

191 FERC ¶ 61,066
UNITED STATES OF AMERICA
FEDERAL ENERGY REGULATORY COMMISSION

Before Commissioners: Mark C. Christie, Chairman;
Willie L. Phillips, David Rosner
and Judy W. Chang.

PJM Interconnection, L.L.C.

Docket Nos. ER25-1357-000

Commonwealth of Pennsylvania

EL25-46-000

v.

(not consolidated)

PJM Interconnection, L.L.C.

ORDER ACCEPTING TARIFF REVISIONS AND DISMISSING COMPLAINT

(Issued April 21, 2025)

1. On December 30, 2024, in Docket No. EL25-46-000, pursuant to sections 206 and 306 of the Federal Power Act (FPA)¹ and Rule 206 of the Commission's Rules of Practice and Procedure,² Governor Josh Shapiro and the Commonwealth of Pennsylvania (collectively, Pennsylvania) filed a complaint against PJM Interconnection, L.L.C. (PJM) asserting that the price cap for PJM's Reliability Pricing Model (RPM) auctions is unjust and unreasonable.

2. On February 14, 2025, in Docket No. EL25-46-000, pursuant to Rule 206(j) of the Commission's Rules of Practice and Procedure,³ Pennsylvania and PJM filed a joint motion to dismiss and stipulation of satisfaction to resolve the complaint contingent on the Commission's acceptance of an FPA section 205 filing by PJM to propose revisions to its Open Access Transmission Tariff (Tariff)⁴ to establish a price cap and price floor

¹ 16 U.S.C. §§ 824e, 825e.

² 18 C.F.R. § 385.206 (2024).

³ *Id.*

⁴ Capitalized terms that are not defined in this order have the meaning specified in the Tariff.

for all RPM auctions for the 2026/2027 and 2027/2028 delivery years (Stipulation and Motion to Dismiss).

3. On February 20, 2025, in Docket No. ER25-1357-000, pursuant to FPA section 205,⁵ PJM submitted proposed revisions to its Tariff to establish a price cap and price floor for all RPM auctions for the 2026/2027 and 2027/2028 delivery years. We accept PJM's filing, effective April 22, 2025, as requested, and dismiss the complaint in accordance with the Joint Motion and Stipulation.

I. Background

4. According to its tariff, PJM will conduct a Base Residual Auction (BRA) three years in advance of a delivery year to procure resource commitments sufficient to meet reliability requirements in the PJM region.⁶ PJM also holds three Incremental Auctions between each BRA and delivery year, which provide opportunities for capacity market participants to sell available capacity and purchase replacement capacity and for PJM to secure additional commitments of capacity or relieve sellers from prior capacity commitments based on updated reliability requirements. PJM's currently effective Tariff reflects compressed schedules for some capacity auctions.⁷

5. Each capacity auction is cleared using supply offers submitted by sellers and administratively determined demand curves called Variable Resource Requirement curves (VRR Curves). VRR Curves are downward-sloping demand curves that identify a price for a given level of capacity resource commitment relative to reliability requirements. PJM establishes the VRR Curve by connecting three price-and-quantity points on a graph with a y-axis defined in terms of \$/megawatt (MW)-day and an x-axis in terms of unforced capacity (UCAP).⁸ Each of the three points are positioned along the

⁵ 16 U.S.C § 824d.

⁶ PJM, Intra-PJM Tariffs, Tariff, attach. DD, § 5.4 (Reliability Pricing Model Auctions) (9.0.0), § 5.4(a) (Base Residual Auction) ("The [BRA] shall be conducted in the month of May that is three years prior to the start of such Delivery Year.").

⁷ See, e.g., *PJM Interconnection, L.L.C.*, 183 FERC ¶ 61,172 (2023); *PJM Interconnection, L.L.C.*, 189 FERC ¶ 61,105 (2024). Due to PJM's currently compressed auction schedule, PJM has cancelled several Incremental Auctions. PJM plans to commence the 2026/2027 BRA on July 9, 2025, the 2027/2028 BRA in December 2025, the 2026/2027 Third Incremental Auction in February 2026, and the 2027/2028 Third Incremental Auction in February 2027.

⁸ PJM, Intra-PJM Tariffs, Tariff, attach. DD, § 5.10(a)(i). PJM's VRR Curves are anchored at points on the x-axis related to percentages of the Reliability Requirement,

x-axis at a certain percentage of PJM's reliability requirement.⁹ The top of the VRR Curve is a horizontal line drawn from the y-axis to point 1, which is the higher of the Cost of New Entry (CONE) or 1.75 times net CONE (Net CONE).¹⁰ The height of point 1 is often referred to as the "price cap" because it establishes the maximum capacity price. A downward-sloping line connects point 1 to point 2, which is positioned at 0.75 times Net CONE on the y-axis and at 101.5% of the reliability requirement on the x-axis. Finally, another downward-sloping line connects point 2 to point 3 at the x-axis (i.e., \$0/MW-day).

6. PJM recognizes geographic differences in labor and other costs in constructing and operating the reference resource by establishing different CONE values for five distinct "CONE Areas."¹¹ PJM calculates Net CONE for the PJM region's VRR Curve by subtracting the EAS Offset for the PJM region from the average of the five CONE Area values.¹² PJM has also identified several subregions, called Locational Deliverability Areas (LDAs), for evaluating transmission constraints. Pursuant to the Tariff, PJM models certain LDAs in the capacity auctions by creating LDA-specific VRR Curves (based on the LDA's reliability requirements) and including them in the auction clearing process to quantify the locational value of capacity.¹³ For modeled LDAs that are also transmission zones, PJM calculates Net CONE by subtracting the EAS Offset for the transmission zone from the CONE value for the applicable CONE Area.¹⁴ Because

which are then translated into nominal values for each BRA.

⁹ For the 2026/2027 delivery year BRA, points 1, 2, and 3 are horizontally positioned at 99%, 101.5%, and 104.5% of the PJM Region Reliability Requirement. PJM, Intra-PJM Tariffs, Tariff, attach. DD, § 5.10(a)(i).

¹⁰ CONE is the nominal levelized cost to build the reference resource, which is a representative, theoretical new power plant. Net CONE is found by subtracting from CONE the expected net energy and ancillary service revenues earned by the reference resource in PJM's other markets. Net CONE represents the first-year revenues that a new resource would need to earn in the capacity market, after netting out net energy and ancillary service revenues from CONE.

¹¹ PJM, Intra-PJM Tariffs, Tariff, attach. DD, § 5.10 (34.0.0), § 5.10(a)(iv)(A).

¹² *Id.* § 5.10(iv)(A), (C); (v)(A); (v-1)(A).

¹³ PJM determines which LDAs to model in each auction by, inter alia, comparing the import limit of an LDA to the amount of capacity that needs to be imported into an LDA to remain within a loss-of-load expectation of one event in 25 years when the area is experiencing a localized capacity emergency. PJM, Intra-PJM Tariffs, Tariff, attach. DD, § 5.10 (34.0.0), § 5.10 (a)(ii).

the values of both CONE and Net CONE can vary by LDA, the price cap values for LDA-specific VRR Curves can also vary.

7. After a capacity auction clears, the capacity price for a modeled LDA may or may not differ from the capacity price for the PJM region or other LDAs depending on whether transmission constraints bind (i.e., the LDA may or may not “price separate”). The BRA clearing software uses an optimization algorithm with the objective of minimizing capacity procurement costs given the supply offers, VRR Curves, and locational constraints.¹⁵ The BRA clearing price for each LDA is the sum of the clearing price for the unconstrained area of the PJM region and the Locational Price Adder, if any, relevant to such LDA.

8. Pursuant to the Tariff, PJM and its stakeholders must review the shape of the VRR Curve and the inputs to that curve at least every four years (Quadrennial Review).¹⁶ In 2022, PJM completed its latest Quadrennial Review and proposed to make certain changes to RPM auction parameters, including parameters used to establish the VRR Curve, starting with the 2026/2027 BRA. In February 2023, the Commission accepted PJM’s proposed changes to the VRR Curve, which included, among other things, the modification of the reference resource from a combustion turbine (CT) to a combined-cycle unit (CC).¹⁷ On February 14, 2025, the Commission accepted several reforms to PJM’s capacity market design, including PJM’s proposal to switch the reference resource from a CC back to a CT until PJM files its next Quadrennial Review in the third quarter of 2025.¹⁸

¹⁴ More generally, the Net CONE value for an LDA is the average Net CONE value for the transmission zones within the LDA, with zonal Net CONE values calculated as described above. PJM, Intra-PJM Tariffs, Tariff, attach. DD, § 5.10 (34.0.0), § 5.10(a)(ii)(C).

¹⁵ PJM, Intra-PJM Tariffs, Tariff, attach. DD, § 5.12 (25.0.0); *PJM, Manual 18: PJM Capacity Market*, § 5.7.2 (June 27, 2024), <https://www.pjm.com/-/media/DotCom/documents/manuals/m18.pdf>.

¹⁶ PJM, Intra-PJM Tariffs, Tariff, attach. DD, § 5.10 (34.0.0), § 5.10 (a)(i)-(iii).

¹⁷ *PJM Interconnection, L.L.C.*, 182 FERC ¶ 61,073 (2023) (2022 Quadrennial Review Order).

¹⁸ *PJM Interconnection, L.L.C.*, 190 FERC ¶ 61,088, at P 66 (2025).

II. Pennsylvania Complaint

9. On December 30, 2024, in Docket No. EL25-46-000, Pennsylvania filed a complaint asserting that PJM's capacity market price cap is unjust and unreasonable.¹⁹ Pennsylvania asserts that the assumptions that were used in 2022 to set the demand curve and price cap have been undercut by changing market conditions, and PJM's BRA design will require customers to pay up to \$20.4 billion in added costs over two delivery years without receiving commensurate benefits (i.e., new or retained generating capacity or increased reliability).²⁰ Pennsylvania argues that it is currently impossible for new resources to respond to high BRA prices because of PJM's interconnection queue backlog and compressed auction schedule.²¹

10. Pennsylvania contends that under current conditions, where the RPM is not providing an effective capacity market signal, PJM's use of CONE is "by definition" an arbitrarily high alternative price cap. Accordingly, Pennsylvania requests that the Commission direct PJM to remove CONE from the price cap formula until the next Quadrennial Review.²² Pennsylvania also argues that the 1.75 Net CONE multiplier was predicated on the potential for new entry and is no longer just and reasonable given the current compressed auction schedule and prolonged generator interconnection queue delays that interfere with that underlying assumption. Therefore, Pennsylvania requests that the Commission direct PJM to lower the Net CONE multiplier until the next Quadrennial Review such that the capacity market price cap is equal to 1.5 times Net CONE.²³

III. PJM Filing

11. PJM proposes Tariff revisions to establish a price cap of approximately \$325/MW-day UCAP and a price floor of approximately \$175/MW-day UCAP for all RPM auctions for the 2026/2027 and 2027/2028 delivery years.²⁴ PJM states that, to

¹⁹ Pennsylvania Complaint at 4.

²⁰ *Id.* at 13-14.

²¹ *Id.* at 18.

²² *Id.* at 23-26.

²³ *Id.* at 26-30.

²⁴ PJM, Intra-PJM Tariffs, Tariff, attach. DD, § 5.10 (Auction Clearing Requirements). PJM states that as required by Tariff, Part 1, section 9.2(b), PJM consulted the Members Committee and the Transmission Owners no less than seven days

implement its proposal, PJM would overlay the price cap and price floor on the existing demand curve design.²⁵ Accordingly, PJM would establish points 1, 2, and 3 of the VRR Curve in accordance with the existing Tariff. After plotting the VRR Curve, PJM would establish the price cap by drawing a new horizontal line from the y-axis at the UCAP-equivalent of \$256.75/MW-day in terms of installed capacity (ICAP)—approximately \$325/MW-day UCAP—to the point at which that horizontal line intersects with the VRR Curve. To establish the price floor, PJM would find the point on the VRR Curve where the y-coordinate equals the UCAP-equivalent of \$138.25/MW-day ICAP—approximately \$175/MW-day UCAP—then draw a horizontal line from that point rightward to infinity.²⁶ PJM proposes to make annual adjustments to the price cap and price floor to account for the CT reference resource's level of capacity accreditation.²⁷ PJM explains that the same logic would be used to develop the VRR Curve for all LDAs.²⁸ PJM provides the following illustration in Figure 1, which shows PJM's proposed price cap and price floor represented by the solid line overlaid on top of the existing VRR Curve, represented by a dashed line.²⁹

prior to submitting this filing. PJM Transmittal at 36-37.

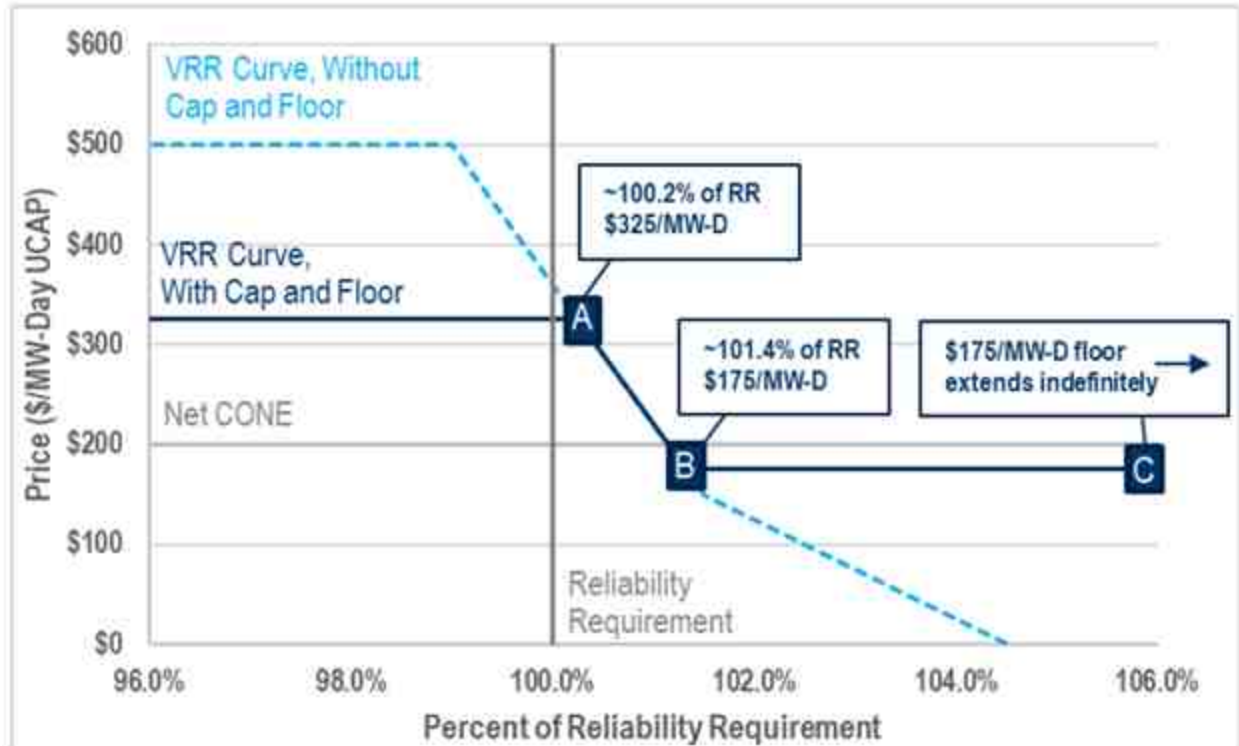
²⁵ *Id.* at 17.

²⁶ For simplicity, this order will refer to the \$325/MW-day and \$175/MW-day values as being certain values rather than approximations.

²⁷ PJM Transmittal at 20.

²⁸ *Id.* at 19.

²⁹ *Id.* at 18, Figure 1.

Figure 1

12. PJM states that, while the current capacity market rules remain just and reasonable and are operating as designed, PJM submits the instant proposal because the PJM region is facing a confluence of events that support the need for a balanced and time-bound “collar” to narrow RPM auction outcomes.³⁰ PJM explains that these events include rapid load growth, retirements of generators, state and federal policies that affect the economics of the existing resource fleet, and slow new entry of replacement generation. Moreover, PJM asserts that the compressed auction schedule dampens the immediate effectiveness of price signals because investors are not afforded sufficient time to develop new resources between the auction and the start of the delivery year.³¹ In support of its proposed revisions, PJM argues that these conditions were not modeled as part of PJM’s 2022 Quadrennial Review through which the current VRR Curve was designed, and that under these unstudied market conditions, compensation to generation may be higher and more concentrated than needed to attract supply.³² PJM states that, absent PJM’s

³⁰ *Id.* at 8.

³¹ *Id.* at 9, 24.

³² *Id.* at 9-10, 13 (citing *PJM Interconnection, L.L.C.*, Filing, attach. C (Aff. Samuel A. Newell) ¶ 15, Docket No. ER25-682-000 (filed Dec. 9, 2024)).

proposed changes, the price floor for the 2026/2027 BRA would be zero dollars and the price cap would be about \$500/MW-day.³³ PJM argues that its proposal mitigates the impact of current market conditions until PJM and stakeholders can review the VRR Curve and its inputs as part of PJM's next Quadrennial Review.³⁴ PJM states that the rationale behind its proposal is to provide a reasonable and balanced compromise between maintaining the fundamental principles of the capacity market and addressing the extraordinary circumstances currently facing PJM, including rapid load growth, interconnection queue issues, a compressed auction schedule, and significant unhedged load exposure.³⁵

13. PJM explains that, given the importance of maintaining reliability through resource adequacy, it retained The Brattle Group (Brattle) to evaluate whether its price collar proposal would be consistent with the target loss of load expectation (LOLE) of one event in ten years (i.e. 0.1 LOLE).³⁶ PJM states that Brattle estimates that the price collar proposal would outperform the 0.1 LOLE target and result in a 0.06 LOLE, which is similar to the performance of the existing VRR Curve (which would produce a 0.067 LOLE).³⁷

14. PJM states that the symmetrical nature of its proposal—i.e. reducing the price cap by \$175/MW-day (from \$500/MW-day to \$325/MW-day) and raising the price floor by the same amount—is a “key element” designed to maintain the necessary investment in capacity supply while reducing the volatility of clearing prices.³⁸ PJM contends that, while the proposed price cap may diminish expected capacity market revenues for resource owners, the price floor will provide a degree of price certainty to support ongoing investments. PJM explains that the price floor would be maintained at all capacity levels. Under this structure, PJM explains that there would be no limit to the amount of capacity that PJM would procure if the marginal resource in the PJM Region were to offer at a price less than \$175/MW-day—all sell offers below the price floor would clear the auction.³⁹ PJM contends that the structure of its proposed price floor is

³³ *Id.* at 15.

³⁴ *Id.* at 14.

³⁵ *Id.* at 22; Transmittal, attach. C (Aff. Frederick S. Bresler III) ¶ 3.

³⁶ *Id.* at 29.

³⁷ *Id.* (citing Transmittal, attach. D (Aff. Kathleen Spees and Samuel A. Newell), at 5-6 (Brattle Aff.)).

³⁸ *Id.* at 16.

reasonable because capping the amount of capacity eligible to receive the floor price (i.e., setting the price to zero at a certain capacity level) would inappropriately signal that the PJM Region does not need more capacity after a certain point, dampening maximum participation in the auctions.⁴⁰ PJM asserts that capping the amount of capacity procured at the price floor would be contrary to the fact that current tight supply and demand conditions warrant incenting every available MW of UCAP to offer to provide capacity in the auctions for the next two delivery years. PJM contends that it is unlikely that the marginal resource in the PJM Region will clear at or below the \$175/MW-day price floor, given the substantial increases in demand projected for the PJM Region, the current extremely tight supply/demand conditions, and that the last BRA cleared at nearly \$270/MW-day. In addition, PJM claims that the proposed price floor would not result in an increased total cost to load compared to the amount paid in the 2025/2026 BRA. PJM explains that, at its proposed floor of \$175/MW-day, the market would need to clear about 230,000 MW of UCAP, or about 65% more than the reliability requirement, to reach the \$14.7 billion cost incurred from the 2025/26 BRA.⁴¹ PJM also states that in the Incremental Auctions for the 2026/2027 and 2027/2028 delivery years PJM will sell back excess capacity at no less than \$175/MW-day, but other buyers and sellers would be free to offer or sell at prices less than the price floor.⁴²

15. PJM argues that the Commission has permitted regional transmission organizations and independent system operators (RTOs/ISOs) to rely on temporary “guardrails” in the face of extreme and unforeseen market conditions, while RTOs/ISOs have worked toward refining their respective market designs through traditional measures.⁴³ For example, PJM states, the Commission previously accepted ISO New England Inc.’s (ISO-NE’s) proposal to impose temporary price caps on its capacity market in the interim period before ISO-NE could make a comprehensive market design filing, where ISO-NE faced capacity shortages and circumstances “not foreseen when the market was originally designed.”⁴⁴ PJM also contends that its proposal is similar to California Independent System Operator Corporation’s (CAISO’s) temporary price cap and price floor that the Commission accepted in 2009 for the outset of CAISO’s updated

³⁹ *Id.* at 26.

⁴⁰ *Id.* at 26.

⁴¹ *Id.* at 27.

⁴² *Id.* at 19, nn.51-52.

⁴³ *Id.* at 30.

⁴⁴ *Id.* (citing *ISO New England, Inc.*, 88 FERC ¶ 61,316 (1999) (ISO-NE Price Cap Order)).

energy market.⁴⁵ PJM further argues that the proposed price floor is analogous to a mechanism that the Commission approved for ISO-NE which provided fixed “transition payments” to all installed capacity in the ISO-NE region that functioned as “a bridge to the implementation” of the Forward Capacity Market.⁴⁶

16. PJM also states that its proposal is part of an agreement with Pennsylvania to resolve the complaint, which alleges that PJM’s price cap is unjust and unreasonable.⁴⁷ PJM states that Commission acceptance of the instant proposal would fully resolve the complaint.⁴⁸ PJM also states that acceptance of the instant proposal (and dismissal of the complaint) will resolve significant uncertainty associated with the complaint, which seeks a refund effective date prior to the 2026/2027 BRA and could cause uncertainty as to the durability of the outcomes of the next two BRAs, which fall within the 15-month refund period.⁴⁹

17. PJM states that as required by Tariff, section 9.2(b), PJM consulted the Members Committee and the Transmission Owners no less than seven days prior to submitting this filing.⁵⁰ PJM states that it consulted with the Members Committee on February 7, 2025.⁵¹ In addition, PJM states that it also consulted with the Transmission Owners on February 7, 2025, in accordance with the Consolidated Transmission Owners Agreement, Article 7, section 7.5.1(ii).⁵²

⁴⁵ *Id.* at 28, 31-32 (citing *Cal. Indep. Sys. Operator Corp.*, 126 FERC ¶ 61,082, at P 30 (2009) (CAISO Price Cap Order)).

⁴⁶ *Id.* at 32 (citing *Devon Power LLC*, 115 FERC ¶ 61,340, at P 30 (2006), clarified by *Devon Power LLC*, 117 FERC ¶ 61,133 (2006)).

⁴⁷ *Id.* at 1, 14.

⁴⁸ *Id.* at 1 (citing Stipulation and Motion to Dismiss).

⁴⁹ *Id.* at 9, 34.

⁵⁰ *Id.* at 36.

⁵¹ *Id.* (citing PJM, *Special Members Committee – Price Cap/Price Floor Agenda* (Feb. 2025), <https://www.pjm.com/-/media/DotCom/committees-groups/committees/mc/2025/20250207-special/agenda.pdf>).

⁵² *Id.* at 37 (citing PJM, *PJM TOA-AC Open-Session Special Session Agenda* (Feb. 2025), <https://www.pjm.com/-/media/DotCom/committees-groups/committees/toa-ac/2025/20250207-special/agenda.pdf>).

IV. Notice of Filing and Responsive Pleadings

18. Notice of the complaint was published in the *Federal Register*, 90 Fed. Reg. 634 (Jan. 6, 2025) with interventions and protests due on or before January 21, 2025. On January 21, 2025, the Commission extended the deadline for answers, interventions, and protests up to and including January 28, 2025.⁵³ On February 3, 2025, the Commission further extended the deadline for answers, interventions, and protests to the complaint up to and including February 14, 2025.⁵⁴ Notices of intervention and timely-filed motions to intervene were submitted by the entities listed in Appendix A to this order.⁵⁵ Numerous entities submitted comments or protests. The governors of Delaware, Illinois, Maryland, New Jersey, as well as several state utility commissions and consumer advocates, filed comments in support of the complaint.⁵⁶ Constellation, P3, and EPSA each filed protests to the complaint, generally arguing that Pennsylvania failed to meet its FPA section 206 burden to show that the existing capacity market price cap is unjust and unreasonable.⁵⁷

19. On February 14, 2025, PJM, along with Pennsylvania, submitted the Stipulation and Motion to Dismiss, which states that the underlying complaint will be satisfied if (1) PJM submits an FPA section 205 proposal on or before February 21, 2025 to temporarily set a capacity market demand curve price cap and price floor for the 2026/2027 and 2027/2028 delivery years, and (2) the Commission accepts that proposal. PJM and Pennsylvania request that the Commission dismiss the complaint with prejudice once it accepts the section 205 proposal. On March 3, 2025, Joint Consumer Advocates filed an answer to the joint stipulation and motion to dismiss.

20. Notice of PJM's filing was published in the *Federal Register*, 90 Fed. Reg. 10822 (Feb. 27, 2025), with interventions and protests due on or before March 13, 2025. On

⁵³ Commonwealth of Pennsylvania v. PJM Interconnection, L.L.C., Notice Granting Extension of Time, Docket No. EL25-46-000 (issued January 21, 2025).

⁵⁴ Commonwealth of Pennsylvania v. PJM Interconnection, L.L.C., Notice Granting Extension of Time, Docket No. EL25-46-000 (issued February 3, 2025).

⁵⁵ The abbreviated names or acronyms by which these entities are referred to in this order are noted in the Appendix.

⁵⁶ Filing comments in support of the complaint are AMP; PennFuture; Duquesne; Exelon; FirstEnergy Companies; IMM; JCA; Local 410; OPSI; Pennsylvania Jewish Earth Alliance; PA OCA; Pennsylvania Commission; PPL Electric; PIO; Third Act District of Columbia; Third Act Illinois; Third Act Maryland; Third Act Ohio; Third Act Pennsylvania; and Third Act Virginia.

⁵⁷ Constellation Protest at 6-7; EPSA Protest at 3-13; P3 Protest at 9-36.

March 12, 2025, the Commission extended the deadline for interventions and protests up to and including March 17, 2025.⁵⁸ Notices of intervention and timely-filed motions to intervene were submitted by the entities listed in Appendix B to this order.⁵⁹ Alpha Generation, LLC (Alpha) and Duke Energy Corporation (Duke)⁶⁰ each filed an out-of-time motion to intervene. Numerous entities submitted comments and protests, as summarized below. Answers were submitted by EKPC, IMM, Indicated Independent Power Producers (Indicated IPPs),⁶¹ PJM, and Sierra Club.

V. Discussion

A. Procedural Matters

21. Pursuant to Rule 214 of the Commission's Rules of Practice and Procedure, 18 C.F.R. § 385.214 (2024), the notices of intervention and timely, unopposed motions to intervene serve to make the entities that filed them parties to this proceeding.⁶²

22. Pursuant to Rule 214(d) of the Commission's Rules of Practice and Procedure, 18 C.F.R. § 385.214(d), we grant the late-filed motions to intervene of Alpha and Duke given their interest in this proceeding, the early stage of the proceeding, and the absence of undue prejudice or delay.

23. Rule 213(a)(2) of the Commission's Rules of Practice and Procedure, 18 C.F.R. § 385.213(a)(2) (2024), prohibits an answer to a protest or an answer unless otherwise

⁵⁸ PJM Interconnection, L.L.C., Notice of Extension of Time, Docket No. ER25-1357-000 (issued March 12, 2025).

⁵⁹ The abbreviated names or acronyms by which these entities are referred to in this order are noted in the Appendix.

⁶⁰ Duke Energy Corporation states that its motion to intervene is on behalf of its franchised public utility affiliates, Duke Energy Ohio, Inc.; Duke Energy Kentucky, Inc.; Duke Energy Carolinas, LLC; Duke Energy Progress, LLC; Duke Energy Florida, LLC; and Duke Energy Business Services, LLC.

⁶¹ Indicated IPPs are Alpha Generation, LLC; Calpine Corporation; Constellation Energy Generation, LLC; and Vistra Corporation.

⁶² Entities that filed comments or protests but did not file a notice of intervention or motion to intervene are not parties to this proceeding. 18 C.F.R. § 385.211(a)(2) (2024) ("The filing of a protest does not make the protestant a party to the proceeding. The protestant must intervene under Rule 214 to become a party.").

ordered by the decisional authority. We accept the answers filed in this proceeding because they have provided information that assisted us in our decision-making process.

B. Substantive Matters

1. Comments and Protests Regarding PJM Filing

a. General Support

24. Several parties support PJM's proposal as a balanced approach to protect the interests of both consumers and capacity suppliers during the next two delivery years.⁶³ Pennsylvania Governor Shapiro encourages the Commission to approve PJM's proposal, which he describes as a "compromise solution that accomplishes [his] paramount goals of safeguarding consumers from excessive costs and delivering grid reliability."⁶⁴ Talen Energy agrees with PJM that narrowing the price ceiling and price floor to establish a price collar around the anticipated Net CONE value disciplines the market while also providing sufficient room for supply and demand to establish reasonable clearing prices within the limited timeframe covered.⁶⁵ Constellation, Calpine, and Dominion similarly state that, due to the confluence of events facing the PJM Region, PJM's time-limited proposal is a reasonable stop-gap measure.⁶⁶ Several parties emphasize that their support of PJM's proposal relies on the temporary nature of the proposal and the importance of avoiding further auction delays.⁶⁷ Pennsylvania Commission argues that PJM's proposal avoids the risk of future auction results wherein high clearing prices may be subject to refund.⁶⁸

⁶³ Calpine Comments at 1; Constellation Comments at 3; Dominion Comments at 2; New Jersey Commission Comments at 3; Talen Energy Comments at 5; Duquesne Comments at 4.

⁶⁴ Governor Shapiro Comments at 1-2.

⁶⁵ Talen Energy Comments at 2.

⁶⁶ Constellation Comments at 3; Calpine Comments at 2; Dominion Comments at 3-4.

⁶⁷ Calpine Comments at 2; Pennsylvania Commission Comments at 3; Talen Energy Comments at 2. While taking no position on PJM's proposal, EPSA also emphasizes the importance of avoiding future auction delays. EPSA Comments at 2.

⁶⁸ Pennsylvania Commission Comments at 3.

b. Proposed Price Cap

25. Dominion and Pennsylvania Commission contend that PJM's proposal to set the price cap at a level above Net CONE supports the need for near-term investment while reflecting the market's current ability to respond.⁶⁹ Pennsylvania Commission adds that, while a reliable system is valuable to Pennsylvania consumers, they are not willing to pay prices drastically above those needed to maintain reliability.⁷⁰ Pennsylvania Commission argues that, because the price signals from the capacity market are not fully functioning to incentivize new entry, it is imperative that PJM take effective measures to mitigate against higher prices in the forthcoming capacity auctions; otherwise, additional capacity price increases only serve to provide excessive compensation to existing generation. Pennsylvania Commission argues that PJM's proposal results in a fully compensatory maximum price that will induce entry in the near term, while not tying customers to the injury of extraordinarily high capacity prices that serve no benefit.⁷¹ Although Sierra Club asks the Commission to reject PJM's filing due to the proposed price floor, Sierra Club argues that PJM should otherwise adopt a lower price cap until meaningful new entrant participation can occur once PJM's interconnection queue issues are resolved and the capacity auction returns to a three-year-forward schedule.⁷² Noting that little new entry occurred in the 2025/2026 BRA, Sierra Club argues that the absence of new entry allows incumbent suppliers to exercise significant market power.⁷³ Sierra Club also argues that because new entry has become impossible, there is no price that can attract new entrants.⁷⁴

26. EKPC states that the Commission approved PJM's current price cap as the greater of CONE or 1.75 times Net CONE because market conditions could change between the conduct of the BRA and the start of the delivery year such that PJM could underestimate Net CONE and, therefore, under-procure capacity. In contrast to the current price cap, EKPC states that PJM's selection of \$325/MW-day is arbitrary, and PJM provides no

⁶⁹ Dominion Comments at 2; Pennsylvania Commission Comments at 3.

⁷⁰ Pennsylvania Commission Comments at 9.

⁷¹ *Id.* at 11.

⁷² Sierra Club Protest at 1-2.

⁷³ *Id.* at 1, 4-7, 13.

⁷⁴ *Id.* at 4-6.

logic as to why that value will result in the capacity market producing just and reasonable rates.⁷⁵

27. EKPC also contends that PJM's proposal will break the logic that underpins the VRR Curve design and create reliability risk.⁷⁶ EKPC explains that the VRR Curve has been designed to establish a price cap at the defined level of procurement just beneath the reliability requirement (99% of that level).⁷⁷ However, EKPC states that PJM's proposal will not allow prices to rise even if the procurement falls short of the reliability requirement, which sends irrational price signals. EKPC further asserts that PJM's proposal establishes a VRR Curve that is inconsistent with PJM Tariff provisions requiring that the VRR Curve establish "the level of Capacity Resources that will provide an acceptable level of reliability consistent with the Reliability Principles and Standards."⁷⁸

28. IMM argues that the proposed VRR Curve is distorted and unsupported by the record or economic principles.⁷⁹ IMM contends that PJM should have established \$325/MW-day as the price cap and then followed the Tariff rules governing the shape of the VRR Curve, including the definitions of points 1, 2, and 3.⁸⁰ IMM contends that PJM's equivalent of point 1, the first inflection point on the VRR Curve, now occurs at a MW point that is greater than the reliability requirement and greater than where IMM

⁷⁵ *Id.* at 22.

⁷⁶ *Id.* at 20.

⁷⁷ *Id.* (citing PJM Tariff, attach. DD, § 5.10(a)(1)).

⁷⁸ EKPC Protest at 43-44 (citing Tariff, attach. DD, § 5.10(a); PJM Reliability Assurance Agreement, Schedule 4(A)).

⁷⁹ IMM Protest at 3.

⁸⁰ IMM also argues that the existing price cap is not reasonable and should be changed to 1.5 times Net CONE. *Id.* at 2-3, 13. IMM states that its analysis shows that with a 5% increase in the load forecast over the load forecast used in the 2025/2026 BRA and with the price cap equal to 1.5 times Net CONE, total payments would increase by about \$1.8 billion over the revenues in the 2025/2026 BRA. *Id.* at 15-16. IMM notes that this estimate accounts for PJM's inclusion of RMR resources in supply and the end of PJM's categorical must-offer exception.

would define point 1. IMM argues that PJM's approach increases the MW that will clear at the price cap compared to the current VRR Curve definition.⁸¹

29. Moreover, several parties argue that the proposed price cap is too low to incentivize investment in generation or retain existing resources.⁸² EKPC contends that PJM's proposal will shift price risk into reliability risk at precisely the time PJM has indicated that the region needs to encourage additional investment in capacity resources.⁸³ EKPC also argues that PJM's proposal is unjust and unreasonable because it will incentivize resources to leave the PJM market by retiring or committing to other regions that have price caps that are over \$160/MW-day higher than PJM's proposed price cap, further jeopardizing reliability.⁸⁴

30. EKPC further states that the \$325/MW-day price cap may be insufficient to attract entry because capacity accreditation has declined since the 2025/2026 BRA.⁸⁵ EKPC also states that reducing the price cap will ignore the reality that Net CONE is substantially increasing across all technology types.⁸⁶ Moreover, EKPC states that, while the VRR Curve is based on the design principle that generation resources, over the long term, will receive revenues that on average equal Net CONE, resource owners received only 38% of the reference resource's Net CONE over the last eight BRAs.⁸⁷

31. LS Power similarly argues that PJM's proposed price cap is inconsistent with recently available cost data from PJM's current Quadrennial Review.⁸⁸ LS Power explains that, at a recent PJM stakeholder meeting in preparation for the next Quadrennial Review, Brattle showed that escalated overnight capital costs of a new dual-fuel CT with

⁸¹ *Id.* at 8.

⁸² EKPC Protest at 31; America's Power Protest at 1-2, 23; Indicated Merchant Generators Protest at 3-4; Kentucky Attorney General Protest at 3; LS Power Protest at 8-9.

⁸³ EKPC Protest at 5, 11.

⁸⁴ *Id.* at 18-20, 34-35.

⁸⁵ EKPC Protest at 31.

⁸⁶ *Id.* at 43-44.

⁸⁷ *Id.* at 29 (citing EKPC Protest, attach A (Aff. John Rohrbach) ¶ 25 (Rohrbach Aff.)).

⁸⁸ LS Power Protest at 1-2.

a June 2028 online date are now approximately \$1,359/kW, which translates into a UCAP Net CONE value of \$513/MW-day, significantly above the proposed price cap of \$325/MW-day.⁸⁹ LS Power argues that this raises questions about whether the proposed price cap provides a reasonable basis for continued investment in the PJM capacity market.⁹⁰ America's Power contends that, to maintain reliability under PJM's proposal, PJM will need to further rely on reliability-must-run (RMR) agreements, and any alleged savings as a result of the price cap may vanish due to the cost of those agreements.⁹¹ America's Power further asserts that, under PJM's proposal, existing thermal generators will be treated in an unduly discriminatory manner compared with new intermittent generators because PJM has established a cap insufficient for many existing thermal generators to continue operations.⁹² America's Power argues that to the extent PJM's proposal prompts the need for RMR agreements that would not otherwise be needed, cost shifts may occur because the cost allocation for RMR contracts is different from the cost allocation for the capacity market.⁹³ America's Power argues that this is unduly discriminatory because rather than having the costs of this needed capacity spread across the PJM region, the costs will be concentrated in the states where the RMR generators are located.⁹⁴

32. To support its claims, America's Power notes that IMM has compiled data showing the actual costs paid to generators that selected cost-of-service recovery in PJM pursuant to RMR contracts.⁹⁵ America's Power argues that a sample from this data demonstrates that while a clearing price of \$500/MW-day would have rendered more

⁸⁹ *Id.* at 8-9 (citing Brattle, *Sixth Review of PJM's RPM VRR Curve Parameters*, at 4 (Feb. 21, 2025), <https://www.pjm.com/-/media/DotCom/committees-groups/committees/mic/2025/20250221-special/pjm-qr-cone-and-vrr-curve-deck.pdf>).

⁹⁰ *Id.* at 9. *See also* Indicated Merchant Generators Protest at 3-4 (citing Indicated Merchant Generators Protest, attach. (Aff. Paul M. Sotkiewicz) ¶¶ 4, 20-36 & nn.15-20 (Sotkiewicz Aff.); America's Power Protest at 4 (making a similar argument).

⁹¹ America's Power Protest at 7, 24.

⁹² *Id.* at 31.

⁹³ *Id.* at 32.

⁹⁴ *Id.* at 33.

⁹⁵ *Id.* at 23 (citing IMM, *State of the Market Report for January through September of 2024*, at 355 (Nov. 2024), https://www.monitoringanalytics.com/reports/PJM_State_of_the_Market/2024/2024q3-som-pjm-sec5.pdf).

than half of the sampled generators' continued operation economic, a clearing price capped at \$325/MW-day would have rendered all of them uneconomic.

c. Proposed Price Floor

33. As summarized above, several parties support the proposed price floor as a complement to the proposed price cap.⁹⁶ Dominion argues that the price floor will provide customers the reassurance that price signals will still provide incentives for generators in the short term and not dampen long-term investment price trends.⁹⁷ While it prefers an outcome that does not include a price floor, the New Jersey Commission is "willing to accept" the price floor "as part of a settlement that is, on balance, fair and reasonable."⁹⁸ On that basis the New Jersey Commission chooses not to oppose the temporary price floor in order to get the price cap into the next auction. The New Jersey Commission states that it views the price floor as "an acceptable price to pay to protect ratepayers from excessive capacity prices while PJM works to resolve the major outstanding flaws in the market design."⁹⁹ The New Jersey Commission's acceptance of this price floor proposed by PJM is "conditioned on it being both temporary and limited to the present extreme circumstances."¹⁰⁰

34. IMM and North Carolina Commission and Public Staff of the North Carolina Commission (collectively, North Carolina) contend that there is no economic basis for the price floor.¹⁰¹ IMM explains that the proposed price floor would require PJM to purchase an unlimited level of capacity at a price of \$175/MW-day and argues there is no support in the record or in economic logic for a minimum price greater than zero. IMM contends that a minimum price greater than zero constitutes a "a radical break from the definition of the VRR curve since its introduction."¹⁰² North Carolina contends that PJM simply derived the price floor by raising the minimum clearing price by the same amount that the maximum clearing price was lowered for the price cap.¹⁰³ IMM states that the

⁹⁶ *See supra* P 24.

⁹⁷ Dominion Comments at 3.

⁹⁸ New Jersey Commission Comments at 4.

⁹⁹ *Id.* at 5.

¹⁰⁰ *Id.*

¹⁰¹ Joint North Carolina Protest at 6; IMM Protest at 3.

¹⁰² IMM Protest at 3, 6.

¹⁰³ Joint North Carolina Protest at 6-7. *See also* AMP Protest at 9 (contending that

symmetry is not relevant, nor is it defined or supported.¹⁰⁴ North Carolina argues that symmetry is a poor argument for continuing to subject consumers to prices that are not reflective of market fundamentals and could prevent prices from falling to appropriate levels.¹⁰⁵ JCA argues that by setting the proposed floor price without reference to any market fundamentals, PJM set the price floor at an arbitrarily high level.¹⁰⁶ Sierra Club argues that a flat, horizontal price floor eliminates all competitive pressure to submit cost-based offers or to act economically.¹⁰⁷ Ohio FEA asserts that, under PJM's proposal, PJM's capacity construct would not be a meaningful market but largely an administratively determined rate imposed on the region regardless of market conditions.¹⁰⁸

35. Policy Integrity argues that if the market clears at the proposed price floor, capacity prices will be higher relative to the status quo auction rules and will cause PJM to procure extra capacity with relatively little incremental reliability value.¹⁰⁹ Policy Integrity argues that these two features of a binding price floor—high prices and over-procurement—betray the fundamental purpose of a capacity auction, which is to achieve resource adequacy at the least cost.¹¹⁰ Policy Integrity concludes that if the market were to clear at the price floor, there would be an economically inefficient transfer of welfare from consumers to generators.¹¹¹ Sierra Club similarly argues that the proposed price

PJM does not provide any justification for the price floor other than it is “symmetrical” to the price cap level); IMM Protest at 6 (arguing that PJM's superficial appeal to “symmetry” is not relevant).

¹⁰⁴ IMM Protest at 6.

¹⁰⁵ Joint North Carolina Protest at 2, 6.

¹⁰⁶ JCA Protest at 8.

¹⁰⁷ Sierra Club Protest at 14 (citing Sierra Club Protest, attach. (Aff. James F. Wilson) ¶¶ 54-56 (Wilson Aff.)).

¹⁰⁸ Ohio FEA Protest at 3-4.

¹⁰⁹ Policy Integrity Comments at 2. *See also* Joint North Carolina Protest at 4 (making a similar argument and claiming that the proposed price floor erodes the consumer benefit of only paying high capacity prices when needed for reliability).

¹¹⁰ Policy Integrity Comments at 10 (citing *Calpine Corp. v. PJM Interconnection, L.L.C.*, 171 FERC ¶ 61,035, at P 230 (2020) (“The objective of the capacity market is to select the least cost resources to meet resource adequacy goals.”)).

¹¹¹ *Id.* at 6. Policy Integrity also notes that PJM presents Brattle simulations

floor thus risks over-procurement at higher prices than necessary to secure resource adequacy and would lead to an unnecessary transfer of wealth.¹¹² New Jersey Commission also contends that the price floor may artificially inflate capacity prices if more capacity bids into the auction than expected, ultimately increasing costs for ratepayers without benefits.¹¹³

36. North Carolina states that if the price floor were implemented, it would be at a level higher than 16 of the past 19 years of capacity clearing prices, adjusted for inflation.¹¹⁴ IMM similarly notes that the proposed price floor of \$175/MW-day would be higher than the average of all historical capacity market weighted-average BRA clearing prices prior to the 2025/2026 delivery year, which is \$116.30/MW-day.¹¹⁵

37. IMM further argues that because curtailment service providers (CSPs) are allowed to offer an unlimited amount of capacity into a BRA with no demonstration that actual demand response customers or contracts to provide demand response exist, the potential result of PJM's proposal is that CSPs could offer enough resources to drive the price down to the price floor, which could cause unjust and unreasonable price suppression.¹¹⁶

d. Locational Pricing

38. EKPC further argues that, in applying the same price cap across all LDAs, PJM's proposal unreasonably penalizes unconstrained zones by forcing them to subsidize constrained zones.¹¹⁷ EKPC states that, under PJM's proposal, offers above \$325/MW-

showing the market clearing at floor 45.6% of the time. *Id.* at 13. Policy Integrity argues that PJM should explain the discrepancy between these simulations and PJM's contrary prediction that the market is unlikely to clear at the floor.

¹¹² Sierra Club Protest at 2, 13-28.

¹¹³ New Jersey Commission Comments at 4.

¹¹⁴ Joint North Carolina Protest at 10-11. AMP similarly asserts that a \$175/MW-day price floor is inconsistent with years of market behavior in which suppliers have offered into RPM auctions as price-takers or at otherwise relatively low price levels. AMP Comments at 9.

¹¹⁵ IMM Protest at 6, 29. Sierra Club similarly notes that the average Rest of RTO price between 2009 and 2025 was \$99.41/MW-day. Sierra Club Protest at 24 (citing Wilson Aff. ¶ 12 & Figure 1).

¹¹⁶ IMM Protest at 11.

day would not clear in constrained LDAs (such as BGE and DOM), which EKPC argues would have implications for resource adequacy in PJM and capacity prices in the Rest of RTO LDA.¹¹⁸ EKPC states that, should PJM clear less than that needed to meet constrained LDA requirements due to the price cap, despite there being sufficient resources, it forces PJM to make up that difference by reaching further up the supply stack in the Rest of RTO LDA, which has the impact of increasing prices in the Rest of RTO LDA.

39. IMM similarly asserts that PJM has not addressed how it will clear the BRA with a price floor and no maximum capacity value on the VRR Curve(s).¹¹⁹ IMM explains that under PJM's nested VRR Curve structure, any uncleared remaining portion of the VRR Curve from a child LDA is transferred to its immediate parent LDA, and the uncleared remaining portion from that parent LDA is transferred further to its immediate parent LDA until all of the uncleared remaining segments of the VRR Curves from all child LDAs are accounted for in the Rest of RTO LDA. IMM states that the starting uncleared remaining portion for each child LDA is usually defined as the difference between the maximum UCAP MW (i.e., point 3 of the VRR Curve) and the cleared UCAP MW. IMM argues that under PJM's proposed VRR Curve, there would not be a maximum UCAP MW for any LDA, and PJM did not address how the uncleared portion for each child LDA would be determined without a finite maximum UCAP MW, or how PJM would define a unique market-clearing solution. IMM argues that the market must be cleared in a simultaneous optimization including all the interactions between child and parent LDAs.

e. Market Conditions

40. Several parties also challenge the premise of PJM's proposal and the findings of PJM's independent consultant, Brattle. EKPC argues that PJM's explanation for changing the VRR Curve—that it had not studied market conditions present today when it established the VRR Curve in 2022—is not sufficient reason to make a dramatic change to the VRR Curve.¹²⁰ EKPC states that, unlike PJM's proposal to change the

¹¹⁷ EKPC Protest at 6, 48-49.

¹¹⁸ *Id.* at 49. RTO values include the entire PJM market and all LDAs. Rest of RTO values are RTO values net of nested LDA values. IMM, *Analysis of the 2025/2026 RPM Base Residual Auction, Part E*, at 3 n.3 (Jan. 2025), https://www.monitoringanalytics.com/reports/Reports/2025/IMM_Analysis_of_the_2025_2026_RPM_Base_Residual_Auction_Part_E_20250131.pdf.

¹¹⁹ *Id.* at 12.

¹²⁰ *Id.* at 24.

reference resource in Docket No. ER25-682-000, which truly did address an unforeseen circumstance to avoid significant price volatility, PJM's instant proposal seeks to modify the VRR Curve because potential price outcomes are "unpalatable."¹²¹

41. EKPC and Indicated Merchant Generators, who oppose PJM's filing, also contend that Brattle's analysis of PJM's proposal fails to justify the price collar.¹²² EKPC states that Brattle's analysis is based on a long-term simulation, yet PJM's proposal affects only two delivery year auctions. As such, EKPC contends that Brattle's analysis fails to address the expectation of market participants in two delivery years that concern PJM's instant proposal.¹²³ Indicated Merchant Generators' expert witness, Dr. Paul Sotkiewicz, argues that Brattle's simulations in the 2022 Quadrennial Review showed extreme volatility in the demand and supply curves, foreshadowing the tightness of the capacity market. He notes that the simulations showed that, on average, the capacity market would clear below the reliability requirement 14.4% of the time and below 99% of the reliability requirement 6.8% of the time. Dr. Sotkiewicz states that these figures are higher than previous projections and demonstrate that PJM and Brattle were aware of potentially tight capacity market conditions.¹²⁴

42. EKPC argues that market participants are reacting to investment signals from the 2025/2026 BRA by deciding whether to reverse resource deactivation decisions and invest in new resources.¹²⁵ EKPC states that, just because market responses will not be instantaneous does not mean the market response is not happening.¹²⁶ North Carolina

¹²¹ *Id.* at 24-25 (citing PJM Transmittal at 2).

¹²² *Id.* at 26. *See also* Joint North Carolina Protest at 8-9 (arguing that modeling the proposed VRR Curve for reliability is nearly meaningless because the modeling does not account for the proposal's chilling effect on investment).

¹²³ *Id.* at 27.

¹²⁴ Indicated Merchant Generators Protest, Sotkiewicz Aff. ¶ 19 (citing *PJM Interconnection, L.L.C.*, Filing, attach. C, Ex. 2 (Brattle, *Fifth Review of PJM's Variable Resource Requirement Curve for Planning Years Beginning 2026/27* (April 19, 2022), at 42-58, Docket No. ER22-2984-000 (filed Sept. 30, 2022)). More generally, Dr. Sotkiewicz notes that Brattle's simulation models require prices to converge on Net CONE, meaning that in some years prices will be lower and in other years higher than Net CONE so that they are at Net CONE on average. Indicated Merchant Generators Protest, Sotkiewicz Aff. ¶ 21. Dr. Sotkiewicz maintains that prices for the 2025/2026 BRA were simply reverting toward Net CONE on average as expected by Brattle and PJM.

¹²⁵ EKPC Protest at 17-18.

similarly states that the 2025/2026 BRA results are driving generators to announce changes to retirement plans, and capacity prices would be expected to fall as these resources participate in the capacity market.¹²⁷ EKPC further states that investment decisions are predicated upon future expectations that capacity prices will rise to reflect market fundamentals, and the expectation of higher prices creates additional capacity supply offers that would otherwise not have been made if prices were lower.¹²⁸ EKPC states that PJM's proposal impedes those market responses.

f. Stakeholder Process

43. Several parties criticize how PJM developed its proposal, as well as the associated stakeholder process.¹²⁹ EKPC, for example, states that the process PJM used to develop the instant proposal raises concerns about PJM's compliance with the Order No. 2000 requirement to be independent of all stakeholders and the Order No. 719 requirement to be responsive to RTO membership.¹³⁰ EKPC contends that PJM did not consider the perspectives and concerns of most of its membership, and instead gave preference to voices of select, undisclosed members. EKPC states that providing consultation with stakeholders after deciding upon settlement terms does not meet the responsiveness requirements of Order No. 719.

44. LS Power argues that PJM failed to properly consult with stakeholders prior to submitting its filing.¹³¹ LS Power states that while PJM claims it complied with the requirements under the Tariff and Consolidated Transmission Owners Agreement by

¹²⁶ *Id.* at 19.

¹²⁷ Joint North Carolina Comments at 11.

¹²⁸ EKPC Protest at 17-19.

¹²⁹ America's Power Protest at 4; AMP Comments at 11; Calpine Comments at 2; EKPC Protest at 6-7, 50; EPSA Comments at 3; Kentucky Attorney General Protest at 4; Ohio FEA Protest at 4-5; LS Power Protest at 1, 3-4; P3 Comments at 4.

¹³⁰ EKPC Protest at 6-7, 50 (citing *Wholesale Competition in Regions with Organized Elec. Mkts.*, Order No. 719, 125 FERC ¶ 61,071, at P 503 (2008) ("RTOs . . . must provide an avenue for customers and other stakeholders to present their views on RTO . . . decision-making, and to have those views considered"); *Regional Transmission Orgs.*, Order No. 2000, FERC Stats. & Regs. ¶ 31,089 (1999) (cross-referenced at 89 FERC ¶ 61,285) at 151-53).

¹³¹ LS Power Protest at 1.

consulting with stakeholders, such consultation occurred nine days after the issuance of a Pennsylvania press release indicating that agreement on PJM's proposal was final.¹³²

g. AMP Requests

45. AMP argues that the Commission should institute a proceeding under FPA section 206 to investigate whether PJM's resource adequacy construct remains just and reasonable given that the instant filing is the latest in a string of submissions revising PJM's capacity market.¹³³ AMP requests that the Commission require PJM to (1) show cause as to why the existing resource adequacy provisions in PJM's governing documents remain just and reasonable and not unduly discriminatory or preferential or (2) explain what changes to the governing documents would remedy the identified concerns if the Commission were to determine that the Tariff and other governing documents have become unjust and unreasonable or unduly discriminatory or preferential and, therefore, must establish a replacement rate.¹³⁴

46. AMP also notes that PJM's proposed Tariff changes do not include any methodology for defining the VRR Curve applicable after the 2027/2028 delivery year and argues that inclusion of these provisions in the Tariff is required by the Commission's rule of reason.¹³⁵ AMP contends that the Commission should require PJM to file proposed Tariff changes that include parameters defining the VRR Curve for the 2028/2029 delivery year and subsequent delivery years in a compliance filing no later than October 1, 2025.

2. Answers

47. PJM repeats and elaborates on several of its arguments, stating that, while the existing VRR Curve remains just and reasonable, the question for the Commission is whether PJM has demonstrated that the proposed VRR Curve is also just and reasonable.¹³⁶ PJM also presents several statistics to support its contention that the clearing prices for the 2026/2027 and 2027/2028 BRAs will likely be above the proposed price floor.¹³⁷ PJM addresses concerns that in 45.6% of Brattle's simulations the market

¹³² *Id.* at 3-4.

¹³³ AMP Comments at 1-2.

¹³⁴ *Id.* at 4-5.

¹³⁵ *Id.* at 5.

¹³⁶ *Id.* at 5.

cleared at the price floor by noting that Brattle's analysis relies not on current market conditions, but on historical conditions.¹³⁸ PJM also states that the frequency at which the market cleared at the price floor is a natural byproduct of the floor being so close to Net CONE and Brattle's analysis being keyed around Net CONE. PJM explains that because the price floor is \$39/MW-day below Net CONE, the simulations cleared at the price floor at a relatively great frequency, while, because the price cap is \$111/MW-day above Net CONE, the simulations cleared at the cap only 11.4% of the time. PJM states that the "lack of dynamism" in the supply stack in the short term, combined with significant projected increase in load growth, allow a reasonable observer to conclude that clearing prices will likely be above the price floor.¹³⁹ PJM also warns that rejection of the filing would likely lead to further delay of the already delayed 2026/2027 BRA.¹⁴⁰

48. In answering protests, Indicated IPPs contend that any proposal that lowers the price cap without increasing the price floor would cause both short-run and long-run harm to the market and degrade system reliability.¹⁴¹ Indicated IPPs assert that reducing any segment of the demand curve without increasing other segments would necessarily result in the market delivering expected prices lower than Net CONE on average in the long run.¹⁴² Indicated IPPs argue that this would result in a reduction in capacity and degradation of system reliability below the Installed Reserve Margin target to ensure resource adequacy. Thus, Indicated IPPs argue that the price floor is an inextricable component of PJM's proposed price collar framework.

49. Sierra Club addresses alleged "errors and misleading representations" made by America's Power and Indicated Merchant Generators.¹⁴³ In general, Sierra Club argues that these parties overstate the potential impacts of applying the proposed price cap.

50. Regarding PJM's assertion that rejecting the filing would imperil the tight schedule for the auction, IMM contends that rejecting the filing but granting the

¹³⁷ *Id.* at 8-9.

¹³⁸ *Id.* at 11 (citing Transmittal, attach. D (Aff. Kathleen Spees and Samuel A. Newell), at 5-6 (Brattle Aff.)).

¹³⁹ *Id.* at 10.

¹⁴⁰ *Id.* at 2.

¹⁴¹ Indicated IPPs Answer at 1-2.

¹⁴² *Id.* at 2.

¹⁴³ Sierra Club Answer at 1-9.

complaint would not require any lengthy consideration by PJM or any other party to implement.¹⁴⁴ IMM also argues that Indicated IPP's argument that a high minimum price is needed for reliability is unsupported and reiterates that a minimum price greater than zero has never been part of the capacity market design.¹⁴⁵ IMM argues that the proposed price floor effectively allows PJM to exercise market power on behalf of competitive offers less than the price floor.¹⁴⁶

3. Commission Determination

51. We find that PJM's proposal is just and reasonable and not unduly discriminatory or preferential. PJM proposes to establish a price cap of \$325/MW-day and a price floor of \$175/MW-day for all RPM auctions for the limited timeframe of the 2026/2027 and 2027/2028 delivery years. We agree with PJM that the price cap and price floor will operate together to narrow the range of potential capacity price outcomes, which will reduce the price volatility under the existing VRR Curve. In accepting PJM's proposal, we recognize that several commenters representing both suppliers and consumers support the proposal as a balanced, time-limited approach, and that several additional commenters do not oppose PJM's proposal.¹⁴⁷

52. We find that the current market conditions in PJM support PJM's proposal to establish a time-limited "collar" on the capacity market price for two delivery years. As PJM explains, current market conditions fall outside the conditions studied in the 2022 Quadrennial Review.¹⁴⁸ PJM describes a "confluence of events"¹⁴⁹ that have led to the

¹⁴⁴ IMM Answer at 3.

¹⁴⁵ *Id.* at 4, 7.

¹⁴⁶ *Id.* at 5.

¹⁴⁷ Commenters supporting PJM's proposal are Calpine, Constellation, Dominion, Duquesne, Pennsylvania, and Talen Energy. New Jersey Commission and Pennsylvania Commission request that the Commission accept PJM's proposal; they both support the proposed price cap and do not oppose the proposed price floor. Commenters taking no position on PJM's proposal are American Electric Power Service Corporation, AMP, EPSA, Ohio FEA, PJM Power Providers Group, and Solar Energy Industries Association.

¹⁴⁸ PJM Transmittal at 4-5 (citing Brattle Aff. at 5-6). We do not agree that Indicated Merchant Generators have demonstrated that PJM's claim in this regard is false by relying on the 2022 Brattle study to suggest that the existing VRR Curve will procure capacity below the reliability requirement.

¹⁴⁹ *Id.* at 8.

need for such a collar—offering as examples, the compressed auction schedule; increasing load growth; increasing number of resource retirements; the interconnection queue backlog; and siting, permitting, and supply chain constraints that slow down new resource entry—to support the need for a balanced price cap and price floor.¹⁵⁰

53. Given the specific facts and circumstances, and based on the record before us, we find just and reasonable PJM’s time-limited collar proposal to be effective for two delivery years (2026/2027 and 2027/2028) while PJM finalizes a long-term proposal through the Quadrennial Review process¹⁵¹ and implements revisions to its interconnection queue process.¹⁵² As recognized by several commenters representing both suppliers and consumers, the proposal represents a balanced approach that reasonably addresses the aforementioned concerns by improving short-term cost certainty for load and revenue certainty for capacity resource owners.¹⁵³

54. We find PJM has demonstrated that the proposed values for the price collar are just and reasonable. PJM’s capacity auctions are designed to signal that new capacity investment is needed or that retirements should be delayed at times when the system is short of capacity or is approaching a shortage. Price caps based on Net CONE, or multiples of Net CONE to account for the uncertainty of the Net CONE estimate, provide such signals. The proposed price cap of \$325/MW-day is 52% higher than estimated Net CONE (\$214/MW-day), which we find is just and reasonable and consistent with Commission precedent accepting similar capacity market price caps in other RTOs/ISOs.¹⁵⁴ We also note that the proposed VRR Curve—as formed by the proposed

¹⁵⁰ *Id.* at 8-9.

¹⁵¹ *See id.* at 34-35. PJM states that it anticipates at or near capacity shortage conditions are likely to continue for at least the next two delivery years, noting expected growth in demand of 4 GW and 10 GW for the 2026/2027 and 2027/2028 delivery years, respectively. PJM Answer at 6-7.

¹⁵² *See* Sixth Review of PJM’s RPM VRR Curve Parameters at 24.
<https://www.pjm.com/-/media/DotCom/committees-groups/committees/mic/2025/20250221-special/pjm-qr-cone-and-vrr-curve-deck.pdf>.

¹⁵³ *See supra* n.159.

¹⁵⁴ *See, e.g.,* ISO-NE, Transmission, Mkts. & Servs. Tariff, § III (Market Rule 1), § III.13.2 (84.0.0), § III.13.2.4.1 (“The Forward Capacity Auction Starting Price is max [1.6 multiplied by Net CONE, CONE].”); New York Independent System Operator, Inc. (NYISO), NYISO Tariffs, MST, § 5.14 (43.0.0), § 5.14.1.2.2.3 (“The maximum value for each ICAP Demand Curve shall be established at 1.5 times the monthly value of the applicable updated peaking plant gross cost.”).

price cap and price floor, as well as the points of the existing VRR Curve—is consistent with PJM’s Tariff.¹⁵⁵

55. As PJM also explains, the proposed price floor of \$175/MW-day reasonably narrows potential auction outcomes to maintain investor confidence.¹⁵⁶ Indeed, as PJM explains, the combination of the price cap and price floor will establish a price collar that protects consumers from price volatility outside the bounds of the price collar while also enabling capacity prices to reflect the system’s need for capacity and support near-term capacity investment in PJM over the two delivery years for which the price floor is in effect. We find the range of potential clearing prices from \$175/MW-day to \$325/MW-day constitutes a reasonable range while also achieving the objectives stated above.

56. In response to arguments that the ongoing Quadrennial Review indicates a greater Net CONE value than that which PJM proposed here,¹⁵⁷ we note the Quadrennial Review remains ongoing and no final value has been selected at this time. We therefore conclude that since any relevant indicators are preliminary and have not been reviewed by the Commission, PJM reasonably did not consider those findings when justifying its proposal.

57. We disagree with broader arguments that PJM’s proposal will impair long-term investment by exacerbating concerns of resource owners that capacity revenues will be insufficient over the long-term and signaling that high prices will trigger market interventions.¹⁵⁸ As discussed above, PJM stated that it proposed to pair a price cap with a price floor (i.e. what had been referred by some in this record as a collar) to provide capacity resources a greater degree of certainty and stability concerning capacity revenues over the two forthcoming delivery years, which PJM explains will support near-term capacity investment in PJM. As noted by Governor Shapiro the price floor is “a

¹⁵⁵ The Tariff states that the VRR Curve must be plotted on a graph with certain axes, and that the supporting analysis “shall be based on simulation of market conditions to quantify the ability of the market to invest in new Capacity Resources and to meet the applicable reliability requirements on a probabilistic basis.” PJM, Tariff, attach. DD §§ 5.10(a)(i), (iii). PJM’s consultant, Brattle, describes the results of the simulation that supports PJM’s proposal. *See* Brattle Aff. at 4-6.

¹⁵⁶ PJM Transmittal at 15. *See id.* at 5 (“PJM recognized that reducing the potential revenue upside provided by the current price cap called for a symmetrical limitation on the downside in order to maintain investor confidence and attract the investment required to maintain reliability.”).

¹⁵⁷ *See, e.g.*, EKPC Protest at 43-44; LS Power Protest at 1-2, 8-9.

¹⁵⁸ EKPC Protest at 26, 30-31.

strictly temporary measure given the substantial uncertainty market participants face.”¹⁵⁹ Moreover, certain protests, in examining the price cap, appear to overlook or discount the material support for resources provided by the proposed floor.

58. Nor are we persuaded by arguments in this record that the proposed price cap is too low and thus will cause resources to exit the interconnection queue, retire, increasingly seek RMR arrangements, or leave the PJM market entirely to commit to other regions.¹⁶⁰ In support of its claims, America’s Power points to IMM data setting forth the actual costs paid to generators that selected cost-of-service recovery in PJM pursuant to RMR contracts.¹⁶¹ America’s Power argues that a sample from this data demonstrates that while a clearing price of \$500/MW-day would render the continued operation of more than half of the sampled generators’ economic, a clearing price capped at \$325/MW-day would render all of the sampled generators uneconomic. We note that all of the RMR units in the sample America’s Power provides in its protest are compensated under a Cost of Service Recovery Rate and are not directly comparable to the portion of revenues a resource would earn from the capacity market (in addition to its revenues from the energy and ancillary services markets).¹⁶² Therefore, we do not find compelling America’s Power’s comparison of the price cap values and RMR cost-of-service revenues, and we find America’s Power’s argument that PJM’s proposal will prompt further RMR agreements speculative and unsupported. While America’s Power appears to claim that the different cost allocation provisions for the capacity market versus RMR cost-of-service agreements are unduly discriminatory, PJM does not propose any changes to those provisions, and therefore they are outside the scope of this FPA section 205 filing.

¹⁵⁹ Gov. Shapiro Comments at 3. The Pennsylvania Commission states that it does not oppose the price floor, noting specifically that it the proposed price floor is temporary. Pennsylvania Commission Comments at 1.

¹⁶⁰ See, e.g., America’s Power Protest at 1-2, 23; EKPC Protest at 31; Indicated Merchant Generators Protest at 3-4.

¹⁶¹ America’s Power Protest at 23 (citing IMM, *State of the Market Report for January through September of 2024*, at 355 (Nov. 14, 2024), https://www.monitoringanalytics.com/reports/PJM_State_of_the_Market/2024/2024q3-som-pjm-sec5.pdf).

¹⁶² See IMM, *State of the Market Report for January through September of 2024*, at 353-356 (Nov. 14, 2024), https://www.monitoringanalytics.com/reports/PJM_State_of_the_Market/2024/2024q3-som-pjm-sec5.pdf.

59. As shown in Figure 1 above,¹⁶³ PJM proposes to position the reliability requirement (represented by the gray vertical line) such that it intersects PJM's proposed price cap. IMM and EKPC challenge this aspect of PJM's proposal, arguing that, as supply falls, prices will reach the price cap before the reliability requirement. IMM argues that in comparison to the position of the reliability requirement in its current Tariff, PJM's proposal will potentially increase the amount of capacity that clears at the price cap. Under FPA section 205, however, PJM does not need to show that its proposal is more just and reasonable than its existing Tariff.¹⁶⁴ EKPC argues that the proposed position of the reliability requirement is inappropriate because it does not allow prices to rise when procurement falls short of the reliability requirement. We find, however, that EKPC has not demonstrated that PJM's overall proposal will fail to provide an acceptable level of reliability merely because potential prices do not increase when supply falls short of the reliability requirement. We find just and reasonable PJM's proposal to be effective for all RPM auctions for the 2026/2027 and 2027/2028 delivery years given the market conditions described in this record and above.

60. IMM and other protesters argue that the proposed price floor structure could require load to pay for quantities of capacity that provide little or no incremental reliability benefit, and do not reflect the declining value of incremental capacity procured beyond the reliability requirement.¹⁶⁵ We disagree, because we find PJM has demonstrated that capacity shortage or near shortage conditions are likely to persist for the next two delivery years. As PJM explains in its answer: (1) only 20.7 MW of capacity across the entire PJM footprint offered into and did not clear the BRA for the 2025/2026 delivery year;¹⁶⁶ (2) two LDAs cleared short of their respective reliability requirements in the BRA for the 2025/2026 delivery year; and (3) PJM forecasts 4 GW of load growth for the 2026/2027 delivery year and 10 GW of load growth for the 2027/2028 delivery year, compared to the load forecasted for the 2025/2026 delivery year.¹⁶⁷ Given the facts and circumstances presented in this record, we find that the

¹⁶³ See *supra* between P 11 and P 12.

¹⁶⁴ See, e.g., *Cities of Bethany v. FERC*, 727 F.2d 1131, 1136 (D.C. Cir. 1984) (FPA section 205 applicant need not prove that its proposed method is more reasonable than the method it previously employed).

¹⁶⁵ See e.g. IMM Protest at 11; JCA Protest at 14. In contrast, the incremental value for capacity under the existing VRR Curve falls to zero at 104.5% of the reliability requirement. PJM, Intra-PJM Tariffs, Tariff, attach. DD §§ 5.10(a)(i).

¹⁶⁶ PJM also notes that only 24.5 MW of capacity across the entire PJM footprint did not clear the Third Incremental Auction for the 2025/2026 delivery year. PJM Answer at 7.

benefits of PJM’s proposed temporary price floor outweigh the potential risk of over-procurement, and therefore find PJM’s proposal for a temporary collar is just and reasonable. Additionally, we find that IMM’s argument that CSPs may respond to the proposed price floor by flooding the market with demand resources, thereby suppressing capacity prices, is beyond the scope of this proceeding because PJM does not propose to revise its demand response rules in this proceeding.

61. We also find that, given the specific facts and circumstances in the record, IMM’s additional criticisms of PJM’s proposal do not render it unjust and unreasonable. In response to IMM’s criticism of PJM’s proposal to use ICAP values instead of UCAP values,¹⁶⁸ we find that PJM has provided sufficient justification for this choice. For example, PJM argues that the selection of ICAP values ensure that the hypothetical reference resource will receive the same capacity market revenue during both applicable BRAs if the price cap or price floor binds in both of those auctions.¹⁶⁹ We also find that IMM’s concern related to alleged market uncertainty created by the proposed ICAP-to-UCAP translation is overstated because market participants will be advised of the final price cap and price floor values prior to the time the auctions take place. In response to IMM’s argument that PJM has not explained how the uncleared portion for each child LDA (within a larger parent LDA) would be determined without specifying a finite maximum UCAP MW, we find that PJM can implement these technical “implementation details” outside of the Tariff.¹⁷⁰

62. In response to arguments that PJM’s proposal negates locational pricing,¹⁷¹ we observe that PJM did not indicate that it will ignore transmission constraints between LDAs, and as such, capacity prices could still vary by location (i.e., by LDA) under the proposal if transmission constraints bind in a given BRA. Prices will only be the same across PJM (i.e., will not vary by location) when either no transmission constraints bind or when (1) transmission constraints bind, and (2) more than one of the associated LDAs

¹⁶⁷ *Id.* at 6-7.

¹⁶⁸ IMM Protest at 8-10.

¹⁶⁹ PJM Transmittal at 20-21.

¹⁷⁰ See *PJM Interconnection, L.L.C.*, 186 FERC ¶ 61,080, at PP 53-58 (2024) (“The [T]ariff need not include ‘mere implementation details,’ which instead may be included only in the business practices manual.”) (internal cites omitted), *order on reh’g*, 189 FERC ¶ 61,043, at PP 20-32; see also *City of Cleveland, Ohio v. FERC*, 773 F.2d 1368, 1376 (D.C. Cir. 1985); *Hecate Energy Greene Cty. 3 LLC v. FERC*, 72 F.4th 1307, 1312 (D.C. Cir. 2023).

¹⁷¹ See, e.g., EKPC Protest at 6, 48-49; Joint North Carolina Protest at 6.

clears at either the proposed price cap or the proposed price floor, leading to identical prices. Even if many transmission constraints bind and all LDAs clear at either the proposed price cap or the proposed price floor, we find that the potential for such a uniform pricing outcome does not necessarily mean that PJM failed to meet its FPA section 205 burden.

63. We are similarly not persuaded by arguments that the stakeholder process was inadequate. In support of that argument, parties allege that PJM acted inconsistently with Order Nos. 719 and 2000. Those orders, however, govern PJM's filed rates, terms, and conditions of service. No party alleges that PJM violated its Tariff or governing documents in the process leading up to the filing here.¹⁷²

64. Finally, we decline, as AMP requests, to institute a proceeding under FPA section 206 to investigate whether PJM's resource adequacy construct remains just and reasonable.¹⁷³ In addition, AMP notes that PJM's proposed Tariff revisions do not include a methodology for defining the VRR Curve applicable after the 2027/2028 delivery year. We find, however, that PJM need not include any such methodology to support its proposal here. As AMP recognizes, PJM has committed to file the results of its periodic review of the VRR Curve through its Quadrennial Review, which is currently in progress, in the third quarter of 2025.

65. Because we accept PJM's FPA section 205 proposal, we find that the conditions specified in the Stipulation and Motion to Dismiss have been satisfied.¹⁷⁴ Accordingly, consistent with the Stipulation and Motion to Dismiss, the Pennsylvania complaint is hereby dismissed with prejudice.¹⁷⁵

¹⁷² The Commission made a similar finding in *PJM Interconnection, L.L.C.*, 186 FERC ¶ 61,053, at P 50 (2024).

¹⁷³ We note that the Commission has scheduled a technical conference on resource adequacy convening on June 4-5, 2025. Although the technical conference will not discuss specific proceedings pending before the Commission, part of the technical conference will examine resource adequacy and capacity market issues in PJM, with PJM-specific panels having been scheduled on the first day of that conference. Supplemental Notice of Commissioner-Led Technical Conference, Docket No. AD25-7-000 (issued Apr. 3, 2025).

¹⁷⁴ See *supra* P 19.

¹⁷⁵ Joint Stipulation and Motion at 3 ("the Commission should accept this withdrawal of the Complaint and dismiss the underlying complaint with prejudice upon Commission acceptance of PJM's proposed Collar 205 Filing").

The Commission orders:

(A) PJM's proposed Tariff revisions are hereby accepted, effective April 22, 2025.

(B) The complaint is hereby dismissed, with prejudice, as discussed in the body of this order.

By the Commission. Commissioner See is not participating.

(S E A L)

Carlos D. Clay,
Deputy Secretary.

Appendix A

List of Intervenor in Docket No. EL25-46-000

*Filed comments or protests

Alpha Generation, LLC
American Clean Power Association
American Electric Power Service Corporation
American Municipal Power, Inc. (AMP)*
America's Power
Brookfield Renewable Trading and Marketing LP
Boston Energy Trading and Marketing LLC
Buckeye Power, Inc.
Calpine Corporation
Citizens for Pennsylvania's Future (PennFuture)*
Cogentrix Energy Power Management, LLC
Constellation Energy Generation, LLC (Constellation)*
Dayton Power and Light Company
Duquesne Light Company (Duquesne)*
District of Columbia Office of the People's Counsel
Dominion Energy Services, Inc.
Duke Energy Corporation, et al.¹⁷⁶
East Kentucky Power Cooperative
Easton Utilities Commission
EDF Renewables, Inc.
Electric Power Supply Association (EPSA)*
Enel X North America, Inc.
Exelon Corporation (Exelon)*
FirstEnergy Service Company¹⁷⁷ (FirstEnergy Companies)*
Governors Pritzker (IL), Murphy (NJ), Moore (MD), and Hall-Long (DE)*
Illinois Attorney General's Office
Illinois Citizens Utility Board

¹⁷⁶ Duke Energy Corporation; Duke Energy Ohio, Inc. and Duke Energy Kentucky, Inc.; Duke Energy Indiana, LLC; Duke Energy Carolinas, LLC and Duke Energy Progress, LLC; and Duke Energy Business Services LLC.

¹⁷⁷ FirstEnergy Service Company submitted a motion to intervene as agent for its franchised public utility affiliates Ohio Edison Company, Cleveland Electric Illuminating Company, Toledo Edison Company, Pennsylvania Power Company, Pennsylvania Electric Company, Metropolitan Edison Company, West Penn Power Company, Jersey Central Power & Light Company, Monongahela Power Company, and Potomac Edison Company.

Illinois Commerce Commission
 Illinois Municipal Electric Agency
 Independent Market Monitor for PJM (IMM)*
 Indiana Office of Utility Consumer Counselor
 Invenenergy Thermal LLC
 Joint Consumer Advocates¹⁷⁸ (JCA)*
 Local 410 of the International Brotherhood of Electrical Workers (Local 410)*
 LS Power Development, LLC
 Maryland Office of People's Counsel
 Maryland Public Service Commission
 Monitoring Analytics, LLC acting in its capacity as Independent Market Monitor for PJM (IMM)*
 Natural Resource Defense Council and Sustainable FERC Project*
 Newark Energy Center, LLC
 New Jersey Division of Rate Counsel
 North Carolina Electric Membership Corporation
 Northern Virginia Electric Cooperative
 NRG Business Marketing LLC and Midwest Generation, LLC (jointly)
 Office of the Ohio Consumers' Counsel
 Old Dominion Electric Cooperative
 Onward Energy Holdings, LLC
 Organization of PJM States, Inc. (OPSI)*
 Pennsylvania Jewish Earth Alliance*
 Pennsylvania Office of Consumer Advocate (PA OCA)*
 Pennsylvania Public Utility Commission (Pennsylvania Commission)*
 PJM Industrial Customer Coalition
 PJM Power Providers Group (P3)*
 PPL Electric Utilities Corporation (PPL Electric)*
 Public Service Electric and Gas Company, PSEG Power LLC, and PSEG Energy Resources & Trade LLC (PSEG Companies)
 Public Citizen, Inc.
 Public Interest Organizations¹⁷⁹ (PIO)*
 Rockland Electric Company

¹⁷⁸ Joint Consumer Advocates consist of the Illinois Attorney General's Office, Illinois Citizens Utility Board, Maryland Office of People's Counsel, New Jersey Division of Rate Counsel, Office of Ohio Consumers' Counsel, and Office of the People's Counsel for the District of Columbia. Each of the Joint Consumer Advocates moved separately to intervene in this proceeding.

¹⁷⁹ Public Interest Organizations consist of Earthjustice, Natural Resources Defense Council, Sierra Club, and Sustainable FERC Project.

Shell Energy North America (US), L.P.
Sierra Club
Solar Energy Industries Association
Southern Maryland Electric Cooperative
Talen Energy Corporation
Third Act District of Columbia*
Third Act Illinois*
Third Act Maryland*
Third Act Ohio*
Third Act Pennsylvania*
Third Act Virginia
UGI Utilities Inc.
Vistra Corp.
Vitol Inc. and VC Renewables LLC

Appendix B

List of Intervenors in Docket No. ER25-1357-000

*Filed comments or protests

Advanced Energy United
American Clean Power Association*
American Electric Power Service Corporation
AMP*
America's Power*
Avangrid Power, LLC
Boston Energy Trading and Marketing, LLC
Bowfin KeyCon Holdings, LLC
Buckeye Power, Inc.
Calpine Corporation (Calpine)*
Constellation*
Crete Energy Venture, LLC and Lincoln Generating Facility, LLC
Delaware Municipal Electric Corporation, Inc.
District of Columbia Office of the People's Counsel*
Dominion Energy Services, Inc. (Dominion)*
Duquesne*
East Kentucky Power Cooperative, Inc. (EKPC)*
EDF Renewables, Inc.
EPSA*
Electric Consumers Resource Council
Enerwise Global Technologies, LLC
Exelon
Fairless Energy, L.L.C.¹⁸⁰*
FirstEnergy Companies*
Garrison Energy Center LLC*
Governor Josh Shapiro and the Commonwealth of Pennsylvania (Pennsylvania)*
Hazleton Generation, L.L.C.*
Illinois Attorney General's Office*
Illinois Citizens Utility Board*
Illinois Municipal Electric Agency
IMM*

¹⁸⁰ In filing its protest, Fairless Energy, L.L.C., joins Garrison Energy Center, L.L.C.; Hazleton Generation, L.L.C.; J-POWER USA Development Company, Ltd.; Red Oak Power, LLC; and Vermillion Power, L.L.C. (collectively, Indicated Merchant Generators).

Industrial Energy Consumers of Pennsylvania
Invenergy Renewables LLC and Invenergy Thermal LLC
J-POWER USA Development Co., Ltd.*
Kentucky Attorney General*
Kentucky Public Service Commission
LS Power Development, LLC (LS Power)*
Maryland Office of People's Counsel*
New Jersey Board of Public Utilities (New Jersey Commission)*
New Jersey Division of Rate Counsel*
North Carolina Utilities Commission (North Carolina Commission)*
North Carolina Public Utilities Commission, The Public Staff*
Northeastern Rural Electric Membership Corporation
NRG Business Marketing LLC and Midwest Generation, LLC
Office of the Ohio Consumers' Counsel*
Old Dominion Electric Cooperative
Pennsylvania Office of Consumer Advocate
Pennsylvania Public Utility Commission (Pennsylvania Commission)*
PJM Industrial Customer Coalition
P3*
PPL Electric Utilities Corporation
Public Citizen, Inc*
PSEG Companies
Public Utilities Commission of Ohio's Office of the Federal Energy Advocate (Ohio FEA)*
Rockland Electric Company
Shell Energy North America (US), L.P.
Sierra Club*
Solar Energy Industries Association*
Southern Maryland Electric Cooperative, Inc.
Talen Energy Corporation (Talen Energy)*
Retail Energy Supply Association
Vermillion Power, L.L.C.*
Vistra Corp.
Wolverine Power Supply Cooperative, Inc.