

COMMONWEALTH OF KENTUCKY
BEFORE THE PUBLIC SERVICE COMMISSION

In the Matter of:

ELECTRONIC TARIFF FILING OF BIG RIVERS)	Case No.
ELECTRIC CORPORATION AND KENERGY)	2023-00312
CORP. TO REVISE THE LARGE INDUSTRIAL)	
CUSTOMER STANDBY SERVICE TARIFF)	

**JOINT RESPONSES OF BIG RIVERS ELECTRIC CORPORATION
AND KENERGY CORP. TO DOMTAR PAPER COMPANY, LLC'S
THIRD REQUEST FOR INFORMATION**

Big Rivers Electric Corporation (“Big Rivers”) and Kenergy Corp. (“Kenergy”), by counsel, file their joint responses to the Third Request for Information propounded in the above-styled matter by Joint Intervenors, Domtar Paper Company, LLC and Kimberly-Clark Corporation, on February 21, 2024.

FILED: March 8, 2024

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ELECTRONIC TARIFF FILING OF BIG RIVERS ELECTRIC CORPORATION
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REQUEST NO. 3-1: *Reference Rebuttal Testimony of Terry Wright, Jr. (“Wright Rebuttal”) at 4, lines 14-16. Please confirm or deny, that under Big Rivers’ proposed LICSS design, assuming Midcontinent Independent System Operator (“MISO”) accreditation of the customer’s generator, such accredited capacity will be counted in meeting Big Rivers’ resource adequacy requirement with MISO. If denied, please fully explain. If confirmed, please provide Mr. Wright’s understanding of how MISO will determine the capacity value of the customer’s generation.*

RESPONSE: A customer’s behind-the-meter generator, even assuming appropriate accreditation by MISO, would not be expected to contribute in any way to Big Rivers’ resource adequacy requirements due to the MISO auction framework.

As discussed, a utility participating in the MISO capacity auction to meet its Planning Reserve Margin Requirement (“PRMR”) purchases all of its needed capacity at the auction clearing price, and it likewise sells all the capacity of its available resources at the applicable auction clearing price.¹ Under this approach, the Customer’s generator is not being used to meet Big Rivers’ PRMR, but instead is sold into the auction like Big Rivers’ capacity resources. The

¹ See, e.g., Wright Rebuttal Testimony, at p. 3, lines 9-11 (“As a cooperative utility with member and non-member load obligations, for each planning year, Big Rivers offers all of its generation capacity for sale into MISO and purchases all of its load requirements from MISO.”)

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revenue generated from the auction on account of the customer's generator is then paid out to the customer under the proposed LICSS tariff.

Though Big Rivers has historically met its PRMR through the MISO auction framework, MISO also offers its members the option of satisfying PRMR through a Fixed Resource Adequacy Process ("FRAP"), under which a utility identifies and assigns specific available generation to satisfy its PRMR instead of relying on the auction. In the last 5 years, Big Rivers has not participated in the FRAP and would not expect to include customer generation towards its PRMR even if it did participate.

Witness: Terry Wright, Jr.

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REQUEST NO. 3-2: *Reference Wright Rebuttal at 4, lines 11-13. Please explain whether the question is referring to how Big Rivers treats Domtar's and Kimberly-Clark's generators for Big Rivers planning purposes or how MISO treats Domtar's and Kimberly-Clark's generators.*

RESPONSE: Big Rivers objects to this request as vague. Subject to and without waiving this objection, the question on Page 4, lines 11-13, specifically references a utility's peak system demand, which is the seasonal peak system demand that Big Rivers submits to MISO annually. MISO uses this seasonal peak system demand when it completes Resource Adequacy studies and determines resource requirements. Again, if Big Rivers embeds behind the meter generators in its seasonal peak system demand, Big Rivers would be artificially lowering its seasonal peak system demand and assuming a capacity value on these behind-the-meter generation resources. Big Rivers believes that MISO is better positioned to evaluate system reliability, and Big Rivers believes it imprudent to expend resources to continually develop its own internal assumptions regarding generation accreditation with respect to units it does not own, operate, or maintain.

Witness: Terry Wright Jr.

For the Objection(s): Counsel

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REQUEST NO. 3-3: *Reference Wright Rebuttal at 4, line 14 through 5, line 2:*

- a. Please provide an explanation of how Big Rivers includes the Mega Watts associated with Domtar's and Kimberly Clark's generators in submissions to MISO, including but not limited to its peak load forecasts. To the extent that this has changed during the past five (5) MISO planning years, please describe and provide the justification for each such change. Under the new LICSS, will this approach change?*
- b. Does MISO dictate how Big Rivers determines its load requirements? If so, please provide an explanation of how, including citation to the applicable MISO tariff and business manual references.*
- c. How has Big Rivers accounted for Domtar's and Kimberly-Clark's load and generators since Big Rivers has joined MISO (e.g., behind the meter generator, net load, gross load less generation, etc.)?*
- d. Since joining MISO, has Big Rivers ever requested that MISO designate Domtar's or Kimberly-Clark's generators as a load modifying resource-behind the meter generator? If so, please provide each such Big Rivers request/filing/submission and MISO's response.*
- e. Would approval of the proposed LICSS require Domtar and Kimberly-Clark to become designated as load modifying resource-behind the meter generators? Would this status require Domtar and Kimberly-Clark to become MISO members?*
- f. To Big Rivers' knowledge, has MISO ever accredited Domtar's or Kimberly-Clark's generators? If so, please provide the most recent MISO MW capacity Seasonal Accredited Capacity ("SAC").*
- g. To the extent that a forced outage to either the Domtar or Kimberly-Clark accredited generator does occur, please explain the impact on Big Rivers, specifically from MISO, if Big Rivers' actual load during a delivery year is "higher than the load submitted as part of its MISO Non-Coincident and*

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Coincident Peak submission.” Include each charge or potential penalty that would be imposed by MISO on Big Rivers in this event.

- h. If one of Big Rivers' generation resources that has been accepted as part of the delivery year PRA is forced out at the time of MISO's system peak or another Resource Agency ("RA") hour, please provide each and every charge, penalty, etc. that would be imposed by MISO on Big Rivers and explain how such an event would differ from an event wherein Domtar's or Kimberly-Clark's generators were forced out.*

RESPONSE:

a. [REDACTED]

[REDACTED]

[REDACTED]

[REDACTED]

[REDACTED]. These values would then be rolled into Big Rivers' Non-Coincident Peak, which would then flow into Big Rivers' Planning Reserve Margin Requirement.

During the period when Domtar's generator was registered as a BTMG Unit in MISO, Big Rivers submitted a separate NCP Forecast and CP Forecast for the Domtar Node, so the Domtar Node would have its own separate PRMR Requirement separate from the rest of Big Rivers' Load. At the same time, the Domtar BTMG Unit received a SAC Accreditation value from MISO. [REDACTED]

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[REDACTED]
[REDACTED] Domtar was submitted as a Load Reduction [REDACTED]

Because, to Big Rivers' knowledge, Kimberly-Clark has never registered its BTMG, Big Rivers has always had to artificially reduce its Load using the method explained above.

The proposed LICSS tariff is designed to require accreditation of standby customer generation, thereby relieving Big Rivers of the effort and risk associated with attempting to ascertain an appropriate "accreditation" of these third-party-operated generators and subsequently estimating an artificially reduced Big Rivers' system peak demand.

b. MISO is responsible for ensuring that Load Serving Entities (LSE) in the MISO region have sufficient Planning Resources to meet their anticipated peak demand requirements as well as an appropriate reserve margin. Please see MISO Business Practice Manual ("BPM") 11 – Resource Adequacy for more information on these requirements.¹ Section 3 of the BPM discusses Planning Reserve Margin Requirements and demand forecasts. Please also refer to Module E-1 – Resource Adequacy – of MISO's Tariff, as it also covers this topic.²

¹ <https://www.misoenergy.org/legal/rules-manuals-and-agreements/business-practice-manuals/>

² <https://www.misoenergy.org/legal/rules-manuals-and-agreements/tariff/>

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c. Please see the response to subpart a. for a summary of how Domtar and Kimberly-Clark have or have not been registered for the last five (5) years.

d. Big Rivers worked with Domtar to register the Domtar unit as a BTMG Unit.

[REDACTED]

[REDACTED] This information can be seen in MISO's MECT Tool. Please see the CONFIDENTIAL attachment to this Response, subject to a motion for confidential treatment.

e. The proposed LICSS design would require Domtar and Kimberly-Clark to become designated as behind-the-meter generators. They would not be required to become MISO members, as Big Rivers/ACES would complete all registration requirements and communicate back and forth with the facility.

f. Please see the response to subpart d.

g. MISO constantly monitors Non-Coincident and Coincident Peak submissions to make sure they appear reasonable and that submissions are not manipulated for economic purposes. Under the proposed LICSS tariff and current MISO tariff, when a forced outage does occur to the Domtar or Kimberly-Clark accredited generator and Big Rivers' actual load during a delivery year is higher than its submitted load, there is not a specific charge or penalty incurred by Big Rivers. MISO does not currently impose specific charges unless it finds that a market

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participant is manipulating submissions to circumvent MISO's rules. However, if Big Rivers consistently exceeds the values that it submits, then MISO will require Big Rivers to submit higher load forecasts in the future, which will increase costs for Big Rivers' customers.

h. The charges imposed on Big Rivers' generation from a forced outage would be very similar to those imposed on Domtar and Kimberly-Clark's resources. The major difference between the way the different generation resources are treated is that Big Rivers' generators will be required to follow a 5-minute dispatch and are able to clear some Ancillary Products, so Big Rivers could experience RT Ancillary buybacks and penalties. Assuming they were not already at full load, Domtar/Kimberly Clark generation would only be deployed on an hourly basis, and typically would not be subject to RT Ancillary buy-backs and penalties.

Witness: Terry Wright, Jr.

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REQUEST NO. 3-4: *Reference Wright Rebuttal at 5, lines 5-8:*

- a. Please explain any difference to Big Rivers, from a planning perspective, between either Domtar's or Kimberly-Clark's generator and any of Big Rivers' owned capacity resources, assuming that they had the same forced outage rate.*
- b. Are all of Big Rivers' owned capacity resources guaranteed to be available at the time of a system peak or RA hour? How does Big Rivers reflect forced outages of its generating resources in its resource planning?*
- c. What factual data does Big Rivers have to support the contention that forced outages by all facilities on the utility system will occur simultaneously?*
- d. For each of the Big Rivers generating units accepted by MISO in the 2023-2024 delivery year PRA, please provide its effective forced outage rate during each of the RA hours.*
- e. Provide the effective forced outage rates of Domtar's and Kimberly Clark's generators during each of the RA hours.*
- f. List and describe each of the ways in which Big Rivers incorporates probabilities in its forecasting.*

RESPONSE:

a. Big Rivers' capacity resources are all traditional thermal generators. These resources are classified as Schedule 53 Resources and are subject to a Capacity Accreditation process that involves LOLE studies, Tier 1 hours and Tier 2 hours, and UCAP/ISAC Ratios. Under MISO's current rules, BTMG units are evaluated based on the type of interconnection service, GVTC, and XEFORd.

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b. No resource is guaranteed to be available at any given time, let alone during the system peak or an RA hour. MISO takes into account Big Rivers' forced outage rate as part of its Schedule 53 Tier 1 calculation. MISO subsequently examines how well Big Rivers' resources have performed historically during Tier 2 (Resource Adequacy) Hours. This performance is then factored into the accreditation of Big Rivers' resources.

c. In lines 5-8, Big Rivers did not state that forced outages by all facilities on the utility system will occur simultaneously. However, during extreme weather, simultaneous forced outages are common, and N-1 or N-2 scenarios where the system loses more than one unit are also not uncommon. This is one reason why Big Rivers' believes it is important that MISO provide Resource accreditation instead of requiring Big Rivers to artificially accredit resources in Big Rivers' load calculations. As part of MISO's LOLE study, MISO examines these types of items and models the simultaneous failure of multiple units.

d. Big Rivers objects to this request as irrelevant and unduly burdensome, in that it calls for the creation of data sets that are not pertinent; neither Domtar nor Kimberly Clark will be measured based on its performance during RA hours. Please see subpart a. with regards to how MISO currently accredits BTMG resources.

e. Big Rivers objects to this request as irrelevant and unduly burdensome, in that it calls for the creation of data sets that are not pertinent; under MISO's current design, Domtar and

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Kimberly Clark will not be measured based on RA hours. Please see the Joint Response to Intervenor's Joint Request No. 3-3.

f. Big Rivers is not currently conducting probabilistic studies to determine the likelihood that one of its generators will experience an outage during a Tier 2 hour. Big Rivers is currently carrying previous year values forward and then making adjustments when Big Rivers is aware that a generator has experienced an outage during a period that will likely become an RA hour.

Witness: Terry Wright Jr.

For the Objection(s): Counsel

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REQUEST NO. 3-5: *Reference Wright Rebuttal testimony at 5, line 20 through 6, line 2. Please provide the support for Mr. Wright's statement that "the risk of shortfall is assured."*

RESPONSE: MISO sends price signals to ensure that Load Serving Entities ("LSE") have sufficient Planning Resources to meet their anticipated peak demand requirements plus a MISO appointed reserve margin. When LSEs reduce their Peak Demand with unregistered generation, they are not giving MISO an accurate account of the load risk that exists. In that scenario, MISO, with visibility only of total forecasted Load, is deprived of relevant information and not aware that the Load could fluctuate significantly if a Behind-the-Meter-Generator experiences outages. LSEs, including Big Rivers, need to do their best to ensure that MISO has an accurate picture of the reliability risks that exist.

Witness: Terry Wright, Jr.

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REQUEST NO. 3-6: *Reference Wright Rebuttal at 6, lines 5-7.*

- a. Is it Mr. Wright's testimony that MISO does not use probability of a forced outage in determining the Seasonal Accredited Capacity (SAC)? Please explain your answer.*
- b. Please provide any references to "the possibility of forced outage" in determining the capacity by MISO or any other RTO or authority.*

RESPONSE:

a. The referenced testimony asserted, in essence, that at some point in time, every generator will fail and that Big Rivers' system must be able to account for that failure. Please see the Joint Response to Intervenors' Joint Request No. 3-4(b). MISO evaluates the probability of forced outages on the transmission side by doing N-1 studies and on the generation side through SAC Accreditation and Loss of Load studies. When modeling SAC Accreditation, MISO's proprietary models examine both historical outages and probabilistic outages.

b. As stated in subpart a., MISO examines both historical and probabilistic outages when modeling Capacity Accreditation.

Witness: Terry Wright, Jr.

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REQUEST NO. 3-7: *Reference Wright Rebuttal at 6, lines 17-18.*

- a. *Please provide a copy of the source data supporting the statement “there were 4,175.2 MWs of behind-the-meter generation registered for Summer 23-24.”*
- b. *Do any other utilities in Kentucky or MISO require their customers owning behind the meter generation to register as Load Modifying Resource – Behind the Meter Generation with MISO?*

RESPONSE:

- a. Please see MISO’s Planning Resource Auction Results for Planning year 2023-2024 Presentation dated May 19th, 2023, accessible through the following link:
[https://cdn.misoenergy.org/2023%20Planning%20Resource%20Auction%20\(PRA\)%20Results628925.pdf](https://cdn.misoenergy.org/2023%20Planning%20Resource%20Auction%20(PRA)%20Results628925.pdf).
- b. Big Rivers is the only Commission-regulated utility in Kentucky that is a MISO Market Participant.

Witness: Terry Wright, Jr.

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REQUEST NO. 3-8: *Reference Wright Rebuttal at 6, lines 19-20. Please confirm or deny
that the method used by MISO to assign “a SAC value” utilizes a seasonal forced outage rate.*

RESPONSE: MISO uses a seasonal forced outage rate when calculating SAC for BTMG
Units.

Witness: Terry Wright, Jr.

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REQUEST NO. 3-9: *Please provide Mr. Wright's understanding of the options for Qualifying Facilities (QF) for MISO PRA market participation and how those options potentially differ from non-QF behind-the-meter generation.*

RESPONSE: Big Rivers has a QF Tariff that specifically addresses smaller cogeneration/power production sites that range from 100 KW to 5,000 KW. These facilities are eligible to register in the MISO Market as behind-the-meter generation in the same manner as larger facilities.

Witness: Terry Wright, Jr.

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REQUEST NO. 3-10: *Reference Wright Rebuttal at 7 of 11, lines 17-20. Does Mr. Wright disagree with the following provisions from 18 CFR Ch. I § 292.305(c)? Please explain.*

- a. Rates for sales of back-up and maintenance power. The rate for sales of backup power or maintenance power:*
- 1. Shall not be based upon an assumption (unless supported by factual data) that forced outages or other reductions in electric output by all qualifying facilities on an electric utility's system will occur simultaneously, or during the system peak, or both; and*
 - 2. Shall take into account the extent to which scheduled outages of the qualifying facilities can be usefully coordinated with scheduled outages of the utility's facilities.*

RESPONSE: Big Rivers' objects to this request as it is argumentative and seeks legal conclusions. Subject to and without waiving this objection, Big Rivers does not believe that Mr. Wright's referenced testimony conflicts with the provisions of 18 CFR Ch. I § 292.305(c), nor does the proposed LICSS Tariff conflict with the regulation. In fact, 18 CFR Ch. I § 292.305(c)(1) supports the proposed LICSS tariff's requirement that the Standby-Service Customers' generator(s) be registered in MISO.

Big Rivers must plan and build its transmission system under the assumption that BTMG will be offline at some point in time and that Big Rivers will have to serve its Customers' full Load.

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As far as rates are concerned in relation to generation costs, Big Rivers' LICSS Tariff charges its standby customers for the full cost of generation and then credits them for the value of their capacity. Since Big Rivers is crediting the standby customers with the value of their generation capacity, Big Rivers is not by default assuming that all generation outages occur simultaneously, as Big Rivers is charging its standby customers a rate that is lower than the full cost of Big Rivers generation Capacity. Since standby customers' generation resources will be registered with MISO, these resources will be subject to coordination of outages within MISO and not with Big Rivers. Currently, BTMG facilities are not required to enter CROW Tickets for Outages and instead are required to enter them in MISO's Demand Side Resource Interface (DSRI) Tool, which means that Kimberly-Clark and Domtar will be free to choose when they believe it is most economically sensible for them to take an Outage.

Witness: Terry Wright, Jr.

For the Objection(s): Counsel

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REQUEST NO. 3-11: *Reference Wright Rebuttal testimony at 7, line 20 through 8, line 2. To the extent that a forced outage does occur to the Domtar or Kimberly-Clark accredited generator, please explain the impact on Big Rivers, specifically from MISO, if Big Rivers' actual load during a delivery year is "higher than the load submitted as part of its MISO Non-Coincident and Coincident Peak submission." Include each charge or potential penalty that would be imposed by MISO on Big Rivers in this event.*

RESPONSE: Please see the Joint Response to Intervenors' Joint Request No. 3-3(g).

Witness: Terry Wright, Jr.

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REQUEST NO. 3-12: *Reference Wright Rebuttal at 8, line 3 through 10, line 6.*

- a. Does Big Rivers seek prior approval from MISO of Big Rivers' schedule for maintenance of its generating units?*
- b. For the 2023-2024 Delivery Year, please provide Big Rivers' MISO approved schedule for maintenance, by generating unit.*
- c. As a result of MISO's Seasonal PRA, is Big Rivers able to schedule maintenance for its generating units? If so, please explain each difference, from a reliability standpoint, of a Domtar or Kimberly-Clark scheduled maintenance outage and a scheduled maintenance outage for a Big Rivers' generating resource.*

RESPONSE:

a. Generation outages must be submitted to MISO's Control Room Operations Window ("CROW"), which may approve or reject an outage submission. Even if MISO approves an outage submission, however, it does not mean there will be no impact to Big Rivers. Every outage receives a Time Request Exemption ("TRE") and Maintenance Margin Exemption ("MME") status rating that determines whether the Outage receives an exemption status in connection with the SAC Accreditation process. That means that even though MISO may approve the outage submission, Big Rivers could lose future accreditation if it does not receive a TRE Exemption and a MME Exemption. The TRE Exemption has numerous rules and nuances, but the general rule is that if a generator submits an outage more than 120 days in advance it will

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receive an exemption. The MME Exemption requires that the outage be scheduled during a period when MISO is projecting positive maintenance margin.¹

b. Green 2 had a scheduled outage from April 15 through June 29, 2023. This outage was approved by MISO, but Big Rivers did not receive a TRE or MME Exemption.

Green 1, Green 2, and Reid had a scheduled outage from October 1 to October 5, 2023, due to pipeline work by Texas Gas. Big Rivers received an MME Exemption, but not a TRE Exemption, for this outage.

Wilson has an outage scheduled from March 16 to April 6, 2024. Big Rivers received a TRE and MME Exemption for this outage.

c. Big Rivers has not experienced issues scheduling its maintenance outages with MISO as a result of the seasonal PRA, but imprudent outage scheduling carries financial costs. Because Domtar and Kimberly-Clark's generators would be registered as BTMGs, and BTMG Units are not currently subject to the same stringent rules as traditional generators, they would not be required to enter their outages in CROW. Domtar and Kimberly-Clark would, however, need to zero out their respective units in MISO's DSRI Tool, which would require coordination between Domtar and Kimberly-Clark, Big Rivers, Kenergy, and ACES.

¹ MISO defines "Maintenance Margin" as the megawatt amount of generation that can be taken out of service for planned maintenance for a given time period without increasing risk to supply adequacy." MIISO BPM-011 Resource Adequacy.

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Witness: Terry Wright Jr.

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REQUEST NO. 3-13: *Reference Wright Rebuttal at 10, lines 7-11.*

- a. *What is Mr. Wright's understanding of MISO's transmission requirements when the Load Serving Entity meets its planning reserve margin requirement using behind-the-meter generation?*
- b. *What is Mr. Wright's previous experience in rate design?*
- c. *In his role at BREC, is rate design part of Mr. Wright's regular duties?*
- d. *What is Mr. Wright's past experience evaluating and designing standby rates in particular?*
- e. *What is Mr. Wright's past experience evaluating the incentives created by standby rates in particular?*
- f. *How long has Mr. Wright been in his job at Big Rivers?*

RESPONSE:

a. Big Rivers objects to this request as vague and overly broad. Subject to and without waiving these objections, Big Rivers states that MISO's transmission requirements for a BTMG facility can be found in Section 4.6.5 of BPM 11 – Resource Adequacy.¹ Big Rivers believes that the most prudent approach is to build its transmission system in a manner that assumes that the BTMG will be offline at some point in time and that Big Rivers will have to serve the customers' full load. See the Joint Response to Intervenors' Joint Request No. 3-10.

¹ <https://www.misoenergy.org/legal/rules-manuals-and-agreements/business-practice-manuals/>

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- b. See Mr. Wright's Professional Summary attached to this response.
- c. Mr. Wright is responsible for long-term energy and capacity marketing and short-term energy hedging activities at Big Rivers. He is also responsible for the coordination of daily MISO market activities that include unit offer strategy, interfacing with ACES Power Marketing, and oversight of the market awards process. His other responsibilities include scheduling Southeast Power Administration ("SEPA") energy and capacity, natural gas account management, contract management, interfacing with the MISO Independent Market Monitor, and performing a variety of official roles within the MISO structure. Mr. Wright has been involved with reviewing Big Rivers' tariff proposals to ensure that they accurately reflect Big Rivers' costs of operating in the market.
- d. Mr. Wright was involved with reviewing the QF Tariff proposal to ensure that it accurately reflected the costs of operating in the market.
- e. Mr. Wright is very familiar with MISO's Capacity Auction and its potential value to Standby Customers, which is part of the basis for this rate design. The payments Big Rivers receives from the PRA Auction would be reimbursed to the Standby Customers, thus incentivizing them to make their capacity available to MISO.
- f. Mr. Wright began his career at Big Rivers in January 2023 as Director of Resources and Forecasting and was subsequently promoted to Vice President of Energy Services in August 2023.

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Witness: Terry Wright Jr.

For the Objection(s): Counsel

Professional Summary

Terry Wright, Jr.
Vice President Energy Services
Big Rivers Electric Corporation
710 W. Second Street
Owensboro, Ky 42301
Phone: 270-844-6155

Professional Experience

Big Rivers Electric Corporation
Vice President Energy Services - August 2023 to present
Director of Resources and Forecasting – January 2023 to August 2023

Cooperative Energy in Hattiesburg, Mississippi
Director of Power Marketing and Fuels – Oct 2022 – Jan 2023
Power Trading Manager – Nov 2019 – Oct 2022
Wholesale Supply Coordinator – Nov 2017 – Nov 2019

Empire District Electric Company in Joplin, Missouri
Manager of Market Operations – Aug 2013 – Nov 2017

Entrust Energy
Senior Wholesale Supply Analyst – Aug 2012 – Aug 2013

Education

Master's Degree in Finance
University of Tulsa

Master's Degree in Mathematics
Missouri State University

Bachelor Degree (Mathematics)
Missouri State University

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REQUEST NO. 3-14: *Refer to Big Rivers' most recent Integrated Resource Plan ("IRP") filed in Commission Case No. 2023-00310.*

- a. Was Domtar's MW load included in the load forecast net of Domtar's 50.1 MW generator value or was it included at the total Domtar plant demand without any offset for Domtar's generator? Please provide a complete description of how Domtar's load was quantified for purposes of the Big Rivers' IRP peak load forecast.*
- b. Did Big Rivers include Domtar's 50.1 MW generator as a generation resource to serve Big Rivers load? If not, please explain how it was considered in Big Rivers' IRP.*
- c. Was Kimberly-Clark's MW load included in the load forecast net of Kimberly-Clark's generation or was it included in the total Kimberly-Clark plant demand without offset for Kimberly-Clark's generator? Please provide a complete description of how Kimberly-Clark's load was quantified for purposes of the Big Rivers' IRP peak load forecast.*
- d. Did Big Rivers include Kimberly-Clark's generator as a generation resource to serve Big Rivers load? If not, please explain how it was considered in Big Rivers' IRP.*

RESPONSE:

a. For Big Rivers' 2023 IRP, Clearspring Energy Advisors, LLC ("Clearspring") included 20 MWs of Net Domtar Load in Big Rivers' Coincident Peak. This figure was based on an expected Peak Load of ~70 MWs and a generator capacity of around 50 MWs.

b. Big Rivers did not model Domtar's generator as part of Big Rivers' 2023 IRP Study, as Big Rivers does not have ownership or PPA rights to this resource, nor can it dispatch

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Domtar's generator into the MISO Market. The only place that Domtar's generator was modeled was as an offset to Big Rivers' Total Load Forecast.

c. For Kimberly Clark, a smaller generator and load, ClearSpring utilized the total forecasted take (load less generation) from Big Rivers' system in MWh, which was [REDACTED] for 2024. This value was then converted to a Coincident Peak Value.

d. Please see Big Rivers' response to subpart b. Kimberly Clark's generator was modeled in the same manner.

Witness: Terry Wright, Jr.

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For Confidential Treatment

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REQUEST NO. 3-15: *With regard to the forecast(s) provided in response to the previous question, 3-14(a)-(d), please provide the following:*

- a. A description of how Big Rivers develops its load forecast and specifically explain how Domtar's load and Kimberly-Clark's load is calculated for the MISO submission.*
- b. Does the forecast submitted to MISO (as described above) include the total load of Domtar and/or Kimberly-Clark, excluding any offset for Domtar's or Kimberly-Clark's own generation?*
- c. If there is an offset for Domtar's and/or Kimberly-Clark's generation, please explain how this is calculated. Also provide a copy of the most recent submission to MISO of Domtar's load and its generator as well as Kimberly-Clark's load and its generation. Please confirm whether the generation values reflect accredited values.*
- d. If the response to 3-15(a) above is that the Big Rivers' load forecast does not include any offset for Domtar's and/or Kimberly-Clark's generation, please explain how Domtar's and/or Kimberly-Clark's generators are reflected by MISO in its determination of Big Rivers' generating capacity and Big Rivers' load obligation.*

RESPONSE:

- a. Please see the Joint Response to Intervenors' Joint Request No. 3-14.
- b. Please see the Joint Response to Intervenors' Joint Request Nos. 3-3 and 3-14.
- c. Please see the Joint Response to Intervenors' Joint Request No. 3-14 (a) and (c).

There is no responsive submission as the Domtar and Kimberly Clark values are not submitted to

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MISO as separate values. The values submitted for Domtar and Kimberly Clark's generation are not accredited values as neither unit is presently registered with MISO.

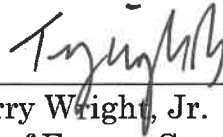
d. N/A.

Witness: Terry Wright, Jr.

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I, Terry Wright, Jr., verify, state, and affirm that the information request responses filed with this verification for which I am listed as a witness are true and accurate to the best of my knowledge, information, and belief formed after a reasonable inquiry.



Terry Wright, Jr.
VP of Energy Services
Big Rivers Electric Corporation

STATE OF KENTUCKY)
) ss:
COUNTY OF DAVIESS)

7th SUBSCRIBED AND SWORN TO before me by Terry Wright, Jr. on this the
day of March, 2024.

My commission expires: October 31, 2024



Notary Public

Notary ID: KYNP16841