

Decision No. C25-0057

BEFORE THE PUBLIC UTILITIES COMMISSION OF THE STATE OF COLORADO

PROCEEDING NO. 24A-0547E

IN THE MATTER OF THE APPLICATION OF PUBLIC SERVICE COMPANY OF COLORADO FOR APPROVAL OF ITS 2025-2029 DISTRIBUTION SYSTEM PLAN AND THE GRID MODERNIZATION ADJUSTMENT CLAUSE.

**COMMISSION DECISION
REQUIRING THE FILING OF ADDITIONAL
INFORMATION PURSUANT TO COMMISSION RULE
1303(C)(III)**

Issued Date: January 24, 2025

Adopted Date: January 22, 2025

I. BY THE COMMISSION

A. Statement

1. On December 16, 2024, Public Service Company of Colorado (“Public Service” or the “Company”) filed its Application for Approval of its 2025-2029 Distribution System Plan (“DSP”) and Grid Modernization Adjustment Clause (“GMAC”) (“Application”).

2. By this Decision, the Commission requires Public Service to provide additional application information consistent with the discussion below pursuant to 4 *Code of Colorado Regulations* (“CCR”) 723-1-1301(c)(III) of the Commission’s Rules of Practice and Procedure no later than February 14, 2025.

B. Procedural Background

3. On December 16, 2024, Public Service filed its Application pursuant to § 40-2-132, C.R.S., and Commission Electric Rules 3529 to 3541, for approval of the Company’s 2025-2029

DSP as well as its proposed GMAC rider. The Application includes testimony from eight witnesses.

4. Pursuant to § 40-6-109.5, C.R.S., and Rule 1303, 4 *Code of Colorado Regulations* (“CCR”) 723-1, this Application would have automatically deemed complete on February 1, 2025. Pursuant to Commission Rule 3528(b), 4 CCR 723-3, within 30 days of the filing of the application, the Commission shall issue a decision addressing whether the contents of the DSP meet Commission standards based on the information provided by the utility set forth in paragraph 3528(d). By Decision No. C25-0032, the Commission tolled the determination of completeness pursuant to Commission Rule 1303 and Commission Rule 3528(b).

5. The Commission received timely interventions of right or motions for intervention in this Proceeding from Trial Staff of the Colorado Public Utilities Commission (“Staff”); the Colorado Office of the Utility Consumer Advocate (“UCA”); the Colorado Energy Office (“CEO”); Colorado Energy Consumers Group (CEC”); the City and County of Denver (“Denver”); the Interstate Renewable Energy Council (“IREC”); Pivot Energy Inc. (“Pivot”); the Eastern Metro Area Business Coalition; the City and County of Boulder (“Boulder”); Holy Cross Electric Association Inc. (“Holy Cross”); Western Resource Advocates (“WRA”); Tesla, Inc. (“Tesla”); the Southwest Energy Efficiency Project and Natural Resource Defense Counsel, jointly (“SWEEP/NRDC”); Mission:data Coalition, Inc. (“Mission:data”); and filing jointly, the Colorado Solar and Storage Association (“COSSA”) the Solar Energy Industries Association (“SEIA”) and the Advanced Energy Economy (“AEE”) (“COSSA/SEIA/AEE”).

6. The Commission discussed the completeness of the Application at the January 22, 2025, Commissioners’ Weekly Meeting (“CWM”). The Commission will determine completeness

of the Application for purposes of § 40-6-109.5, C.R.S., at a future date. The Commission will also determine if Application is complete pursuant to Rule 3528(d) at a future date.

C. Background and Discussion

7. The Company's Application presents a "detailed discussion and transparent view into how Public Service plans its distribution system to safely, reliably, and cost effectively deliver electric service to customers while addressing the new challenges the Company (and the electric utility industry as a whole) are facing."¹ The DSP Application builds off the Company's inaugural DSP plan (covering years 2022-2024), approved in Proceeding No. 22A-0189E.

8. In its Application, the Company requests, at a high-level, several approvals, including: (1) Approval of the GMAC framework, including the Type 1 and Type 2 GMAC categorizations and the GMAC performance screen approach; (2) Authorization to commence the GMAC and approval of the associated GMAC tariff; (3) Approval of the Company non-wires alternative ("NWA") proposals and approach to evaluation; (4) Approval to implement any tariff revisions that may become necessary to allow undergrounding-related efforts in our non-franchised areas; (5) Authorization of deferred accounting treatment for expenses that have been incurred or are expected to be incurred as related to this DSP, at no return, to be brought forward for review and recovery in a future Phase I electric rate case; (6) The variances requested by separate motion to allow for implementation of the Plan with respect to the timing of the Phase II NWA solicitation process; and (7) Any other relief necessary to implement this DSP.

9. Overall, the Company requests approximately \$4.9 billion in total distribution-related capital spending in the 2025 to 2029 timeframe, to be recovered through the GMAC.² This

¹ Application, p. 2.

² Hrg. Ex. 101, p. 45 (Table JWI-D-5).

represents an almost 12x increase in capacity investments relative to the 2022-2024 plan and a doubling of similar annual distribution investments made in 2023, the last full year such data is available. The spending is apportioned into numerous categories, including asset health and reliability; capacity; tools and communications; new business; transportation electrification plan; wildfire mitigation efforts; and AGIS.³ The DSP purports to increase Public Service’s system to include 187 substations, 386 banks, and an additional 306 feeders by 2029 in order to support electrification growth on the local grid.

10. In this Proceeding, the Company presents a “Grid of the Future” vision for 2050 and presents a “new, customer-centric” approach to forecasting. The Company presents two modelling efforts—the internally used LoadSEER model as well as long-term modeling conducted by Kevala of four scenarios of future technology adoption referred to as: (1) goal aligned; (2) policy aligned; (3) calibration; and (4) adoption informed. These efforts are an evolution of the Company’s existing planning processes and are presented to the Commission for the first time in this Proceeding.

11. In addition to new forecasting approaches, the Company also presents a new NWA screening protocol,⁴ two pilots (the Pivot Energy-Smart Controls for Flexible Interconnection and the Encoord Targeted Least-Cost Electrification Simulation),⁵ a new staffing analysis required by SB 24-218, and a new approach to categorizing distribution activities for rider recovery purposes.

12. Many of the proposals contained in the DSP are novel to the Commission, and the Application incorporates requirements from newly enacted legislation from the 2024 legislative session, including SB 24-218 and SB 24-207. In particular, SB 24-218, effective May 22, 2024,

³ See Hrg. Ex. 101, p.46 (Table JWI-D-3) .

⁴ Hrg. Ex. 105, p. 90 (Figure DSM-D-37).

⁵ Hrg. Ex. 108, Att. BJC-1.

and codified at § 40-2-132.5, C.R.S., creates numerous additional filing requirements for this DSP. In addition to the newly enacted legislation, filing requirements for this Application originate from several different sources.⁶ The Commission's DSP Rules⁷ establish very specific and robust Application requirements. The Company also committed in the settlement to its inaugural DSP (Proceeding No. 22A-0189E) to present certain information in this DSP, and was ordered to present additional information in the through Decision No. R23-0080.⁸

13. The Commission has also recently issued decisions in multiple proceedings that require presentation of certain information in this DSP. For example:

- The Commission examined third-party provisions of gas demand response, virtual power plants, and neighborhood electrification in Public Service's service territory in Proceeding No. 23M-0466EG. Through Decision No. C24-0211, the Commission required the Company to propose the acquisition and implementation of the Phase II DERMS in its next DSP application filing or other appropriate venue.⁹
- In Proceeding No. 23M-0464EG, the Commission considered implementation of certain aspects of SB 23-291, including those related to disconnections and study of potential barriers to beneficial electrification and distributed energy resources. Through Decision No. R24-0242-I, Hearing Commissioner Gilman ordered the Company to present updated longer-term improvements to communication and processes for service requests, distribution system upgrades, and forecasting in this DSP.¹⁰ The Company was also ordered to provide details in its next DSP application filing regarding how costs are shared when the Company elects to upgrade beyond what is needed just to serve the applicant's load, including how any common costs are allocated between an applicant and the Company as well as elaborate on what, if any, future growth projections should be factored into grid upgrades, when needed, to avoid costly piecemeal additions to the system.¹¹ The Hearing Commissioner also recommended that Public Service include capacity available maps and a capacity reservation pilot in this DSP Application and consider using a cluster study approach.¹²
- In Proceeding No. 23A-0471E, the Commission also ordered the Company to present certain information regarding its treatment of customer data and the methods by which

⁶ See Hrg. Ex. 101, Attachment JW1-1.

⁷ Commission Rule 3526 *et seq.*

⁸ See Decision No. R23-0080, issued in Proceeding No. 22A-0189E, on February 2, 2023, at ¶¶ 75-79.

⁹ See Decision No. C24-0211, issued in Proceeding No. 23M-0466EG, on April 5, 2024, at ¶ 44.

¹⁰ Decision No. C24-0242-I, issued in Proceeding No. 23AM-0464EG, on April 17, 2024, at ¶ 18.

¹¹ *Id.* at 33.

¹² *Id.* at 39-44.

it provides customers access to that data, including the methods that customers can provide third-party access to their data.¹³

14. The Commission also anticipates that this Proceeding will be highly interrelated to ongoing and future proceedings before the Commission. In particular, the Commission has already highlighted the potential overlap between the Company's Just Transition Plan ("JTS") (Proceeding No. 24A-04422E) and this Proceeding.¹⁴

D. Findings, and Conclusions

15. In determining whether the Company complied with the above filing requirements, the Commission determined that several pieces are missing, and that further supplementation is required before the Commission can determine completeness for the purposes of § 40-6-109.5, C.R.S.

16. Pursuant to Commission Rule 1303(c)(III), "[i]f the Commission finds that more information is necessary before deeming the application complete (e.g., to understand fully the implications of an application and the requested relief), it may issue a decision identifying such information and establishing a deadline for supplementation." Here, due to the novel proposals by the Company, the scope and breadth of this Application, and the multitude of sources of filing requirements, we find that additional information is necessary before we can deem the Application complete.

¹³ Decision No. C24-0815, issued in Proceeding No. 24A-0471E, at 45-48.

¹⁴ See Decision No. C24-0956-I, issued in Proceeding No. 24A-0442E, on December 31, 2024, at ¶ 15; Decision No. C24-0941-I at ¶ 61.

17. Therefore, we find, pursuant to the provisions of Rule 1303(c)(III), that more information is necessary before deeming the Application complete. We accordingly direct the Company to address:

- a. Please provide a 20-year rate analysis through 2044 in an executable format with the following assumptions and elements:
 - i. the gross capital spending projections should be taken from the JTS testimony (Hearing Exhibit 101, Att. JWI-5, "RevReq" sheet), which includes \$122 B of total capital spending over 20 years, of which over \$40 B is for new distribution infrastructure.
 - ii. The analysis should produce two revenue requirements: one for all customer classes that are currently paying for the TCA-D and one solely for the residential class.
 - iii. In allocating T&D investment to the individual customer class revenue requirements over 20 years, the Company should apply that the 4CP-AED T&D cost approach that was approved in the 2023 Phase II Electric rate case (Proceeding No. 23AL-0243E).
 - iv. In calculating the customer class allocators, the Company should apply the same load forecasts that have been used to support the base case request in this proceeding. That value should also match the load forecasts in the base case of the JTS.
 - v. In calculating future rates, the Company should apply the annual residential and total TCA-D customer usage based on the load forecasts in this case.
- b. Please provide in executable format an 8,760 hourly matrix (365 days x 24 hrs / day) and a summary 12 x 24 (averaging loads in each hour in each month) for three customer classes: the residential class, the classes that comprise the TCA-D customers, and for all retail customers. The analysis should include the following components:
 - i. The 8760 and 12 x 24 load forecasts used to support the proposed distribution investment proposal for each of these 3 customer class groupings in 2024, 2030, 2035, 2040, & 2045.

- ii. For each of these four forecast years (2030-2045), and for the three customer class groupings, provide additional 8760 and 12 x 24 matrices that break out the load associated with beneficial electrification, behind-the-meter solar, EVs, and remaining contributions to load. In doing so, please back out the growing load from each category from the requested matrices and present the resulting revised forecasted matrices. (The sum of the 4 parts of each customer class forecasts should be equal to the first set of overall customer class forecasts for each hour presented.)
- c. Please provide five years of historical data to the investment categories referenced in Figure ES-5 and Table KAB-D-1.
- d. Please indicate the status of the Company's implementation of Virtual Power Plants consistent with our decision in Proceeding No. 23M-0466EG.
- e. Figure ES-1¹⁵ indicates average household peak electric consumption will approximately triple from 5 kW to 16 kW/household over the projection period. With respect to that conclusion, please:
 - i. Provide all supporting spreadsheets and analyses, in executable format, if not already on the record;
 - ii. Indicate the extent to which the Company will apply load management activities, and the associated mitigation of coincident use due to such load management activities, for loads associated with (separately): EVs, ASHPs, HPWHs;
 - iii. Indicate, by number and percentage of single family and multi-family households (separately) in Public Service service territory, the 5-year historic adoption rate and 20-year projection of future adoption of households that have: (a) ASHP-standard with electric resistance backup; (b) ASHP-standard with gas backup (i.e., hybrid); (c) SHP-cold climate with electric resistance backup; (d) ASHP-cold climate hybrid systems (e) HPWH; (f) one EV; (g) two EVs; (h) rooftop solar; (i) battery storage; and (j) geothermal heat systems. With respect to future technology adoption, please indicate what was incorporated into the Company's DSP Plan and Kevala's scenario forecasts.

¹⁵ Hrg. Ex. 103, Attachment ZDP-1, p. 2.

- f. SB 24-218 at Section 5(c)(I) requires a Qualifying Retail Utility to present at least two future planning scenarios with corresponding investments to show different future states of the distribution system. Section 5(c)(II) indicates that at least one scenario should incorporate load and managed generation flexibility that may increase system capacity utilization, reduce the need for system upgrades, lowers system costs. The Commission understands Kevala included 50 percent and 100 percent Managed Charging in its long-term Goal Aligned Scenario. Nonetheless:
- i. Please explain if the Company complied with these requirements for the 5-year DSP Plan, and how your analysis is incorporated into your DSP Plan.
 - ii. Specifically, what system upgrades are being reduced via the implementation of load and managed generation flexibility?
 - iii. What is the system cost savings and cost-benefit ratio of your managed load and generation activities?
 - iv. Why did Kevala limit Managed Charging to the Goal Aligned Scenario? Is it possible to incorporate Managed Charging to the Policy Aligned or other scenarios evaluated by Kevala?
 - v. Please explain why the Kevala forecasts, as presented in Figure ES-4¹⁶, do not cross the DSP Base line until approximately 2030 or later. Is this because the Kevala forecasts included different technology adoption rates than the Company? Please provide all data to support differences between the Company's and Kevala's forecasts.
- g. Please refer to the Company's February 12, 2024 presentation in Proceeding No. 23M-0464EG (titled *Overview of the Distribution System Constraints, Solutions, and Opportunities*):
- i. Please update the presentation using 2024 data or the latest twelve months if full-year 2024 data is not yet available. In particular, the Commission seeks updated data for pp. 11-13;
 - ii. Regarding the data indicating feeders (23 percent) and banks (3 percent) were overloaded in 2023, indicate how many of these incidences led to loss of load, equipment failure or other negative consequences?
 - iii. Please explain how a feeder and bank (separately) can operate above its rating, and the associated impacts on equipment life. Please provide supporting data.
 - iv. For each of the last five years, please indicate the number of substations, banks, and feeders the Company has installed in its service territory.

¹⁶ Hrg. Ex. 101, p. 9.

- h. Please indicate specifically where in the Application the Company complies with Decision No. C24-0815 including the directives in paragraphs 45-49. If not currently included in the filing, please provide.

18. The Company shall file this information within this Proceeding no later than February 14, 2025.

19. Pursuant to Commission Rule 1303, if the applicant files responsive information or offers an explanation to the satisfaction of the Commission, the Commission shall issue a decision deeming the application complete for purposes of § 40-6-109.5, C.R.S. The Commission will determine completeness of the Application for purposes of § 40-6-109.5, C.R.S., at a future date after receiving the information discussed in this Decision. The Commission will also determine if Application is complete pursuant to Rule 3528(d) at a future date.

II. ORDER

A. The Commission Orders That:

1. The determination pursuant to § 40-6-109.5, C.R.S. regarding the completeness of the Application for Approval of its 2025-2029 Distribution System Plan and Grid Modernization Adjustment Clause (“Application”) filed on December 16, 2024, by Public Service Company of Colorado (“Public Service”) is delayed to a future date. The Application shall not auto-deem complete on February 1, 2025.

2. Pursuant to 4 *Code of Colorado Regulations* (“CCR”) 723-1-1301(c)(III) of the Commission’s Rules of Practice and Procedure, Public Service shall file the information discussed above no later than February 14, 2025.

3. This Decision is effective immediately upon its Issued Date.

**B. ADOPTED IN COMMISSIONERS' WEEKLY MEETING
January 22, 2025.**

(S E A L)



ATTEST: A TRUE COPY

Rebecca E. White,
Director

THE PUBLIC UTILITIES COMMISSION
OF THE STATE OF COLORADO

ERIC BLANK

MEGAN M. GILMAN

TOM PLANT

Commissioners