Decision No. R20-0301-I

BEFORE THE PUBLIC UTILITIES COMMISSION OF THE STATE OF COLORADO

PROCEEDING NO. 19M-0670E

IN THE MATTER OF THE COMMISSION'S IMPLEMENTATION OF § 40-2-132, C.R.S., RELATING TO DISTRIBUTION SYSTEM PLANNING.

INTERIM DECISION OF
HEARING COMMISSIONER
JEFFREY P. ACKERMANN
SCHEDULING WORKSHOPS

Mailed Date: April 28, 2020

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I. STATEMENT

1. On December 3, 2019, the Commission issued Decision No. C19-0957 opening this Proceeding to collect comments and other information given statutory changes in Senate Bill (SB) 19-236 that, among other revisions, creates § 40-2-132, C.R.S., directing the Commission to promulgate rules regarding the filing of Distribution System Plans (DSPs) by Colorado electric utilities. In Decision No. C19-0957, the Commission stated that the Hearing Commissioner work with the Staff of the Colorado Public Utilities Commission (Staff), stakeholders, and other interested participants to collect and organize information, conduct public

comment hearings, and make recommendations to the full Commission as to possible next steps in promulgating rules required by § 40-2-132, C.R.S.

2. Initial Comments were filed by Larry Miloshevich, the City and County of Denver (Denver), Karey Christ-Janer, Colorado Solar and Storage Association and Solar Energy Industries Association (COSSA/SEIA), Black Hills Energy (Black Hills), the Colorado Energy Office (CEO), the Advanced Energy Economy Institute (AEE), Vote Solar, Western Resource Advocates, (WRA), IBEW Local No. 111, the Southwest Energy Efficiency Project (SWEEP), the Colorado Office of Consumer Counsel (OCC), and Public Service Company of Colorado (Public Service). WRA and COSSA/SEIA also filed draft DSP rules.

3. Reply Comments were filed by Larry Miloshevich, COSSA/SEIA, Black Hills, Recurve Analytics, Inc., Denver, Vote Solar, Karey Christ-Janer, WRA, AEE, CEO, Colorado Energy Consumers (CEC) and Public Service. CEO and Public Service also filed draft DSP rules.

4. This Decision establishes a schedule for two workshops and supplemental filings requested of the utilities, as well as a final round of comments based upon the two workshops, as well as responses to the draft rules that have been submitted by various participants

A. Discussion

5. Decision No. C19-0957 established that the purpose of this Proceeding is to invite interested stakeholders to submit comments and potentially file rule change proposals prior to the Commission's issuance of a Notice of Proposed Rulemaking for DSP filings as required by § 40-2-132, C.R.S. Responses to questions set forth in that Decision can help inform the Commission of the costs and benefits, impacts to ratepayers, regulatory and policy implications,

and impact on Distributed Energy Resources (DER) integration and growth due to the filing of DSPs and the evaluation of Non-Wires Alternatives (NWA).

6. Participants were encouraged to provide comments that are responsive to the following issues:

a) Guidance or policy statements regarding the purpose of initiating a DSP process;

b) Issues surrounding NWAs;

c) Modeling load growth, DER forecasts and scenario analysis;

d) What needs to be included in DSP filings, and frequency of filings;

e) Data, data privacy, and data security issues;

f) Developing a cost-benefit framework;

g) Hosting Capacity Analysis (HCA) and Interconnection;

h) Coordination of filings and suggestion of other issues this proceeding should address; and

i) How often plan should be updated.

7. Most participants provided a Guidance or Policy Statement concerning the purpose of DSP, including:

a) "to provide additional information on the electric distribution planning process, to enhance planning as DER implementation continues, and to provide the opportunity to examine the costs and benefits of some conventional distribution system investments, as well as potential alternatives to those conventional distribution system investments, where such alternatives are feasible and beneficial"

b) "the purpose of implementing rules around DSP is to create a process to modernize the grid in a manner that will protect safety, reliability and resiliency as the energy sector transitions toward the state's decarbonization goals in a cost-effective manner that benefits ratepayers."

c) "to move Colorado's utilities more rapidly toward the grid of the future by establishing a process to review investment in, and utilization of the utility's distribution grid."

8. In addition to the Policy Statements, participants provided other recommendations for consideration by the Commission when reviewing or approving a DSP. These included: encouraging more active communication between utilities and the communities they serve; avoiding slowing or delaying other utility planning activities and proceedings; maintaining system safety, reliability, resilience, and security; establishing cost-benefit analysis; ensuring DSP creates value for customers; and providing flexibility and adaptability so that processes can be adjusted as more information is learned. In addition, there is general agreement with the need to promote market-based innovation, as well as reduce emissions, including greenhouse gases.

9. Many participants were in agreement with the guidance requirements concerning contents of a DSP provided by CEO which include:

a) System Overview;

b) Forecasts of Load and DER Adoption;

c) Hosting Capacity Analysis;

d) Grid Needs Assessment, including identification of upcoming major distribution grid projects;

e) Suggested Non-Wire Alternatives, including a Cost-Benefit Analysis justifying what was included and what was not;

f) Pilot proposals, including grid modernization efforts;

g) Risk management plans;

h) Action plans summarizing actions the utility will take;

i) Evaluation and reporting proposal; and

j) Cost recovery proposal.

10. The utilities responded that the Commission should focus on requirements that provide the highest value while preserving needed flexibility to plan and operate their systems.

11. In its reply comments, Public Service suggests a “comment-based non-litigated approach to the DSP filing.”[1] The company cited the additional planning requirements associated with other efforts (such as the development of Transportation Electrification Plans) and the high resource demands on all parties that a fully-litigated DSP can require (nearly a year of involvement), especially if the filings occur more frequently than every four years. Public Service also offered that a non-litigated approach may allow for more community participation from stakeholders without the resources to participate in litigated proceedings. Many other participants disagreed with this approach and express the need for a fully litigated process for DSP.

12. WRA and COSSA/SEIA on the other hand recommend “the Commission should require that each DSP include, at a minimum: 1) 10-year forecasts for load and DER, 2) system and substation historical data, and 3) hosting capacity analysis that will be made public and updated on a monthly basis.”[2] Beyond the minimum identified here, other non-utility parties request significant data development and disclosure.

13. In addressing questions from the Commission surrounding load forecasting, DER growth and scenario analysis, Public Service provides the perspective that utilities are developing load forecasting using a “‘bottom-up’ methodology, primarily based on customer applications requesting new service or service upgrades.”[3] In addition, “DERs are forecasted using a “bottom-up” approach based on customer applications.”[4] Public Service adds that it is in

[1] Public Service Reply Comments at p. 5.
[2] COSSA/SEIA Initial Comments at p. 34.
[3] Public Service Initial Comments at p. 24.
[4] *Id.* at pp. 24 and 25.

the process of software updates which will strengthen its forecasting capabilities in 2020 and 2021.

14. Black Hills states that it develops a system-wide load forecast and a localized forecast of specific areas of the distribution system. The localized forecast includes datasets on each distribution feeder's non-coincident peak and number of customers added to each feeder in the previous 12 months. This localized forecast allows the distribution planner to evaluate specific areas of the distribution system and identify the unique needs of various territories.

15. Both utilities note that more analysis was required, and many assumptions would need to be made in order to conduct "nascent" forecasting efforts associated with high electrification and / or DER. All parties agree forecasts should be reviewable by stakeholders as a part of the DSP.

16. Participants believe that transparent load growth forecasts are an essential component of a DSP and must be developed with stakeholder input to enable a realistic assessment of NWAs. The DSP should identify all data sources and models used to develop forecasts and should also describe in detail the methodologies used. COSSA further explains that because forecasting methodologies will likely continue to evolve in response to new technologies and increased understanding and use of customer-based load resources, they should be revisited on a frequent basis.

17. The Commission asked several detailed questions surrounding NWAs. There was general agreement among the participants that the first DSP-NWA cycles will be a learning opportunity and pilots could be used. The statute requires the Commission to establish thresholds

(project type, cost, and timing) for NWAs. Public Service states that thresholds should not be too rigid, and could be broken into such categories as:

- capacity needs;
- timeline of desired solution;
- project alternatives; and
- an economic screen."

18. Black Hills agrees with Public Service's comment concerning rigidity of the thresholds and suggests determining thresholds should follow additional inquiry and workshops.

19. There is a divergence of opinions from the participants when it comes to how a DSP manages data, data privacy, and data security. Public Service believes that it is premature to specifically describe what data should be shared and with what parties or stakeholders. Further, once a framework has been established for reporting and information sharing, then the discussion can begin on what restrictions and protections are necessary. Public Service recommends that the Commission facilitate a further process or discussion to inform the Commission and participants in this case about appropriate levels of data that can be provided in a DSP.

20. Participants did provide agreement on a few data issues, including: that differences on data may be narrowed through further prioritization and discussion; customers have a right to their usage data and should be able to practically share it with third parties; and the Commission needs to provide guidance, syncing its aims for DSP with other existing data security policies.

21. Black Hills addresses data privacy, arguing that the 15/15 requirement in Rule 3033(b) of the Commission's Rules Regulating Electric Utilities, 4 *Code of Colorado Regulations* 723-3, means that, at minimum, the aggregated data set – with all customer

identifiers removed – contains at least 15 customers and no single customer in the data set comprises more than 15 percent of the total customer data aggregated by customer class. Black Hills believes the 15/15 rule has performed well, since its adoption to protect the privacy of customers' data.

22. Denver counters that the current data privacy rules do not adequately support DSP and restrict the ability for communities and customers to measure progress towards clean energy targets generally. Denver believes that access to complete and accurate data provides the foundation for a customer or community to establish and achieve clean energy targets.

23. The Commission asked what types of costs and benefits should be considered when quantifying the value of NWAs in distribution planning and operations. This is another area with divergent opinions, however, there is agreement that such analysis can and should be developed over time.

24. OCC does not propose inclusion of cost and benefit tests at the outset of planning. OCC believes that, initially, the Commission should establish regimes to get the utilities comfortable with developing their cost-benefit methodology, reporting these methodologies, implementing the methodologies and providing reports of the analysis process and results transparently, and, ultimately, completing reviews and post-project assessments.

25. Public Service suggests it is premature to take steps to establish a cost benefit methodology to evaluate an NWA versus a Traditional Utility Investment (TUI). The Company argues that with the many complex factors involved in evaluating the costs and benefits of a TUI and an NWA, further development of these concepts and input from stakeholders is appropriate before a methodology is developed. COSSA and SEIA agree that a stakeholder process should be developed, similar to other states such as New York, California, and Rhode Island.

26. WRA adds that the Commission should avoid broad, vague efforts to evaluate DERs, but instead urges the Commission to evaluate the value proposition of specific DER projects in the context of NWA proposals. WRA believes utilities should develop a methodology with interested stakeholders and have it approved by the Commission.

27. Several parties point to the National Efficiency Screening Project (NESP), which is currently developing a National Standard Practice Manual for Benefit-Cost Analysis of Distributed Energy Resources. NESP plans to publish the manual in June 2020, and this manual should provide a helpful framework and guidance for the Commission's DSP rules.

28. The Commission also asked several questions regarding the development of Hosting Capacity Analysis and potential changes to Interconnection policies or rules. Several participants agreed with WRA's suggestion that a key purpose of Hosting Capacity Analysis is to allow for more expedient interconnection processes by allowing developers to identify where there is hosting capacity space and where interconnection is likely to come with significant additional cost.

29. COSSA argues that the Commission should require utilities to employ a methodological framework that is non-static and robust, integrating DER analysis together with overall system planning. COSSA also recommends that the Commission require the Colorado utilities to provide updated HCA via a web portal on a monthly basis, consistent with the California PUC issued guidance for the frequency with which utilities in that state should refresh publicly available hosting capacity maps.

30. Both utilities agree that HCA can be useful, but caution that increased frequency and granularity are expensive and time-consuming and will likely not be a cost-effective investment from the utilities' perspective.

31. Finally, the Commission asked how DSP filings can be coordinated with other filings with the Commission. A smaller number of participants responded to this question, including WRA who believe that a new DSP process would be used complementary to, but not a replacement for existing planning proceedings, like electric resource planning, Renewable Energy Standard compliance plans, or demand side management plans. Public Service pointed out that until the potential form of DSP rules and the effect they may have on overall distribution planning and operations become clearer, the questions are difficult to answer with specificity.

32. With the filing of Initial and Reply Comments, as well as several draft rule submissions, the Hearing Commissioner plans to focus this proceeding on two discrete goals, accompanied by workshops. The first is determining what the utilities need to file in their initial detailed DSP filing. The Commission would like to learn about the information needed for:

a) Assessment of Current System Conditions, Capabilities, and Observability;
b) Forecast of Load and DER Deployment (including scenario analysis);
c) Safety and Reliability Concerns;
d) Assessment of Cyber and Physical Security Risks;
e) Hosting Capacity Analysis (HCA);
f) Identification of Projected System Needs and Opportunities;
g) Grid Innovation Study/ Action Plan;
h) Stakeholder Outreach Summary; and
i) Data from other Applications and Proceedings relevant to DSP.

33. The first workshop will feature Staff members from other Commissions and DSP experts speaking about the development of DSPs, with a particular focus on requirements surrounding HCA and grid need assessments. For example, which HCA methodology should the utilities adopt and what are the different limitations and costs? What process should be developed for stakeholder input on HCA development? What policy goals will the HCA support

and what are the potential use cases? How accurate should the HCA data be, what types of DER should be modeled, and how should the information be displayed and shared? This workshop will help to frame best practices and lessons learned for valuable and reliable information, forecasts, data and HCA.[5] Colorado utilities and stakeholders are encouraged to offer to present at this web based-workshop. Stakeholders are encouraged to work together on joint presentations. Registration requests, ideas, and questions surrounding these presentations should be sent to Commission Advisor James Lester at james.lester@state.co.us. This virtual workshop will be held via GoTo Meeting on May 22, 2020.

34. Prior to the first workshop, we request that the jurisdictional electric utilities submit what each considers its current DSP or equivalent. This would facilitate the Commission's understanding of current distribution planning practices by jurisdictional utilities in Colorado. If there is not a discrete plan that can readily be filed within the next two weeks, then in the alternative the Commission requests that a narrative outlining the current process by which the utility determines distribution system operational status, how it projects when and where new investments will be needed, how it identifies infrastructure solutions, the data sets and forecasts used by distribution planners to determine its distribution system plan, a discussion on how it compares capital projects to non-utility projects or operation and maintenance, and its current capabilities to collect information about the operations of its distribution system (*e.g.*, level of distribution SCADA, utilization of advanced meter infrastructure (AMI) to inform system operations, etc.). Include current cost/benefit analysis methodologies. Receipt of this

[5] IREC offers suggestions of technical criteria for HCA analysis, and the data fields to include in any next generation of online tools. Attachment A to this Decision is an initial list of IREC suggested data fields and suggested workshop HCA topics.

information at least a week prior to the May 22, 2020, workshop, (*e.g.,* by May 15, 2020) is requested.

35. The second goal and workshop will be on the development and analysis of Non-Wires Alternatives. The Commission will invite utilities, stakeholder, and outside experts to develop a presentation on an "Envisioned NWA Project." The Commission would like to learn about the evaluation of an NWA using as much real world data as is available. The presentation should explain what data, metrics, screening and evaluation criteria, and potential sourcing options that can be used to develop this project, what system constraints this project would be expected to relieve, and a discussion of the cost and benefits used to evaluate the NWA project versus a wires alternative investment. The envisioned project should also describe any cost recovery or incentive mechanism. This workshop is tentatively scheduled for June 12, 2020 at the Colorado Public Utilities Commission. The workshop will also be webcast on the Commission's website and/or GoTo Meeting.

36. In addition to participation in the workshop, the Commission requests that each jurisdictional utility present data and information describing specific situations where NWA options were considered. This would facilitate the Commission's understanding of how NWA's are currently integrated into the jurisdictional utility's distribution system management. At a minimum, the information being sought is: a description of the distribution grid operational concern identified (generic description of the current portion of the grid affected, including data on capacity, anticipated/actual system concern, cause of the concern, number of customers affected, etc.); projected timeline before the system concern manifests; traditional options considered; NWA/non-traditional options considered; review/selection criteria and process; and

decision(s) made. More than one example per utility is desired. Receipt of this information at least a week prior to the June 12, 2020, NWA workshop (*e.g.,* by June 5, 2020), is requested.

37. The Commission notes that in its comments, Public Service states that it will continue to commit to an open, transparent, and collaborative process for involving stakeholders in its distribution planning process, including written outreach steps into its proposed DSP rule. The Company states it will hold stakeholder meetings prior to the filing to review the preliminary plans and seek meaningful input from those stakeholders for consideration in the DSP filing. The Company will also place information on its corporate website with information on how stakeholders can provide written comments. The Commission appreciates this commitment to stakeholder engagement, but makes a request of the utilities and participants in this proceeding. Many participants requested further stakeholder engagement and workshops on issues the Commission views as very important to develop both DSP rules, as well as a process for refining and improving DSP filings and NWA evaluations. We recommend the participants form stakeholder work groups to continue the discussion resulting from the work groups called for in the Decision, focusing on: 1) HCA and Grid Needs Assessments; 2) NWA screening and evaluation criteria; 3) refinement of Benefit Cost Analysis; and 4) the development of web based data portals, including data privacy and cybersecurity concerns. The Commission would like to see these stakeholder groups result in consensus (or near-consensus) draft DSP rules or recommendations for flexibility and improvements to the DSP process that do not need to be codified into rules.

38. Finally, we would like to receive a final round of comments based upon the two workshops, as well as responses to the draft rules that have been submitted by various

participants. Comments responsive to these workshops and draft rules will be due on June 30, 2020.

II. ORDER

A. It Is Ordered That:

1. A workshop on distribution filing requirements and Hosting Capacity Analysis is scheduled as follows:

DATE: Friday, May 22, 2020

TIME: 1:00 p.m. to 5:00 p.m.

PLACE: GoTo Meeting

2. A workshop on Non-Wires Alternatives and Cost Benefit Analysis is scheduled as follows:

DATE: Friday, June 12, 2020

TIME: 1:00 p.m. to 5:00 p.m.

PLACE: DORA Conference Room
Floor
1560 Broadway
Denver, Colorado

3. Comments responsive to these workshops, draft rules, and in response to the questions posed above are due by 5:00 p.m. on June 30, 2020.

4. This Decision is effective immediately.

(S E A L)

THE PUBLIC UTILITIES COMMISSION
OF THE STATE OF COLORADO

JEFFREY P. ACKERMANN

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Hearing Commissioners

ATTEST: A TRUE COPY

Doug Dean

Doug Dean,
Director