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October 7, 2014

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Via Federal Express

Mr. Jeff Derouen Executive Director Public Service Commission 211 Sower Boulevard, P.O. Box 615 Frankfort, Kentucky 40602-0615 OCT 0 8 2014

PUBLIC SERVICE COMMISSION

RE: BIG RIVERS ELECTRIC CORPORATION'S FILING OF WHOLESALE CONTRACTS PURSUANT TO KRS 278.180 AND 807 KAR 5:011 §13, CASE NO. 2014-00134

Dear Mr. Derouen:

Enclosed for filing in this matter on behalf of Big Rivers Electric Corporation ("*Big Rivers*") are originals and ten copies of the rebuttal testimonies of Lindsay Barron and John Wolfram. I certify that copies of this filing have been served this day by overnight courier on each of the persons shown on the attached service list.

Big Rivers gives notice pursuant to 807 KAR 5:001§13(9) that material originally submitted by Big Rivers in this matter for which confidential treatment has been granted or sought is redacted in the public version of the rebuttal testimony of Lindsay Barron, and one copy of the relevant pages of her rebuttal testimony with that confidential material highlighted in yellow is also included with this filing.

- 1. Certain of the confidential materials redacted from the rebuttal testimony of Lindsay Barron were granted confidential treatment by order of the Public Service Commission ("Commission") in this matter dated September 10, 2014.
- 2. Certain of the confidential materials redacted from the rebuttal testimony of Lindsay Barron are the subject of a petition for confidential treatment filed by Big Rivers on July 15, 2014, in

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connection with its responses to the initial round of information requests from the Commission and the intervenors.

Certain of the confidential materials redacted from the rebuttal testimony of Lindsay Barron are the subject of a petition for confidential treatment filed by Big Rivers on August 12, 2014, in connection with its responses to the supplemental round of information reguests from the Commission and the intervenors.

Please feel free to contact me if you have any questions regarding this filing.

Sincerely yours,

James M. Miller

James In . miller

Counsel for Big Rivers Electric Corporation

JMM/lm Enclosures

cc: Billie Richert, Big Rivers Electric Corporation DeAnna Speed, Big Rivers Electric Corporation

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Service List PSC Case No. 2014-00134

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COMMONWEALTH OF KENTUCKY

BEFORE THE PUBLIC SERVICE COMMISSION

In the Matter of:

BIG RIVERS ELECTRIC CORPORATION FILING OF WHOLESALE CONTRACTS PURSUANT TO KRS 278.180 AND 807 KAR 5:011 § 13

) Case No. 2014-00134

RECEIVEL

OCT 08 2014

PUBLIC \$ERVICE COMMISSION

REBUTTAL TESTIMONY

OF

LINDSAY N. BARRON VICE PRESIDENT, ENERGY SERVICES

ON BEHALF OF

BIG RIVERS ELECTRIC CORPORATION

FILED:

October 8, 2014

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2		OF
3		LINDSAY N. BARRON
4		
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23		APPROVED AS SOON AS POSSIBLE
24	v.	CONCLUSION
25		
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1 2 3 4		REBUTTAL TESTIMONY OF LINDSAY N. BARRON
5	I.	INTRODUCTION
6	Q.	Please state your name, business address, and position.
7	A.	My name is Lindsay N. Barron. I am employed by Big Rivers Electric Corporation
8		("Big Rivers"), 201 Third Street, Henderson, Kentucky 42420, as Vice President,
9		Energy Services.
10	Q.	What is your involvement in the development of the Nebraska agreements and
11		this proceeding?
12	A.	I was the Big Rivers representative in the negotiation of the three agreements that are
13		the subject of this proceeding. The "Summary of Nebraska PPAs" was prepared under
14		my direction, and I have responded to certain information requests issued to Big Rivers
15		in this proceeding.
16	Q.	Have you previously testified before the Kentucky Public Service Commission?
17	A.	Yes. I have testified before the Kentucky Public Service Commission ("Commission")
18		several times, most recently in Case No. 2012-00535 and Case No. 2013-00199.
19		
20	II.	PURPOSE OF TESTIMONY
21	Q.	What is the purpose of your rebuttal testimony in this proceeding?
22	A.	This testimony supports the reasonableness of the Nebraska agreements by rebutting
23		the "Attorney General's Comments In Lieu of Testimony" ("AG Comments") filed by
24		the Office of the Attorney General of Kentucky ("Attorney General"), and the
25		testimony of Mr. Lane Kollen filed by Kentucky Industrial Utility Customers, Inc.

1		("KI	UC," and collectively with the Attorney General, the "Opposing Intervenors").
2		Spec	cifically, I will rebut the Opposing Intervenor arguments and explain (a) why the
3		term	s of the Nebraska Agreements are reasonable and should be approved by the
4		Com	amission, and (b) why the Commission should review and approve the Nebraska
5		Agre	eements without delay.
6			
7	III.		E TERMS OF THE NEBRASKA AGREEMENTS ARE REASONABLE AND DULD BE APPROVED BY THE COMMISSION
9	Q.	Plea	se identify the agreements for which approval is sought.
10	A.	The	agreements for which approval is sought are:
11			Market Based Rate Partial and Full Requirements Agreement dated as of
12			December 20, 2013, by and between Big Rivers and Northeast Nebraska Public
13			Power District, as amended by Amendment No. 1 dated as of May 27, 2014
14			("NeNPPD Agreement");
15			Market Based Rate Partial and Full Requirements Agreement dated as of
16			December 20, 2013, by and between Big Rivers and City of Wayne, Nebraska,
17			as amended by Amendment No. 1 dated as of June 11, 2014 ("Wayne
18			Agreement"); and
19			Market Based Rate Partial and Full Requirements Agreement dated as of
20			December 31, 2013, by and between Big Rivers and City of Wakefield,
21			Nebraska, as amended by Amendment No. 1 dated as of June 11, 2014
22			("Wakefield Agreement," and together with the NeNPPD Agreement and the
23			Wayne Agreement, the "Nebraska Agreements" with the "Nebraska Entities").

A. REASONABLE	TRANSACTION TERMS
---------------	-------------------

2	Q.	Both the Attorney General and the KIUC suggest that the terms of the Nebraska
3		Agreements are unreasonable. Please summarize why Big Rivers believes the
4		terms of the Nebraska Agreements are reasonable.

Big Rivers' Load Concentration Analysis and Mitigation Plan ("Mitigation Plan") envisioned a diverse portfolio of power supply contracts, the margins from which would contribute to the fixed costs of Big Rivers operations currently being funded by Big Rivers' Members. Diversity of the portfolio is important, as the rating agencies have viewed the load concentration with the aluminum smelters as a key negative rating driver.

The Nebraska Agreements are reasonable because (a) they will provide a significant contribution to Big Rivers' fixed costs that will not have to come from Big Rivers' Members, (b) the Nebraska load is primarily stable residential and small commercial load, and (c) they provide diversity to Big Rivers' power portfolio and a long-term stable revenue stream that will prove beneficial, including helping in the effort to restore Big Rivers' investment grade credit ratings with the rating agencies. Big Rivers' view of the reasonableness of the Nebraska Agreements is supported by the confidential study performed for Big Rivers by ACES titled "Valuation and Risk Assessment of Energy and Capacity Sale to Nebraska Entities for Big Rivers Electric Corporation-October 30, 2013" (the "ACES Study").

A.

1	Q.	What margin does Big Rivers expect to receive from the Nebraska Agreements?
2	A.	Based on the valuation estimate supplied by ACES in its study, the proposed Nebraska
3		transactions studied were expected to add more than \$ in contribution to
4		fixed costs over the contract period.
5	Q.	Does the \$ contribution you just referenced include margins from an
6		originally-anticipated sale to the City of South Sioux that has not materialized?
7	A.	Yes. As stated in the ACES Study, that study is based upon transactions that include
8		South Sioux. The discussions regarding the \$ number have all been in the
9		context of the ACES Study. If the margin increment attributable to South Sioux is
10		subtracted, the actual contribution to margins in the ACES Study from the remaining
11		three entities that are parties to these Nebraska Agreements is an estimated \$
12		This estimate is based upon total estimated revenues of \$, and total
13		estimated expenses of \$, as can be calculated in the spreadsheet included in
14		the confidential electronic attachment to the response of Big Rivers to AG 2-1(file Big
15		Rivers – NeNPPD Transaction Summary Final.xlsx).
16	Q.	Has the City of South Sioux City chosen a supplier for their future power supply
17		at this time?
18	A.	No, not yet. South Sioux City continues to consider several suppliers, including Big
19		Rivers.
20	Q.	If South Sioux City chooses Big Rivers as a supplier, will Big Rivers file the
21		agreement with Sioux City with the Commission for approval?
22	A.	Yes. We would submit the new agreement to the Commission and the Rural Utilities
23		Service ("RUS")

1	Q.	Did you submit the Nebraska Agreements to the RUS for review?
2	A.	Yes. RUS approved the three Nebraska Agreements on September 9, 2014.
3		
4		B. <u>INDEX PRICING</u>
5	Q.	Why do you have confidence that indexing the rates in the Nebraska Agreements
6		to the rates of the Nebraska Public Power District ("NPPD") will produce the
7		margins you have forecasted?
8	A.	The analysis conducted by ACES made conservative assumptions regarding the
9		valuation of the Nebraska Agreements. The assumption for
10		
11		. As such, Big Rivers considers it quite
12		likely that NPPD's cost-based rates will increase at least as much as projected, if not
13		more. Likewise, the discussed in the
14		ACES Study is currently significantly greater than
15		in the ACES Study, the
16		
17	Q.	On page 3 of the AG Comments, the Attorney General laments that "the contract
18		rate L
19		On page 23 lines 7-8 of his testimony, Mr. Kollen states that "it is not
20		prudent or reasonable for Big Rivers to price PPA sales to the load
21		based on
22	A.	No. In this case, it is reasonable for Big Rivers to index the pricing in the Nebraska
23		Agreements to the tariff rates of NPPD. Indexing to the rates of NPPD will produce

1		steady revenues. Tariffed utility rates are cost-based, and are not prone to the more
2		significant volatility of over-the-counter energy market prices, which vary closely with
3		commodity prices. In other words, tariff rates generally change less frequently than
4		market rates. When tariff rates do change, they typically increase rather than decrease,
5		which reduces the risk to Big Rivers of indexing to a tariff rate. Remember that the
6		reasons the Nebraska Entities began looking for other power suppliers were their
7		concerns about NPPD's future rates after NPPD released an analysis indicating the
8		potential to spend \$1.5 billion to comply with EPA environmental requirements.
9		Further reducing this risk is the fact that tariff rates are cost-based, and as such, they
10		have a floor. Locational marginal prices in integrated RTO markets, on the other hand,
11		are not based on a single utility's cost to serve, and can reach levels lower than typical
12		average cost-based rates, particularly in the off-peak periods.
13		
14		C. THE ACES STUDY
15	Q.	The ACES Study has been filed in this matter in response to Commission Staff
16		information request PSC 1-3. Mr. Kollen states on page 26 line 12 of his testimony
17		that
18		. Does ACES
19		?
20	A.	No. As noted in the study, Big Rivers asked ACES to evaluate the potential margins
21		available from, and identify any risks associated with, the proposed transactions with
22		the Nebraska Entities. Big Rivers did not ask ACES
23		. As ACES notes in the study,

1		
2		
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5		
6		Big Rivers did not request ACES
7		. Big Rivers believes the ACES
8		study . Mr. Kollen
9		implies that ACES,
10		which is simply not true.
11	Q.	Mr. Kollen states on page 27 line 6 that for the Nebraska Agreements, "the ACES
12		analysis projects Is there a
13		in the ACES Study?
14	A.	No, there is no in the ACES Study.
15		
16		. The terms
17		. By using the
18		term Mr. Kollen implies that by doing nothing, Big Rivers will
19		. This is incorrect. The
20		in the ACES Study is a "what if" case; a sensitivity. It is
21		not and was not an available transactional alternative to the Nebraska Agreements.

1	Q.	Mr. Kollen further asserts on page 27 line 5 of his testimony that there is "no
2		benefit" to the Nebraska Agreements Is this
3		correct?
4	A.	No. The assertion that
5		
6		. In addition, the Nebraska
7		Agreements sales provide a hedge against market prices for Big Rivers and its
8		Members. A diversified portfolio is a positive for any investor and Big Rivers'
9		Members are no different. The Nebraska Agreements sale is a small sale, but as part of
10		a larger portfolio, it will be a good fit and provide diversification and a hedge against
11		the volatility of the electricity market. The rates of NPPD almost certainly will be less
12		volatile than the forward electricity market price curve. Implementing hedges over the
13		coming years will reduce Big Rivers' Members' risk.
14		Likewise, the price at which the Nebraska Entities would purchase power today
15		is much higher than market. The projected market prices assumed in Big Rivers'
16		analysis show significant value for its Members in the future; however, the
17		
18		and there are currently no comparable, long-term bilateral capacity or energy
19		transactions available in the market. If Big Rivers were able to transact at prices in
20		excess of the Nebraska contract at this time, Big Rivers would have already done so.
21		Again, hedging over a number of years will allow Big Rivers to procure sales over a
22		period of time, allowing diversity in load, contract length, structure and price.

1	Q.	Mr. Kollen repeatedly asserts that the Nebraska Agreements will cause Big Rivers
2		to lose margins . He
3		even claims on page 19 and 20 that
4		
5		Are these characterizations reasonable?
6	A.	No. As I point out above,
7		
8		
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10		
11		
12		Mr. Kollen unreasonably implies that the ACES Study supports his contention
13		that there is a reasonable risk that
14		
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1	Q.	Is Mr. Kollen accurate when he says on page 26 of his testimony that there "is no
2		downside risk" from selling power into MISO on a day-ahead basis versus the
3		transaction contained in the Nebraska Agreements?
4	A.	No. One obvious downside that I have already pointed out is that Big Rivers
5		
6		Another is that the prices in the MISO forward market can decline from currently-
7		forecasted levels; they are not cost-based like the NPPD rates. As I have pointed out in
8		this rebuttal testimony, there are distinct advantages to Big Rivers and its Members
9		from the Nebraska Agreements that do not exist in the option of selling into MISO on a
10		day-ahead basis. There is no question, however, that sales into MISO will be a
11		component of Big Rivers' portfolio going forward. But Big Rivers will continue to
12		strive to develop a diversified portfolio of sales that will enable Big Rivers to hedge its
13		market and customer risk, generate stable revenue streams for the future, and bring
14		optimal value to its Members.
15	Q.	Is Mr. Kollen correct when he says on page 16 of his testimony that the loss of one
16		or more of Big Rivers' generating units is a "significant risk factor" for the
17		Nebraska Agreements?
18	A.	No. The risk of generation loss is no more significant for the Nebraska Agreements
19		than it is for any other off-system sale, including sales into MISO that Mr. Kollen
20		supports.
21		
22		

1	Q.	Mr. Kollen goes on to characterize sales into MISO as "not comparable to the
2		obligation to serve regardless of the economics" (page 25), not requiring "selling at
3		a loss if the Company's costs to generate or purchase power are greater than the
4		revenues" (page 25), and inherently more flexible because "they can be curtailed
5		or terminated" (page 31). Are these characterizations accurate?
6	A.	No. Mr. Kollen paints a risk-free picture of the MISO market that is inaccurate. No
7		sale of power is risk-free. In any given hour, a firm sale into MISO is no "less firm"
8		than the sale under the Nebraska Agreements. The obligation to serve, even at a loss, is
9		the same for the Nebraska Agreements sale and a firm sale into the MISO market;
10		neither sale can simply be curtailed or terminated arbitrarily by Big Rivers. Mr. Kollen
11		considers the short terms of MISO forward sales to be an advantage, while Big Rivers
12		views the short terms of MISO forward sales to be a potential risk that should be
13		hedged against, when possible, with sales like the proposed Nebraska Agreements
14		transactions.
15		
16		D. <u>MERCHANT GENERATION</u>
17	Q.	The Attorney General claims on page 4 of the AG Comments that Big Rivers "will
18		be engaging in unregulated merchant generation" which is exposed to "enormous
19		risks" from which Big Rivers is unlikely to be able to shield its ratepayers. Do you
20		agree with this characterization?
21	A.	No. Big Rivers is not a merchant generator and has no desire to become a "merchant
22		generator" as characterized by the Attorney General. Proposing to enter into a long-
23		term sale of up to MW does not transform Big Rivers into a merchant generator.

1		Big Rivers is a regulated utility that did not construct its generating facilities for the
2		purpose of making unregulated market sales. With respect to its current capacity
3		situation, Big Rivers is where it is. Big Rivers' Members own valuable assets, and Big
4		Rivers is responsible for ensuring those assets are providing value to its Members as
5		Big Rivers works its way through its Mitigation Plan. The Nebraska Agreements are a
6		reasonable step in securing replacement load pursuant to that plan.
7	Q.	The Attorney General claims on page 4 of the AG Comments that ratepayers
8		should be "guaranteed any margins" from the Nebraska Agreements, and Mr.
9		Kollen claims on page 29 of his testimony that customers should not be required to
10		"backstop any negative effects of the Company's decisions." How do you
11		respond?
12	A.	Big Rivers disagrees with these claims. Big Rivers uses its best judgment to make
13		transactions that will benefit its Members. Since Big Rivers is an electric G&T
14		cooperative, there are no profit-taking shareholders to back up individual market
15		transactions. Big Rivers cannot operate in the manner suggested by the Attorney
16		General, with the only alternative being not to make sales of available power. From a
17		ratemaking standpoint, the Nebraska Agreements should not be treated differently than
18		other off-system sales made by Big Rivers. This is described more fully in the Rebuttal
19		Testimony of John Wolfram.
20		
21		

1		E. QUALIFYING CAPACITY
2	Q.	Mr. Kollen contends that
3		under the
4		Nebraska Agreements. Does that commitment by Big Rivers amount to
5		under the Nebraska Agreements?
6	A.	Absolutely not. It is in the distinct best interest of Big Rivers
7		
8		
9		
10		, so this results in additional margins for Big Rivers and its Members in
11		this transaction. There is also no risk to Big Rivers as a result of that contractual
12		provision because Big Rivers
13		
14		
15		
16		
17		
18		
19		This subject is also discussed in Big Rivers'
20		responses to information requests PSC 2-1 and AG 1-2.
21		
22		

1		F. NPPD FUEL MIX AND EPA CLEAN POWER PLAN
2	Q.	Mr. Kollen asserts on pages 24-25 of his testimony that because NPPD has a
3		different generation fuel mix than Big Rivers, its rates will be impacted less by
4		environmental regulations affecting coal-fired power plant emissions than will Big
5		Rivers. Do you believe NPPD's rates are at less risk for increase than Big Rivers'
6		given their different fuel mix?
7	A.	No. NPPD's generation mix includes natural gas and nuclear supply. The historical
8		volatility of the natural gas market is well documented (see Exhibit Barron-1) and will
9		likely lead to increased costs for NPPD in the future. Likewise, NPPD's nuclear
10		facility will likely face additional scrutiny in the future as a result of the Fukushima
11		nuclear plant meltdown in Japan. These two fuels will likely be beneficial to NPPD in
12		a carbon constrained world; however, Big Rivers has the ability to terminate the
13		Nebraska Agreements if carbon legislation or regulation is enacted to regulate, tax,
14		limit or restrict carbon emissions. As such, this fuel diversity should cause no cost
15		advantage for NPPD in a non-carbon constrained environment. For these reasons, Mr.
16		Kollen's assertion regarding the significance of the NPPD fuel mix is irrelevant.
17	Q.	To what extent will the Nebraska Agreements complicate the ability of the
18		Commonwealth of Kentucky to comply with the "Clean Power Plan," as suggested
19		by Mr. Kollen on page 30 of his testimony?
20	A.	As currently proposed, the EPA's "Clean Power Plan" is based on an emission rate, not
21		a mass emission amount. As such, Big Rivers' production of generation to serve the
22		Nebraska Entities will not impact the state's ability to meet an emission rate any more

so than Big Rivers generating power to sell into MISO. Unless all sales from utilities

23

1		in Kentucky into other states, MISO, PJM, SPP, or other integrated markets will also
2		"complicate" the ability of the Commonwealth to comply with the EPA's "Clean Power
3		Plan," there is no incremental risk on this issue associated with the Nebraska
4		Agreements.
5		
6		G. <u>IRRIGATION RATE</u>
7	Q.	Big Rivers commits in Section 3.13 of the Nebraska Agreements to provide
8		wholesale service for up to approximately 15 MW of irrigation load
9		Mr. Kollen claims on page 11 lines 11-13 of his testimony that
10		Big Rivers is asking the Commission to "approve an unknown rate." Is that what
11		Big Rivers is asking?
12	A.	No. Big Rivers is not asking the Commission to approve an unknown rate for irrigation
13		service. Mr. Kollen contends is a deficiency in
14		the Nebraska Agreements, even though he also acknowledges that Big Rivers has said
15		that the Commission will have to approve any irrigation rate before it becomes
16		effective.
17		The
18		
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1		Big Rivers clarified in its response to AG 1-8 that any irrigation rate would be
2		submitted to the Commission for approval. When an irrigation rate is submitted to the
3		Commission, the Commission can "assess the risk associated with the obligation
4		against the revenues and margins that may be obtained," answering the other objection
5		to the irrigation rate provision raised by Mr. Kollen on page 17 lines 1-4 of his
6		testimony.
7	Q.	Mr. Kollen argues that the economic development incentive rate contained in
8		Section 3.11 of the Nebraska Agreements is unreasonable, and that Big Rivers
9		should focus on providing economic development incentives in Kentucky. Why is
10		Section 3.11 reasonable?
11	A.	Section 3.11 of the Nebraska Agreements provides a rate to the Nebraska Entities that
12		they will use for economic development purposes, and that is based upon Big Rivers'
13		economic development rate. Big Rivers does not contend that it is offering an
14		"economic development rate" to the Nebraska Entities, or that any rate that will be
15		offered under Section 3.11 can be justified under the Commission's guidelines from
16		Administrative Case No. 327. Any rate under Section 3.11will be based upon the
17		economic development rate Big Rivers has in effect at the time a Nebraska Entity
18		requests the rate. Big Rivers would anticipate that any specific rate that Big Rivers
19		provides in response to a request under Section 3.11 will require a contract amendment
20		that will be submitted to the Commission, RUS and any creditor or governmental
21		authority that is required to review such agreements. Big Rivers has seen no evidence
22		to suggest that this rate will get much use, but it became an important issue for the
23		Nebraska Entities during the contract negotiations.

1		Mr. Kollen knows from prior cases involving Big Rivers before this
2		Commission that Big Rivers is offering, through its Members, an economic
3		development incentive rate in Kentucky to grow Big Rivers' system native load. The
4		Nebraska Agreements do not impede that effort in any respect.
5		
6		H. <u>DISPOSITIONS OF MARGINS</u>
7	Q.	KIUC and the Attorney General have both suggested that Big Rivers should be
8		forced to return any margins earned by Big Rivers under the Nebraska
9		Agreements to its Members through the Economic Reserve. What is Big Rivers'
10		view on that proposal?
11	Α.	Big Rivers disagrees strongly with that position, and the position that Big Rivers should
12		have no discretion to make such decisions itself. Mr. Wolfram, in his rebuttal, speaks
13		to the ratemaking reasons that make the Opposing Intervenor suggestions unacceptable.
14		I would point out that even with no incremental rate reductions, margins from the
15		Nebraska Agreements provide other potential benefits to Big Rivers and its Members,
16		including offsetting future cost increases, building equity, potentially improving credit
17		ratings, and lowering interest rates on borrowings where interest rates are tied to credit
18		ratings.
19		
20		
21		

1 2	IV.	APPROVED AS SOON AS POSSIBLE
3	Q.	The Attorney General suggests on page 5 of the AG Comments that Commission
4		approval of the Nebraska Agreements be postponed until after the final report is
5		issued in the focused audit ordered in Case No. 2013-00199, or that the contracts
6		be approved "subject to the audit process." Are these reasonable alternative
7		suggestions?
8	A.	No. First, the RFP issued by the Commission in the focused audit contemplates that the
9		final report will be issued approximately five months after the November 19, 2014,
10		start date for the focused audit, or approximately on April 19, 2015. I strongly believe
11		that a delay of at least that magnitude with the accompanying, continuing uncertainty
12		about regulatory approvals will force the Nebraska Entities to look immediately for
13		another supplier. The Nebraska Agreement counterparties are composed of two
14		municipals and one public power district. They are very risk-averse, have an obligation
15		to serve their retail Members, and have a strong desire to lock in a supplier and prices
16		as soon as possible. They have already given notice of termination of their contracts
17		with NPPD, and cannot risk failing to have a power supply when the termination dates
18		arrive. They went through a lengthy RFP process when Big Rivers was awarded their
19		contracts. If they are going to be forced to find another supplier, they will need
20		significant time to do so and complete any required regulatory approvals. For this
21		reason, and as a matter of good faith negotiation, Big Rivers requests quick action by
22		the Commission, and certainly opposes the delay suggested by the Attorney General.
23		Second, Big Rivers is aware of nothing in the April 25, 2014 order of the
24		Commission initiating the focused audit, the Commission's regulations on audits or the

RFP issued by the Commission in the focused audit process that suggests any of Big
Rivers' Mitigation Plan efforts should be postponed because of the audit, or subject to
prior review of the auditors. The Commission has described the scope of the focused
audit as "a focused audit of Big Rivers' efforts to mitigate the impact of losing the
smelter loads [and] review [of] the strategic planning, management, and decision-
making of Big Rivers regarding its mitigation efforts." The purpose of the Mitigation
Plan is to mitigate the impacts of the departures of the two smelters. Big Rivers is
pursuing that effort as vigorously as it can. The alternate recommendations of the
Attorney General, if adopted, would impede that effort. In any event, any successful
transaction under the Mitigation Plan of a term that could even remotely affect any
recommendation coming out of the focused audit will be subject to Commission review
and approval.
Third, any delay in the decision on the Nebraska Agreements will have a
chilling effect on any future special contract sales efforts undertaken by Big Rivers due
to regulatory uncertainty. This could significantly impede Big Rivers' efforts to
mitigate the loss of the smelter load and hamper its ability to implement its load
mitigation strategy.
Fourth, the requirement for Big Rivers
is not a reason to delay approval of the Nebraska Agreements, but to expedite that
review. We estimate that the

¹ Order dated June 6, 2014, page 4, P.S.C. Case No. 2013-00199.

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Likewise, Mr. Kollen's speculation that approval of the Nebraska Agreements will somehow impede the focused audit of Big Rivers' Mitigation Plan activity is unsupported by evidence or any concern expressed by the Commission. Further, these transactions are not sufficiently large enough to cause any constraints on alternatives under the Big Rivers Mitigation Plan. Big Rivers has available capacity to serve this load without the Wilson or Coleman units in operation. Big Rivers' goal is to implement its Mitigation Plan as quickly as possible to deal with the capacity that became available after the smelters left the Big Rivers system. Big Rivers intends to continue on that path.

A.

V. <u>CONCLUSION</u>

18 Q. Do you have any concluding remarks?

The Nebraska Agreements are reasonable. They provide a reasonable margin to Big Rivers and its Members, and desirable diversity to Big Rivers' intersystem sales portfolio. The risks to the transactions asserted by the Opposing Intervenors are risks that Big Rivers had already identified, studied and considered. As shown above, those risks are minimal and acceptable in an intersystem sales transaction. For these reasons,

1		the Nebraska Agreements should be approved by the Commission as promptly as
2		possible to clear the regulatory uncertainty that has been created by the Opposing
3		Intervenors in this matter, to give the Nebraska Entities an answer to the question of
4		whether they have a source of power for their constituents, and most importantly to
5		allow Big Rivers to secure this component of replacement load pursuant to its
6		Mitigation Plan for the benefit of its Members.
7	Q.	Does this conclude your testimony?
8	A.	Yes.

BIG RIVERS ELECTRIC CORPORATION

BIG RIVERS ELECTRIC CORPORATION FILING OF WHOLESALE CONTRACTS PURSUANT TO KRS 278.180 AND KAR 5:011 §13 CASE NO. 2014-00134

VERIFICATION

I, Lindsay N. Barron, verify, state, and affirm that I prepared or supervised the Rebuttal Testimony filed with this Verification, and that Rebuttal Testimony is true and accurate to the best of my knowledge, information, and belief formed after a reasonable inquiry.

Lindsay N. Barron

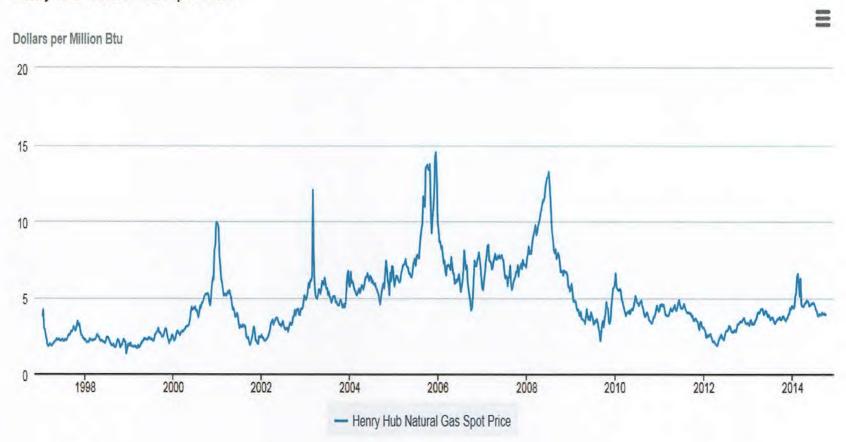
COMMONWEALTH OF KENTUCKY)
COUNTY OF HENDERSON)

SUBSCRIBED AND SWORN TO before me by Lindsay N. Barron on this the day of October, 2014.

Notary Public, Ky. State at Large My Commission Expires____

> Notary Public, Kentucky State-At-Large My Commission Expires: July 3, 2018 ID 513528

Henry Hub Natural Gas Spot Price



eia Source:

Source: U.S. Energy Information Administration

Source: http://www.eia.gov/dnav/ng/hist/rngwhhdW.htm

COMMONWEALTH OF KENTUCKY

OCT 08 2014

BEFORE THE PUBLIC SERVICE COMMISSIONUBLIC SERVICE COMMISSION

In the Matter of:

BIG RIVERS ELECTRIC CORPORATION FILING
OF WHOLESALE CONTRACTS PURSUANT TO
KRS 278.180 AND 807 KAR 5:011 § 13
) Case No. 2014-00134
)

REBUTTAL TESTIMONY

OF

JOHN WOLFRAM
PRINCIPAL
CATALYST CONSULTING LLC

ON BEHALF OF

BIG RIVERS ELECTRIC CORPORATION

FILED: October 8, 2014

1		REBUTTAL TESTIMONY
2		\mathbf{OF}
3		JOHN WOLFRAM
4		
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1 2 3		REBUTTAL TESTIMONY OF
3		JOHN WOLFRAM
5	I.	INTRODUCTION
6	Q.	Please state your name, business address, and position.
7	A.	My name is John Wolfram. I am the Principal of Catalyst Consulting LLC. My
8		business address is 3308 Haddon Road, Louisville, Kentucky, 40241.
9	Q.	On whose behalf are your testifying?
10	A.	I am testifying on behalf of Big Rivers Electric Corporation ("Big Rivers").
11	Q.	Briefly describe your education and work experience.
12	A.	I received a Bachelor of Science degree in Electrical Engineering from the University
13		of Notre Dame in 1990 and a Master of Science degree in Electrical Engineering from
14		Drexel University in 1997. I founded Catalyst Consulting LLC in June 2012. From
15		March 2010 through May 2012, I was a Senior Consultant with The Prime Group,
16		LLC. I have developed cost of service studies and rates for numerous electric and gas
17		utilities, including electric distribution cooperatives, generation and transmission
18		cooperatives, municipal utilities and investor-owned utilities. I have performed
19		economic analyses, rate mechanism reviews, ISO/RTO membership evaluations, and
20		wholesale formula rate reviews. I have also been employed by the parent companies of
21		Louisville Gas and Electric Company ("LG&E") and Kentucky Utilities Company
22		("KU"), by the PJM Interconnection, and by the Cincinnati Gas & Electric Company.
23		A more detailed description of my qualifications is included in Exhibit Wolfram-1.
24		

1	Q.	Have you ever testified before the Kentucky Public Service Commission
2		("Commission")?
3	A.	Yes. I have testified in numerous regulatory proceedings before this Commission. A
4		listing of my testimony in other proceedings is included in Exhibit Wolfram-1.
5		
6	II.	PURPOSE OF TESTIMONY
7	Q.	What is the purpose of your rebuttal testimony in this proceeding?
8	A.	The purpose of my testimony is to rebut certain recommendations offered in the
9		"Attorney General's Comments In Lieu of Testimony" ("AG Comments") filed by the
10		Office of the Attorney General of Kentucky ("Attorney General"), and the testimony of
11		Mr. Lane Kollen filed by Kentucky Industrial Utility Customers, Inc. ("KIUC," and
12		collectively with the Attorney General, the "Opposing Intervenors"). Specifically, I
13		will explain why (a) the Opposing Intervenors' recommendation that the Commission
14		require Big Rivers to deposit margins from the Nebraska Agreements into the
15		Economic Reserve should be rejected and (b) why the KIUC recommendations for
16		allocating certain expenses to the Nebraska Agreement sales when calculating the
17		Kentucky Fuel Adjustment Clause rate should be rejected.
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1 2	III.	DEPOSITING MARGINS FROM THE NEBRASKA AGREEMENTS INTO THE ECONOMIC RESERVE
3	Q.	The Attorney General asserts on page 3 of the AG Comments that Big Rivers
4		should be required "to commit to depositing margins" from the Nebraska
5		Agreements into its Economic Reserve fund, and Mr. Kollen echoes that sentiment
6		in his testimony on page 28 line 9. Do you agree with this position?
7	A.	No. Requiring Big Rivers to automatically deposit the margins Big Rivers projects that
8		it will earn from the Nebraska Agreements into the Economic Reserve without
9		consideration of Big Rivers' overall financial situation is inappropriate. My
10		understanding is that this would violate the prohibition against single-issue ratemaking
11		and therefore must be avoided.
12	Q.	How does requiring the automatic deposit of these margins into the Economic
13		Reserve constitute single-issue ratemaking?
14	A.	The recommendations of the Opposing Intervenors appear to be requests for the
15		Commission to focus exclusively on one or more closely related items of revenue and
16		expense - those related solely to the Nebraska Agreements to the exclusion of all
17		other items of revenue and expense for Big Rivers. These recommendations are
18		unreasonable, particularly considering that the margins in question will not even begin
19		to be earned until 2018, by which time Big Rivers' circumstances will almost certainly
20		be different than they are at present. The Opposing Intervenors' recommendations are
21		inconsistent with traditional ratemaking practices, and should not be adopted here.
20		

1	Q.	The Opposing Intervenors indicate that the margins from the Nebraska
2		Agreements must be deposited into the Economic Reserve to ensure that these
3		margins reduce rates for Kentucky customers. Do you agree with this position?
4	A.	No. Big Rivers' Members will benefit from the margins associated with the Nebraska
5		Agreements. Big Rivers is a member-owned electric cooperative. It is not an investor-
6		owned utility where increasing off-system sales margins benefits shareholders. Instead,
7		Big Rivers' Members are also its owners, and all of Big Rivers' margins ultimately
8		benefit those Members.
9		The flaw with the intervenors' position is that it considers the Nebraska
10		Agreements in isolation and assumes that there is no benefit to ratepayers absent a
11		direct pass through of the margins to Member rates. At some point the margins from
12		the Nebraska Agreements will be included in Big Rivers' revenue requirement in a
13		general ratemaking proceeding, or perhaps through some other rate action initiated by
14		Big Rivers. But whether and when these margins should change Big Rivers' rates to its
15		Members can only be determined in the context of Big Rivers' overall financial
16		condition at the time the margins are received.
17	Q.	In response to the First Request for Information of Big Rivers Electric
18		Corporation, Item 6, Mr. Kollen claims that the margins from the Nebraska
19		Agreements are "incremental to the amounts presently included in base rates." Is
20		this correct?
21	A.	No. Under the matching principle, all revenues, expenses, rate base, plant additions,
22		and capital items are updated to the same period. For this reason, margins earned in
23		2018 and beyond cannot be "incremental" to margins included in base rates using a test

	year ending January 31, 2015. One cannot assume that the energy and capacity Big
	Rivers will use to serve the Nebraska entities will be created out of thin air. Big Rivers
	either will use energy and capacity that otherwise would have been used for something
	else (like off-system sales), or will have to generate or purchase additional energy and
	capacity. These are fundamental operating decisions that before the fact can only be
	projected through production cost modeling, and one cannot compare production cost
	modeling for one period to production cost modeling for a different period (with
	different assumptions as far as resources, load, market prices, fuel prices, production
	costs, fixed costs, etc.) and conclude the extent to which the margins earned from one
	sale of power are incremental to the margins projected for the previous period. These
	complexities explain why the matching principle and the prohibition against single-
	issue rate making exist, and why Big Rivers should not be required to automatically
	deposit the projected margins from the Nebraska Agreements into the Economic
	Reserve without consideration of Big Rivers' overall financial situation at the time
	those margins are realized.
Q.	Mr. Kollen asserts on page 29 lines 4-6 of his testimony that Big Rivers should not
	retain any discretion to determine if and when it makes any deposits into the
	Economic Reserve. Do you agree with this position?
A.	No. My understanding is that in the absence of a general rate case, where Big Rivers'
	revenue requirements are under formal consideration by the Commission, Big Rivers
	does have the statutory right to determine when, based upon its knowledge of its own
	financial circumstances, it should seek Commission approval for a reduction in
	revenues via deposits to the Economic Reserve, including any necessary amendments

A.

1		to Big Rivers' Rate Schedule "MRSM - Member Rate Stability Mechanism" (which
2		governs the ratemaking operation of the Economic Reserve).
3	Q.	Should Big Rivers' statutory discretion to decrease its regulated operating
4		revenues by proposing deposits to the Economic Reserve be denied?
5	A.	No. It is entirely appropriate for Big Rivers to retain the right to determine whether or
6		not to seek authority pursuant to KRS 278.455 to reduce its regulated operating
7		revenues. Big Rivers may also, at its own discretion, seek Commission authority to
8		adjust its rates for wholesale electric service pursuant to KRS 278.190 and related
9		sections. These sections apply if Big Rivers elects to propose the deposit of margins
10		from the Nebraska Agreements or any other source into the Economic Reserve, or to
11		propose a credit to its Members in that form or some other form, within the context of a
12		base rate case.
13	Q.	Does Big Rivers expect to reflect in its rates the margins resulting from the
14		Nebraska Agreements and/or from the implementation of its load mitigation
15		strategy, and if so, how?
16	A.	First, Big Rivers must determine whether the Nebraska Agreements or any other
17		success under the load mitigation strategy will cause Big Rivers to earn, on a consistent
18		basis, greater margins than it requires for prudent operation of the utility. If Big Rivers
19		concludes that is the case, then Big Rivers can lower its revenue or rates through either
20		of the two alternatives that were discussed earlier in my testimony. The first is to file
21		for a revenue reduction pursuant to KRS 278.455, and the second is to file a full base
22		rate case. The timing and amounts for both alternatives should be determined by Big
23		Rivers in consideration of its overall financial situation. Both filings will require the

1		approval of the Commission prior to the implementation of any rate changes. This
2		approach is applicable to the Nebraska Agreements as well as to other transactions or
3		activities resulting from the implementation of Big Rivers' load mitigation strategy.
4		
5	IV.	ALLOCATION OF EXPENSES TO THE NEBRASKA AGREEMENTS
6	Q.	Mr. Kollen also recommends on page 30 lines 1-5 of his testimony that "the
7		Commission should direct the Company to allocate the highest fuel expense to
8		the Nebraska PPA sales" when calculating the Kentucky Fuel Adjustment Clause
9		rate. Do you agree with this position?
10	A.	No. For the same reasons discussed in the previous section, it would be inappropriate
11		and fundamentally unreasonable to adjust Big Rivers' fuel cost allocation methodology
12		in the Fuel Adjustment Clause ("FAC") outside of a general rate case, where the
13		reasonableness of alternative allocation methodologies can be considered in the context
14		of Big Rivers' overall financial circumstances including whether Big Rivers' rates
15		are still fair, just and reasonable even without an adjustment in its existing rates. Big
16		Rivers' approved rates are based on a revenue requirement that assumed Big Rivers'
17		current fuel cost allocation methodology would be used in calculating FAC charges.
18		My understanding is that requiring Big Rivers to alter that allocation methodology for a
19		single item (e.g. fuel costs allocated to the Nebraska Agreement sales) without also
20		recalculating Big Rivers' base rates would be unlawful, and accordingly would result in
21		unjust and unreasonable rates. Such a reallocation of fuel costs would reduce Big
22		Rivers' margins by the amount that is reallocated to the off-system sale; FAC revenues
23		would decline to reflect the reallocation, but base rates would not increase to reflect the

1		corresponding change in off-system sales margins stemming from that same
2		reallocation.
3	Q.	Because the margins from the Nebraska Agreements are not incremental to the
4		assumptions that were used in determining Big Rivers' current base rates, as
5		described earlier in your testimony, would allocating the highest fuel cost to the
6		Nebraska Agreements affect the reasonableness of Big Rivers' base rates?
7	A.	Yes. As I noted before, the margins from the Nebraska Agreements are not incremental
8		to the off system sales margins used to determine Big Rivers' current base rates,
9		because the assumptions used to establish current base rates do not match those
10		applicable to the time period when the Nebraska Agreements will be producing
11		margins. At the time the Nebraska Agreements begin producing margins, Big Rivers
12		expects that many of the assumptions and parameters that were used to establish Big
13		Rivers' current base rates will have changed. That is one reason why a decision cannot
14		and should not be made now about whether Big Rivers' financial circumstances in
15		2018 and beyond will result in margins from the Nebraska Agreements being
16		incremental to Big Rivers' revenue requirement at that time.
17	Q.	In the same section of his testimony, Mr. Kollen recommends that the Commission
18		also direct the Company to make "an appropriate allocation of variable operation
19		and maintenance expense to the Nebraska PPA sales" when calculating the
20		Kentucky FAC rate. Do you agree with this position?
21	A.	No. Big Rivers does not allocate general variable operations and maintenance expenses
22		to any off-system sales in the FAC and the Nebraska Agreements should be no
23		exception. First, Big Rivers' current practice is reasonable and should not be changed.

1		But even if the Commission believed that a change should be considered, the
2		appropriate way to do that is in the context of a base rate proceeding, during which all
3		of Big Rivers' revenues and expenses are reviewed on a comprehensive basis.
4		
5	V.	CONCLUSION
6	Q.	What is your conclusion with regard to the recommendations of the Opposing
7		Intervenors discussed herein?
8	A.	The recommendations of the Opposing Intervenors are seriously flawed. Specifically:
9		1) The recommendation to require Big Rivers to commit to deposit margins from the
10		Nebraska Agreements into the Economic Reserve constitutes single-issue
11		ratemaking, violates the matching principle, is not necessary in order for those
12		margins to benefit Big Rivers' Members, and should be rejected.
13		2) The recommendation that Big Rivers should not retain any discretion over
14		proposing deposits to the Economic Reserve is inconsistent with Kentucky statutes
15		and regulations and should be rejected.
16		3) The recommendation that the Commission should direct Big Rivers to allocate the
17		highest fuel expense to the Nebraska Agreements sales when calculating the FAC
18		rate should only be addressed within the context of a base rate case, and should be
19		rejected in this case.
20		4) The recommendation that Big Rivers should make an appropriate allocation of
21		variable operation and maintenance expense to the Nebraska Agreements sales
22		when calculating the FAC rate is inconsistent with the treatment presently afforded
23		other off-system sales in the FAC and should be rejected.

1		None of these recommendations are appropriate, reasonable or necessary in order for
2		Big Rivers' Members to benefit from the Nebraska Agreements proposed in this case,
3		and none of them should be accepted by the Commission.
4		Big Rivers will monitor the anticipated and actual effects of the Nebraska
5		Agreements on its overall financial situation and, at its own discretion and in the
6		exercise of its business judgment (while subject to the Commission's obligation to
7		ensure that Big Rivers' rates are fair, just, and reasonable), will submit filings to the
8		Commission seeking approval to implement rate changes, pursuant to the existing
9		statutes and regulations applicable to electric cooperatives, for the benefit of Big Rivers
10		and its Members.
11	Q.	Does this conclude your testimony?
12	A.	Yes.

BIG RIVERS ELECTRIC CORPORATION

BIG RIVERS ELECTRIC CORPORATION FILING OF WHOLESALE CONTRACTS PURSUANT TO KRS 278.180 AND KAR 5:011 §13 CASE NO. 2014-00134

VERIFICATION

I, John Wolfram, verify, state, and affirm that I prepared or supervised the Rebuttal Testimony filed with this Verification, and that Rebuttal Testimony is true and accurate to the best of my knowledge, information, and belief formed after a reasonable inquiry.

John Wolfram

COMMONWEALTH OF KENTUCKY)
COUNTY OF HENDERSON)

SUBSCRIBED AND SWORN TO before me by John Wolfram on this the day of October, 2014.

Notary Public, Ky. State at Large

My Commission Expires_

My Commission Expires: July 3, 2018 ID 513528

QUALIFICATIONS OF JOHN WOLFRAM

Summary of Qualifications

Provides consulting services to investor-owned utilities, rural electric cooperatives, and municipal utilities regarding utility rate and regulatory filings, cost of service studies, wholesale and retail rate designs, and other analyses.

Employment

Catalyst Consulting LLC

June 2012 - Present

Principal

Provides consulting services in the areas of tariff development, regulatory analysis, revenue requirements, cost of service, rate design, and other utility regulatory areas.

Provides utility clients assistance regarding regulatory policy and strategy; project management support for utilities involved in complex regulatory proceedings; process audits; state and federal regulatory filing development; cost of service development and support; the development of special rates to achieve strategic objectives; the development of rate alternatives for use with customers; and energy efficiency program development.

Prepared retail and wholesale rate schedules and/or filings submitted to the Federal Energy Regulatory Commission ("FERC"), state regulators, and/or Boards of Directors for electric and gas utilities.

The Prime Group, LLC
Senior Consultant

March 2010 - May 2012

E.ON U.S., LLC, Louisville, KY

1997 - 2010

(Louisville Gas & Electric Company and Kentucky Utilities Company)
Director, Customer Service & Marketing (2006 - 2010)

Manager, Regulatory Affairs (2001 - 2006)

Lead Planning Engineer, Generation Planning (1998 - 2001)

Power Trader, LG&E Energy Marketing (1997 - 1998)

PJM INTERCONNECTION, LLC, Norristown, PA

1990 - 1993; 1994 - 1997

Project Lead - PJM Wholesale Energy Market Information System

CINCINNATI GAS & ELECTRIC COMPANY, Cincinnati, OH

1993 - 1994

Electrical Engineer - Energy Management System

Education

Bachelor of Science Degree in Electrical Engineering, University of Notre Dame, 1990 Master of Science Degree in Electrical Engineering, Drexel University, 1997 Leadership Louisville, 2006

Associations

Member, Institute of Electrical and Electronics Engineers (IEEE) Member, IEEE Power Engineering Society

Expert Witness Testimony

FERC:

Submitted remarks and served on expert panel in FERC Docket No. RM01-10-000 on May 21, 2002 in Standards of Conduct for Transmission Providers staff conference, regarding proposed rulemaking on the functional separation of wholesale transmission and bundled sales functions for electric and gas utilities.

Submitted direct testimony for Westar Energy in FERC Docket No. ER14-804 regarding proposed revisions to a Generation Formula Rate.

Submitted direct testimony for Westar Energy in FERC Docket No. ER14-805 regarding proposed revisions to a Generation Formula Rate.

Kentucky:

Submitted direct testimony for Louisville Gas & Electric Company and Kentucky Utilities Company in Case No. 2002-00029 regarding a Certificate of Public Convenience and Necessity for the acquisition of two combustion turbines.

Submitted direct testimony for Louisville Gas & Electric Company and Kentucky Utilities Company in Case No. 2002-00381 regarding a Certificate of Public Convenience and Necessity for the acquisition of four combustion turbines.

Presented company position for Louisville Gas & Electric Company and Kentucky Utilities Company at public meetings held in Case Nos. 2005-00142 and 2005-00154 regarding routes for proposed transmission lines.

Submitted discovery responses for Louisville Gas & Electric Company and Kentucky Utilities Company in Case No. 2005-00162 for the 2005 Joint Integrated Resource Plan.

Submitted discovery responses for Kentucky Utilities in Case No. 2005-00405 regarding the transfer of a utility hydroelectric power plant to a private developer.

Submitted direct testimony for Louisville Gas & Electric Company and Kentucky Utilities Company in Case No. 2005-00467 and 2005-00472 regarding a Certificate of Public Convenience and Necessity for the construction of transmission facilities.

Submitted direct testimony for Louisville Gas & Electric Company and Kentucky Utilities Company in Case No. 2007-00067 for approval of a proposed Green Energy program and associated tariff riders.

Submitted direct testimony for Louisville Gas & Electric Company and Kentucky Utilities Company in Case No. 2007-00319 for the review, modification, and continuation of Energy Efficiency Programs and DSM Cost Recovery Mechanisms.

Submitted discovery responses for Louisville Gas & Electric Company and Kentucky Utilities Company in Administrative Case No. 2007-00477 regarding an investigation of the energy and regulatory issues in Kentucky's 2007 Energy Act.

Submitted discovery responses for Louisville Gas & Electric Company and Kentucky Utilities Company in Case No. 2008-00148 regarding the 2008 Joint Integrated Resource Plan.

Submitted discovery responses for Kentucky Utilities and/or Louisville Gas & Electric Company in various customer inquiry matters, including Case Nos. 2009-00421, 2009-00312, and 2009-00364.

Submitted direct testimony for Louisville Gas & Electric Company in Case No. 2009-00549 and for Kentucky Utilities Company in Case No. 2009-00548 for adjustment of electric and gas base rates, in support of a new service offering for Low Emission Vehicles, revised special charges, and company offerings aimed at assisting customers or enhancing customer service.

Submitted direct, rebuttal, and rehearing direct testimony on behalf of Big Rivers Electric Corporation in Case No. 2011-00036 regarding revenue requirements and pro forma adjustments in a base rate case.

Submitted direct and rebuttal testimony on behalf of Big Rivers Electric Corporation in Case No. 2012-00063 regarding an Environmental Compliance Plan and Environmental Surcharge rate mechanism.

Submitted direct and rebuttal testimony on behalf of Big Rivers Electric Corporation in Case No. 2012-00535 regarding revenue requirements, pro forma adjustments, cost of service and rate design in a base rate case.

Submitted direct and rebuttal testimony on behalf of Big Rivers Electric Corporation in Case No. 2013-00199 regarding revenue requirements, pro forma adjustments, cost of service and rate design in a base rate case.

Virginia:

Submitted direct testimony for Kentucky Utilities Company d/b/a Old Dominion Power in Case No. PUE-2002-00570 regarding a Certificate of Public Convenience and Necessity for the acquisition of four combustion turbines.