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MISSOURI PUBLIC SERVICE COMMISSION

FILE NO. ER-2022-0337

REBUTTAL TESTIMONY

OF

MATT MICHELS

ON

BEHALF OF

UNION ELECTRIC COMPANY

D/B/A AMEREN MISSOURI

St. Louis, Missouri February, 2023

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1		I. INTRODUCTION		
2	Q.	Please state your name and business address.		
3	А.	My name is Matt Michels. My business address is One Ameren Plaza, 1901		
4	Chouteau Ave., St. Louis, Missouri.			
5	Q.	Are you the same Matt Michels that submitted direct testimony in this		
6	case?			
7	А.	Yes, I am.		
8	Q.	To what testimony or issues are you responding?		
9	А.	My rebuttal testimony responds to Sierra Club witness Tyler Comings regarding		
10	future investments in the Company's Sioux Energy Center ("SEC") and Labadie Energy Center			
11	("LEC") and Office of Public Counsel ("OPC") witness Jordan Seaver regarding generating			
12	capacity and reliability.			
13	II. SIE	RRA CLUB'S PROPOSAL REGARDING FUTURE INVESTMENTS		
14		IN SEC AND LEX ARE INAPPROPRIATE AND PREMATURE		
15	Q.	What does Sierra Club witness Comings recommend with respect to the		
16	Company's f	uture investments in SEC and LEC?		
17	А.	Witness Comings recommends that the Commission compel the Company to		
18	evaluate the 1	relative economics of early retirement of the SEC and LEC units compared to		

environmental retrofits or other mitigation that may be needed to comply with regulations
 proposed by the U.S. Environmental Protection Agency ("EPA").

3 Q. Is this case the appropriate avenue for the suggestion of such actions by the
4 Commission?

A. No. The recommendations of witness Comings would be appropriate for consideration in proceedings pursuant to the Commission's Chapter 22 Integrated Resource Planning ("IRP") rules, not in a rate proceeding. Witness Comings' recommendations clearly contemplate *future* resource planning decisions which may be made by the Company (if necessary and appropriate), not the prudence of test year costs for which the Company is seeking rate recovery.

Q. Does Sierra Club have an opportunity to make suggestions regarding analysis the Company should perform as part of its IRP process?

A. Yes. The Commission's IRP rules include a provision by which Sierra Club and other stakeholders may suggest issues for utilities to address and analyses for utilities to perform as part of their IRP processes.¹ Such suggestions can be made for both triennial IRP filings and IRP annual updates.

Q. Did Sierra Club suggest that the Commission require Ameren Missouri to address in any IRP filings the issues it raises in this case?

A. Partly. Sierra Club suggested that the Commission require the Company as part of its 2023 IRP analysis to "Analyze and document the net present value of continuing to operate each of Ameren's coal-burning units, including consideration of known and potential compliance costs. Ameren should be ordered to study whether retaining each unit

¹ 20 CSR 4240-22.080(4).

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1	in operation benefits customers in comparis-on with an alternative suite of resources." ²		
2	While the suggestion did not explicitly cite analysis related to EPA's proposed "Good		
3	Neighbor Rule," it would be fair to conclude that consideration of such a rule is implied by		
4	consideration of "potential compliance costs." No suggestion was made to require the		
5	Company to track investments that could be avoided in conjunction with a decision to		
6	accelerate the retirement of coal-fired units, as Witness Comings is recommending in this		
7	case.		
8	Q. Did the Commission include the evaluation Sierra Club suggested in its		
9	order regarding analysis and issues the Company must address in its 2023 IRP?		
10	A. No.		
11	Q. Does the Company normally evaluate options for compliance with		
12	environmental regulations as part of its IRP process?		
13	A. Yes. Environmental compliance is an integral part of resource planning. The		
14	Company includes an entire chapter on existing and potential environmental regulations,		
15	potential mitigation options, and associated costs in its triennial IRP filings and includes updated		
16	discussions of environmental compliance and mitigation in its IRP annual update filings.		
17	Q. Will the Company be evaluating compliance with the "Good Neighbor		
18			
	Rule" as part of its 2023 IRP analysis?		
19	Rule" as part of its 2023 IRP analysis? A. Yes, and the Company's analysis will be based on the best information available		
19 20			
	A. Yes, and the Company's analysis will be based on the best information available		

² File No. EO-2022-0099, Sierra Club's List of Suggested Special Contemporary Issues, page 2, item 3.

1	Q.	Does the Company evaluate accelerated retirement of coal-fired
2	generators as	s part of its IRP analysis as well?
3	А.	Yes. Ameren Missouri has included evaluation of early retirement of coal-fired
4	energy centers	s in its IRP filings, including its triennial IRP filings in 2014, 2017 and 2020 and
5	its Notice of C	Change in Preferred Resource Plan filed in June 2022.
6	Q.	Does the Company's analysis of accelerated coal unit retirements include
7	an assessmen	t of changes in the need for investment in the units in the case of accelerated
8	retirement?	
9	А.	Yes. The Company develops explicit capital investment assumptions for each
10	retirement da	te evaluated. A comparison of the assumed investments for two different
11	retirement dat	es would thus indicate those investments that are needed for the later of the two
12	retirement dat	es that could be avoided for retirement at the earlier of the two dates.
13	Q.	Witness Comings' direct testimony includes a list of issues that Sierra Club
14	asserts must	be remedied by the Company with respect to its IRP analysis and preferred
15	resource plar	a. Are these issues relevant to the Company's request in this case?
16	А.	No. The alleged issues noted by Witness Comings are all related to resource
17	planning decis	sions that the Company may make in the <i>future</i> and are unrelated to the costs for
18	which the Cor	npany seeks rate recovery in this case.
19	Q.	What do you conclude regarding Witness Comings' recommendations in
20	this case?	
21	А.	The recommendations of Witness Comings are inappropriate for consideration
22	in a rate proce	eeding and would instead be appropriate for consideration in an IRP proceeding.
23	Witness Com	ings' recommendations are also premature with respect to questions of prudence

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1	in future rate proceedings due to their prospective nature. The Commission should reject these		
2	recommendations.		
3	III. THE COMPANY IS FOCUSED ON RELIABILITY AND INCLUDES		
4	CONIDERATION OF THE KINDS OF CONCERNS RAISED BY OPC IN ITS		
5	IRP PLANNING		
6	Q. What does OPC Witness Seaver express in their direct testimony		
7	regarding Ameren Missouri's need for generating capacity?		
8	A. Witness Seaver expresses concerns regarding the reliability implications of the		
9	Company's renewable energy resource additions, the potential for changes in MISO's		
10	accreditation for renewable resources, and the sufficiency of the Company's planned portfolio		
11	of dispatchable resources to ensure reliability.		
12	Q. How is the Company addressing these concerns?		
13	A. Ameren Missouri's portfolio, as represented in its current IRP preferred resource		
14	plan, is designed to rely on a mix of resources to meet customers' energy needs and mitigate		
15	risks associated with the transition of the Company's portfolio from one that relies heavily on		
16	generation from fossil-fueled resource to one that relies on a cleaner mix of resources. The		
17	Company's approach to planning and its rationale for its planned resource mix are discussed in		
18	detail in the Company's 2020 IRP filing, ³ its June 2022 Notice of Change in Preferred Resource		
19	Plan, ⁴ and in testimony in the Company's application for a certificate of convenience and		
20	necessity for a new solar energy center. ⁵		

³ File No. ER-2021-0021 ⁴ File No. EO-2022-0362 ⁵ File No. EA-2022-0245

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1 In short, the Company is seeking to significantly expand its portfolio of renewable wind 2 and solar energy resources to address risks associated with changes that have occurred (or will 3 soon occur, when Rush Island retires) to its generating fleet, and risks associated with climate 4 change and climate policy while also maintaining sufficient dispatchable resources to ensure 5 reliability at times when wind and solar resources produce less electric energy. The need for 6 renewable energy resources is evaluated based on the Company's forecasts of customer energy 7 needs and the range of expected energy production from its existing and expected fleet of 8 resources under various market conditions. To ensure that dispatchable resource will be 9 sufficient to ensure reliability, the Company evaluates its resources needs based on the resource 10 adequacy requirements established by MISO, its need for energy in all seasons, and also based 11 on explicit and rigorous reliability modeling that accounts for variability in loads and renewable 12 generation. The evaluation of MISO resource adequacy requirements includes evaluation of 13 seasonal loads and resource capabilities under MISO's new seasonal resource adequacy 14 construct, which was approved by FERC⁶ in August 2022.

Q. Witness Seaver indicates an expectation that the capacity accreditation of renewable resources is expected to decline over time and that MISO's capacity accreditation for renewable resources does not reflect this expectation. How do you respond?

19 A. I agree with Witness Seaver that the accredited capacity for renewable resources 20 is expected to decline over time. While MISO has yet to provide guidance with respect to the 21 magnitude and pace of such declines, it has provided indications for expected declines in the

⁶ Federal Energy Regulatory Commission

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1 reliable capacity of wind generation in prior Loss-of-load Expectation (LOLE) studies, which 2 are used to determine required planning reserve margins necessary to ensure resource reliability. 3 In addition, the detailed reliability modeling conducted by Ameren Missouri and its 4 expert consultants, Astrape' Consulting, explicitly accounts for the intermittent nature of wind 5 and solar resources and the variability of output under various weather conditions. This 6 modeling led the Company to include additional dispatchable resources in its current IRP 7 preferred resource plan, including a 1,200 MW natural gas-fired combined cycle energy center 8 to be placed in service concurrent with the retirement of the Sioux Energy Center at the end of 9 2030, the deployment of 800 MW of battery storage resources, and another 1,200 MW of 10 dispatchable generation using one or more of a range of cleaner electric generating technologies 11 that are expected to be developed in the coming years.

Q. What kinds of risks does Ameren Missouri's IRP process address with respect to the transition of its portfolio?

14 A. There are a number of risks that the Company considers as part of its planning 15 process and for which it builds in a "buffer" of resource additions as a measure of mitigation. These include the potential for changes in environmental regulation, climate policy, unexpected 16 17 events, increasingly severe weather, market conditions that may drive decisions to accelerate 18 the retirement of remaining coal-fired generation, the potential for increased loads due to 19 electrification, uncertainty regarding the achievement of energy and demand savings from 20 future demand-side programs, and challenges facing the implementation of new resource 21 additions such as permitting, regulatory approvals, transmission interconnection, land 22 availability, and financing. The Company believes that it is important to take steps to mitigate 23 these risks and not plan to simply meet the minimum planning reserve margins just in time and Rebuttal Testimony of Matt Michels

- 1 under only currently projected circumstances that assume base or normal conditions when, we
- 2 know, that operations in real time are not always normal.
- 3 Q. Does the Company plan to continue to consider these and other risks as 4 part of its planning to ensure sufficient resources to meet reliability under a range of 5 potential conditions? 6 A. Yes. The Company is currently preparing its 2023 IRP, which is due to be filed 7 with the Commission no later than October 1st of this year. Its IRP process continues to include 8 consideration of these and other risks that may be identified, and the Company continues to 9 evaluate its resource needs not only in the context of MISO's resource adequacy construct but
- 10 also through more rigorous modeling and analysis of potential conditions.
- 11 **Q.** Does this conclude your rebuttal testimony?
- 12 A. Yes, it does.

BEFORE THE PUBLIC SERVICE COMMISSION OF THE STATE OF MISSOURI

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In the Matter of Union Electric Company d/b/a Ameren Missouri's Tariffs to Adjust) Its Revenues for Electric Service.

Case No. ER-2022-0337

AFFIDAVIT OF MATT MICHELS

STATE OF MISSOURI)) ss **CITY OF ST. LOUIS**)

Matt Michels, being first duly sworn states:

My name is Matt Michels, and on my oath declare that I am of sound mind and lawful age;

that I have prepared the foregoing Rebuttal Testimony; and further, under the penalty of perjury,

that the same is true and correct to the best of my knowledge and belief.

/s/ Matt Michels Matt Michels

Sworn to me this 15th day of February, 2023.