTERVAL READING OF THE**  
9 **METERS DOES NOT HAPPEN WITHOUT THE NETWORK WHICH HAS NOT**  
10 **BEEN ESTABLISHED. DO YOU AGREE?**

11 A. No. This is an extreme recommendation inconsistent with utility ratemaking principles.  
12 The meters that OPC witness Robinett is proposing a disallowance of are used and useful.  
13 Clearly, meters are necessary for the provision of safe and reliable service to customers.  
14 Per Spire Missouri's tariff Sheet No. R-3.1, a gas meter is defined as "The meter, or meters,  
15 together with any required auxiliary devices installed to measure the quantity of gas  
16 delivered to any individual customer at a single point of entry". Advanced meters installed  
17 on customer premises are being used for tracking gas usage and providing data for  
18 generating the customer bills as defined in Spire Missouri's tariff. When meter  
19 replacements are necessary, it is appropriate to replace meters with the latest technology as  
20 opposed to continuing to use an outdated and antiquated system.



1 **Q. HOW HAVE THE METER REPLACEMENTS BENEFITED CUSTOMERS?**

2 A. The new meters are able to gather and provide daily customer usage data that is used for  
3 calculating a partial customer bill due to stoppage or start of service outside the normal  
4 billing cycle.

5 **Q. ARE ULTRASONIC METERS ALSO MORE ACCURATE THAN THE OLD**  
6 **METERS BEING REPLACED?**

7 A. Yes. The ultrasonic meter is electronic with no mechanical components and an integrated  
8 network module. The old meters are completely mechanical with multiple moving parts,  
9 which by their very nature are more prone to failures. Improved meter accuracy benefits  
10 customers and the Company alike.

11 **Q. WHAT SAFETY IMPROVEMENTS HAVE SPIRE MISSOURI AND ITS**  
12 **CUSTOMERS BENEFITED FROM?**

13 A. First, the ultrasonic meters have built in shut off for excessive gas flow. A natural gas leak  
14 in an enclosed space, i.e. a house, can cause conditions that contribute to potential fires or  
15 other hazardous situations. The pressure monitoring technology included in the ultrasonic  
16 meters helps mitigate these risks for Spire Missouri's customers. Second, the new  
17 ultrasonic meters have built in shut off for excessive heat. The meters will shut off when  
18 their internal temperature reaches 176 degrees Fahrenheit. This technology protects  
19 customers and their property in the case of a fire. Third, the new ultrasonic meters allow  
20 for near remote shut off capability. This functionality allows company resources to shut off  
21 gas flow from a distance, up to 1000 feet, rather than having to stand right next to the meter  
22 for gas stoppage.

1 **Q. DO THE ULTRASONIC METERS REQUIRE A NETWORK FOR THE**  
2 **TECHNOLOGY TO BENEFIT CUSTOMERS?**

3 A. No. The shut off safety features along with the meter read accuracy do not require network  
4 capability to be functional and was not available with the existing diaphragm meters.

5 **V. CONCLUSION**

6 **Q. DOES THIS CONCLUDE YOUR TESTIMONY?**

7 A. Yes.

**BEFORE THE PUBLIC SERVICE COMMISSION  
OF THE STATE OF MISSOURI**

In the Matter of Spire Missouri Inc. d/b/a Spire's     )  
Request for Authority to Implement a General     )  
Rate Increase for Natural Gas Service Provided     )     File No. GR-2025-0107  
In the Company's Missouri Service Areas     )

**AFFIDAVIT**

STATE OF MISSOURI                                     )  
   )     SS.  
CITY OF ST. LOUIS                                     )

Michelle Antrainer, of lawful age, being first duly sworn, deposes and states:

1. My name is Michelle Antrainer. I am Manager, Rates & Planning for Spire Missouri Inc. My business address is 700 Market St., St. Louis, Missouri 63101.
2. This affidavit is attached to my rebuttal testimony, which is filed on behalf of Spire Missouri Inc.
3. I hereby swear and affirm that my answers to the questions contained in my rebuttal testimony are true and correct to the best of my knowledge, information, and belief.

  
Michelle Antrainer

Subscribed and sworn to before me this 27 day of May 2025.

  
Notary Public

LISA M. REED  
NOTARY PUBLIC - NOTARY SEAL  
STATE OF MISSOURI  
MY COMMISSION EXPIRES DECEMBER 12, 2027  
ST. CHARLES COUNTY  
COMMISSION #11265169

**Spire Missouri  
GR-2025-0107**

**Response to Data Request 0229.1**

**Question:**

For each and every recommendation in the Grant Thornton Independent Evaluator Report Spire Missouri Inc. Continuing Plant Records Audit dated February 2025, please indicate whether the Company intends to implement the recommendation and the timeline or anticipated timeline for completion.

Requested by Claire Eubanks ([claire.eubanks@psc.mo.gov](mailto:claire.eubanks@psc.mo.gov)).

**Response:**

**5.1 Reconciliation between Systems – High Risk**

**Recommendation:** Spire should consider periodic (e.g., monthly, or quarterly) reconciliations to ensure their meter count on the Asset Register is complete and accurate. Furthermore, Spire should perform a mass retirement of the identified meters that are no longer in service or no longer in Spire's possession to properly align Maximo with the Asset Register. Additionally, Spire should consider configuring both Maximo and the Asset Register (PowerPlan) to automatically reduce the Asset Register when a meter is retired in Maximo.

**Spire Response:** A one-time mass retirement for meters is currently being performed based on an asset reconciliation between Maximo and Power Plan. See the 0229.2 DR response for timing related to these adjustments.

Spire's Director of Measurement will develop a documented procedure by mid-April 2025, that will include a semi-annual system reconciliation plan. The procedure will be based on the process completed to perform the reconciliation related to the one-time mass retirement.

Automating the cross-system retirement process will be reviewed by the Company to determine the cost to implement this recommendation.

**5.2 Retirement Process – High Risk**

**Recommendation:** Spire should establish a more defined policy for retiring meters from the Asset Register related to the inspection and determination of sending to a recycler or to Honeywell and retiring the meter at the conclusion of the inspection. Doing so could reduce meter retirement processing times, increase transactional efficiency, and more accurately align all meter assets across all systems. Specifically, Spire should ensure that once the meter inspection has been concluded, the status in Maximo should be promptly updated from "out of service" to "retired" as part of the inspection process to eliminate any delays in the retirement process.

**Spire Response:** Historically, meter retirements were tied to the meter testing process for all of Missouri operations. Spire is investigating the option to retire the meters sooner in the process, i.e. when the meters are sent out for testing purposes instead of when the test results are received from the third-party vendor. This change would decrease the time necessary for financial asset retirements to occur. System updates are required to implement this process change and are being documented.

Spire's Director of Measurement will develop a documented procedure by mid-April 2025, that will include a semi-annual system reconciliation plan. The procedure will be based on the process completed to perform the reconciliation related to the one-time mass retirement.

### **5.3 Returned Meters – High Risk**

**Recommendation:** Spire should implement a well-defined routine and proactive program for meter testing, resetting, and preparation. This will ensure the meters are field-ready in a timely manner, reducing the buildup of returned meters in the warehouse.

**Spire Response:** A plan is being developed to begin processing the returned meters. The meter processing will require a comprehensive inspection to determine the cause for the meter return – technician error or malfunction of the unit. The goal of this plan is to work through meters returned to the shop through calendar year 2024. This will allow management to refine the process and determine the capacity needed to work through the backlog. Future procurement needs will be offset by the expected inventory that will be generated by this process.

### **5.4 Asset Validation – High Risk**

**Recommendation:** Spire should consider implementing a routine validation process for meters that have been inactive for over 180 days to ensure accuracy and compliance (i.e., Badge number verification, locked gas valves, etc.).

**Spire Response:** The company is working to define an inactive meter removal policy that sets thresholds which will trigger the meter removal process. These thresholds will be based on an inactive customer status and the length of time since the customer had an active service agreement. Spire plans to utilize the resources completing meter replacements for Missouri East when the resource is awaiting appointment scheduling.

### **5.5 Meters - Asset Addition – Medium Risk**

**Recommendation:** Spire should consider exploring the possibility of implementing an automated data validation process for loading assets into their system that can systematically cross-check serial numbers between the bill of lading and the vendor reports. Implementing this upgrade can address the delays and potential errors caused by manual uploads, ensuring meters are accurately recorded before being issued to the floor.

**Spire Response:** Spire uploads a vendor file that is sent with each shipment that documents the individual meters received. The upload program runs an automated verification between Maximo and CC&B upon completion. The current procedure requires that newly received meters be quarantined until they have been loaded and confirmed in the billing system. The meter must be valid in CC&B at the time of installation. This validation in the completion form will prevent the installation of any meter that may have bypassed this procedure today. The Company feels adherence to the existing procedure adequately addresses this risk.

## **5.6 Meter Inventory Tracking – Medium Risk**

**Recommendation - MOW:** Spire should consider creating specific inventory locations within Maximo to adequately account for meters at each distinct warehouse. Additionally, movements or transfers between warehouses should be tracked within Maximo and supporting documentation, such as the bill of lading, reflecting the transaction and that they are independently prepared and retained.

**Recommendation - MOE:** Spire should develop a system of meter categorization at the CarrLane and Sunnen warehouses and conduct regular inventory counts that can be integrated into Maximo to reduce integration, transfer, and consumption/usage discrepancies. Implementing this system across their warehouses could enhance operational efficiency and ensure optimal use of inventory to potentially reduce the risk for overordering. Spire should also ensure routine inventory calibrations are performed across their warehouses and enhance existing policy or establish a new policy requiring all warehouse managers to provide warehouse inventory counts on all items weekly to promote more accurate inventory and further reduce the risk of overordering. Furthermore, Spire should swap all aged inventory stored in Sunnen and move it to CarrLane so that the aged inventory can follow the FIFO methodology to avoid aging out new inventory.

**Spire Response:** For MO East, the biggest risk to transitioning off the Landis and Gyr network by April 1, 2025, has been the procurement of sufficient meter equipment to support the varied availability of resources to do the work. Spire knew we had to procure inventory that would exceed the storeroom's capacity. This has led to excess capacity stored in Measurement warehouses used mostly for larger meter sizes. Measurement will perform a one-time reconciliation of non-storeroom ultrasonic inventory and a plan to document the movement of this equipment by mid-April 2025. This will be an interim policy with the intent of transitioning all ultrasonic meter inventory management back under Supply Chain in Oracle inventory by October 1, 2025.

For MO West, inventory of ultrasonic meters is set up by pallet in Oracle and is designed to move inventory between official warehouse sites. Meters are issued out of the warehouse for use by pallet and are documented in Oracle. This is non valued inventory and is a work management solution designed to give high level visibility to the number

and location of meters available for use. An inventory reconciliation will be completed by mid-April 2025 and the existing procedure will be reviewed and followed from that point forward. Maximo is an asset management system designed to track individual meters and their status, not manage inventory.

### **5.7 Automated Retirement Process – Medium Risk**

**Recommendation:** Spire should consolidate and standardize their processes and procedures between MOW and MOE to improve efficiency. Specifically, MOE should institute the same automated retirement procedures as MOW.

**Spire Response:** The Company is determining the feasibility of automating the MO East meter retirements. The MO West process was in place at the time of acquisition and the process was adapted for the new systems. The details available for historical MO West purchases differ from the data available for historical MO East purchases. The data differences have required the MO East process to include manual verification.

### **5.8 Automatic Meter Reading – Low Risk**

**Recommendation:** Spire should develop a methodological route testing procedure to effectively validate both meter testing and failure testing simultaneously. Integrating failure testing into the routine meter reading process will allow Spire to ensure that any issues are identified and addressed in real-time, minimizing the risk of prolonged discrepancies. Additionally, Spire should consider implementing a policy/procedure requiring meters read failures to trigger investigation and remediation within a reasonable timeframe. Furthermore, Spire should consider developing a more formal process for gathering data on skipped meter reads, such as a connected tablet, rather than the Spire employee capturing the manual reads on pen and paper. Lastly, Spire should consider instituting additional technician training to ensure testing of the meter is done prior to leaving the installation site.

**Spire Response:** Spire Mo East utilized a vendor for meter reading on the current network. The maintenance continued to this third-party during deployment to maximize Spire resources' capacity to replacement of meters to support the transition off the network in April 2025. The inefficiencies of a third party led to establishing an internal maintenance team beginning in October 2024 for ultrasonic meters. Two Spire technicians were trained and equipped to investigate meter issues encountered during the monthly meter reading process. The technicians conduct investigations daily and communicate their findings to Measurement. Additional technicians were trained in January 2025 to cover other area operations. The Company is reviewing the cause of these issues to determine the next steps to minimize the length of time from discovery to resolution.

In MO West, the meter maintenance program is organized around the technology used prior to installation of ultrasonic meters. This does lead to technicians needing additional

training and equipment for one visit resolution of issues they encounter. The meter maintenance program that has started in MO East is being formalized for the purpose of incorporating the same process throughout Missouri.

### **5.9 Asset Validation – Low Risk**

**Recommendation:** Spire should consider implementing a routine validation process for meters that have been inactive for over 180 days to ensure accuracy and compliance (i.e., Badge number verification, locked gas valves, etc.). Additionally, Spire should perform routine cross check against meter flows on inactive meters.

**Spire Response:** The company is working to define an inactive meter removal policy that sets thresholds which will trigger the meter removal process. These thresholds will be based on an inactive customer status and the length of time since the customer had an active service agreement.

### **6.1 Reconciliation of Systems – High Risk**

**Recommendation:** Spire should consider periodic (e.g., monthly, or quarterly) reconciliations between GIS, Asset Register, and Maximo data to identify and correct discrepancies early on. Spire should ensure that the Maximo as built and Maximo actuals are consistent to ensure the reconciliation reduces discrepancy occurrences.

**Spire Response:** Spire plans to develop business intelligence reporting to show the GIS, Maximo actuals, and Power Plan pipe segment footage on all future work orders to verify that they are in sync. This review will be completed monthly and reconcile for any data entry errors between the responsible departments. The discrepancy on the abandoned footage is due to using a shape length field on pipe segments because of prior limitations in the GIS system and legacy data. New functionality in GIS as of a year ago allows the Company to measure abandoned footage on a more detailed basis.

### **6.2 Footage Measurement – Low Risk**

**Recommendation:** Spire should consider periodic (e.g., monthly, or quarterly) reconciliations between GIS, Asset Register, and Maximo data to identify and correct discrepancies early on. Spire should ensure that the Maximo as built, and Maximo actuals are consistent with each other to ensure the reconciliation does not identify any other discrepancies.

**Spire Response:** Spire plans to develop business intelligence reporting to show the GIS, Maximo actuals, and Power Plan pipe segment footage on all future work orders to verify that they are in sync. This review will be completed monthly and reconcile for any data entry errors between the responsible departments.

Signed by: Michelle Antrainer