STATE OF NORTH CAROLINA
UTILITIES COMMISSION
RALEIGH

DOCKET NO. E-2, SUB 1297
DOCKET NO. E-7, SUB 1268

BEFORE THE NORTH CAROLINA UTILITIES COMMISSION

In the Matter of Duke Energy Progress, LLC, and Duke Energy Carolinas, LLC, 2022 Solar Procurement Pursuant to Session Law 2021-165, Section 2.(c)	)	ORDER AUTHORIZING A COMPETITIVE PROCUREMENT OF SOLAR RESOURCES PURSUANT TO HOUSE BILL 951 AND ESTABLISHING FURTHER PROCEDURES

BY THE COMMISSION: Section 1 of Session Law 2021-165 (S.L. 2021-165), also known as House Bill 951, directs the Commission to develop a Carbon Plan that takes reasonable steps to reduce carbon dioxide emissions in this State from electric generating facilities owned or operated by Duke Energy Progress, LLC (DEP), and Duke Energy Carolinas, LLC (DEC, together with DEP, Duke), by 70% from 2005 levels by 2030 and to achieve carbon neutrality by 2050. Section 2.(c) of S.L. 2021-165 further authorizes the Commission to direct Duke to conduct a procurement of solar energy resources in 2022 if the Commission determines that solar resources are required in order to meet the carbon emission reduction directives of S.L. 2021-165.

On March 11, 2022, the Commission established this docket for the purpose of considering whether a 2022 Solar Procurement is warranted consistent with the provisions of S.L. 2021-165, Section 2.(c).

On March 14, 2022, Duke filed a Petition for Authorization of 2022 Solar Procurement Program, which seeks Commission authorization of a system-wide competitive procurement seeking a minimum of 700 megawatts (MW) of utility-owned and third-party solar energy resources sited in both North Carolina and South Carolina (Petition). The Petition includes a request for expedited review so as to enable Duke to launch the procurement to align with the 2022 Definitive Interconnection System Impact Study (DISIS) for the purpose of evaluating the interconnection costs associated with bids.

Through various orders, the Commission has recognized the interventions of the Carolina Industrial Group for Fair Utility Rates II (CIGFUR II) and the Carolina Industrial Group for Fair Utility Rates III (CIGFUR III, and together with CIGFUR II, CIGFUR); the North Carolina Sustainable Energy Association (NCSEA); the Carolina Utility Customers Association, Inc. (CUCA); Walmart Inc. (Walmart); the Clean Power Suppliers Association (CPSA); the North Carolina Electric Membership Corporation (NCEMC); the Southern

Alliance for Clean Energy (SACE), the Sierra Club, and the Natural Resources Defense Council (NRDC, and collectively, SACE et al.); and the Carolinas Clean Energy Business Association (CCEBA). Further, the interventions of the Public Staff and the Attorney General's Office are recognized by statute.

On March 28, 2022, the Commission received comments on Duke's Petition from CIGFUR, AGO, SACE et al., Walmart, NCSEA, CUCA, Public Staff, and, jointly, CPSA and CCEBA; and on April 6, 2022, Duke filed its reply comments in support of the Petition.

On April 25, 2022, the Commission issued an Order Requiring Answers to Commission Questions and Establishing Additional Procedural Deadlines (April 25, 2022 Order), and on April 29, 2022, Duke filed its Response to Commission Order Requesting Answers on 2022 SP Program Petition. Consistent with the Commission's April 25, 2022 Order, on May 6, 2022, CPSA, SACE et al., NCSEA, and CCEBA filed responsive comments.

Finally, on May 16, 2022, in Commission Docket No. E-100, Sub 179, Duke filed its proposed Carbon Plan.

ANALYSIS OF NEED FOR AN IMMEDIATE PROCUREMENT

Section 2.(c) of S.L. 2021-165 authorizes the Commission to direct Duke to conduct a procurement of solar energy facilities in 2022 if, based upon review of preliminary analysis developed in preparation of the initial Carbon Plan and stakeholder participation, the Commission determines that additional solar resources are needed in order to comply with the carbon emission reduction directives of Section 1 of S.L. 2021-165.

Per the Petition, Duke's preliminary analysis is largely based upon its most recent system-wide 2020 Integrated Resource Plans (IRPs). Duke states that all 2020 IRP portfolios in both North Carolina and South Carolina support the near-term need for new solar energy resources. Petition at 7. Further, Duke states that a 2022 procurement of new solar energy resources in 2022 is "expected to be needed under all reasonable and feasible future scenarios to meet HB 951's 2030 planning goals." *Id*. Duke's 2020 IRP Portfolios D and E, which both model a 70% carbon emission reduction by 2030, each calls for 4,575 MW of new solar resources by 2030. *Id.* at 9. More specifically, Duke states that its preliminary analysis indicates that at least 4,500 MW of new solar energy resources are needed to meet S.L. 2021-165's resource planning goals by 2030. *Id.* at 14.

In support of the need for an immediate procurement in 2022, prior to finalization of the initial Carbon Plan, Duke states that the interim period between when a distributed energy facility receives an interconnection agreement and when it receives permission to operate for new utility-scale transmission-connected solar projects in the Carolinas can be a multiyear process. *Id.* at 7. Duke's current analysis suggests that solar procured in 2022 will likely not achieve interconnection and commercial operation prior to 2026 and could extend later into the decade if significant network upgrades are required to achieve

interconnection. *Id*. at 8. Also pertinent to the immediate need to initiate a solar procurement, Duke opines that "there may only be four [interconnection study] clusters for new generation facilities to both complete the interconnection study process and complete construction to come online by 2030[,]" which marks the first carbon emission reduction directive (a 70% reduction from 2005 levels) set forth by the General Assembly in S.L. 2021-165. *Id.* at 8.

Finally, consistent with the provisions of Section 2.(c) of S.L. 2021-165, both Duke's and the Commission's processes on this issue have included an opportunity for stakeholder involvement. The Commission finds persuasive that no party, including those advocating on behalf of consumer interests, opposes a Commission directive that Duke initiate a solar procurement in 2022. In light of the following, the Commission agrees that there is a demonstrated need to initiate a solar procurement to coincide with the 2022 DISIS in order to achieve the 2030 carbon emission reduction directive of S.L. 2021-165.

MINIMUM PROCUREMENT VOLUME

Per the Petition, Duke recommends a Minimum Procurement Volume of 700 MW. The Minimum Procurement Volume, not to be confused with a target procurement volume, is intended to provide assurance to market participants that it is worthwhile to incur the time and expense needed to bid.[1] For the purposes of the proposed 2022 Solar Procurement, the Minimum Procurement Volume establishes a guaranteed minimum volume to be procured. In contrast, a target procurement volume sets a capacity goal for a procurement subject to upward or downward adjustment depending on established circumstances. While Duke's Petition also incorporates a "Carbon Plan-informed target volume" or "final 2022 SP target volume" (Target Procurement Volume),[2] Duke does not request Commission approval of a 2022 Solar Procurement Target Procurement Volume until on or before November 1, 2022.

Duke argues that its proposed Minimum Procurement Volume "seeks to strike the right balance between opportunity and risk by procuring a target volume that should be achievable in today's market at a reasonable cost to customers based upon the best information available today." Petition at 8.

The Public Staff supports Duke's proposed Minimum Procurement Volume of 700 MW stating that Duke's proposed Minimum Procurement Volume "is appropriate even in the absence of an approved Carbon Plan." Public Staff Initial Comments at ¶ 9. The Public Staff also concurs that it is appropriate for the Commission to defer its decision setting the Target Procurement Volume for the 2022 Solar Procurement.

[1] CCEBA and CPSA state that the 700 MW Minimum Procurement Volume recommended by Duke "was presented in the stakeholder process as the minimum procurement necessary to justify the administrative expense of running a procurement, and to ensure robust participation by bidders." CCEBA and CPSA Joint Initial Comments at 2 (pages unnumbered).

[2] *See* Petition at 14.

Parties opposing Duke's recommended Minimum Procurement Volume question the methodology used by Duke to arrive at the 700 MW minimum and state that Duke has not clearly explained how the 700 MW minimum is consistent with Duke's 2020 IRPs. In the alternative, SACE, et al. recommends that the Commission direct a Minimum Procurement Volume of 1,150 MW, which is representative of "a minimum of one fourth of the total amount of new solar that Duke estimates it will need to meet the 2030 target, or 1,150 MW (rounding 4,575 to 4,600)." SACE et al. Initial Comments at 6.

Duke defends its recommendation as reasonable based upon Duke's "historical solar procurement and interconnection experience in the Carolinas." Duke Reply at 13. More specifically, Duke states that the proposed Minimum Procurement Volume is reasonable compared to the Competitive Procurement of Renewable Energy (CPRE) Program Tranches 1-3 procurement targets: CPRE Program Tranches 1 and 2 each sought to procure 680 MW, while Tranche 3 targeted 596 MW. Further, Duke contends that its proposed Minimum Procurement Volume aligns with the largest volume of solar resources Duke has interconnected within a year's time, which was 746 MW in 2017.

Duke also rebuts the assertion of several intervenors — that a higher Minimum Procurement Volume is needed to ensure robust participation. Duke observes that the comparatively smaller CPRE Program procurement targets incented bids totaling "approximately three to four times the procurement target in DEC and five to fifteen times the procurement target in DEP," which, Duke contends, evidences that "even a smaller target can result in robust market participation." *Id.* at 13-14. "A higher minimum target value is therefore not necessary to achieve a robust RFP and promote competitive bidding to procure least cost resources," Duke contends. *Id.* at 14.

The Commission agrees that in order for the 2022 procurement to commence in time to align with DISIS, the Commission need only establish the Minimum Procurement Volume at this time as a means of providing some certainty to market participants. Per Duke, the Target Procurement Volume may be established by the Commission several months from now, on or before November 1, 2022. The final procurement volume shall be determined by later order of the Commission. The Commission gives considerable weight to the assertions of Duke and the Public Staff that the recommended minimum will be sufficient to incent reasonable participation and competitive bidding in the procurement. The Commission reiterates that this benchmark represents a minimum level for the procurement adopted solely to provide a level of certainty to market participants and encourage participation in the procurement. The Commission's determination on this procurement will not be precedential and the Commission will reexamine all aspects de novo prior to approving any subsequent procurements.

Further, the Commission notes that unlike the statutory CPRE Program, which caps the procurement obligation by the public utility's current forecast of its avoided cost calculated over the term of the power purchase agreement, the proposed procurement program includes no such cap to ensure cost-effectiveness. Nevertheless, the Commission remains committed to protecting ratepayers through cost containment, consistent with the least cost directive included in S.L. 2021-165. For this reason, the

Commission intends to thoroughly review the proposed Request for Proposals (RFP) and pro forma Power Purchase Agreement (PPA) and will approve final versions for use in the procurement process. In particular, the Commission finds merit in the PPA Re-Pricing Mechanism elaborated on pages 27-28 of the Petition, which Duke states "could be utilized to ensure that customers pay the lowest overall cost for the combined portfolio of Controllable PPA resource contracts[.]" Petition at 28. For the reason articulated by Duke, the Commission will direct that Duke include the Re-Pricing Mechanism in its RFP. This will permit Duke and the Commission to determine, after initial bids have been received, network upgrade costs have been determined, and re-priced bids have then been submitted, the most appropriate treatment and allocation of identified network upgrade costs that will ensure the lowest overall cost for the combined procurement portfolio.

Finally, the Commission calls attention to the "significant rate disparity between DEC and DEP" highlighted by the Public Staff. Public Staff Initial Comments at 7, n. 5. While the Commission does not propose to consider this issue in the present docket, the parties are directed to get to work on a solution to this significant issue.

IT IS THEREFORE, ORDERED as follows:

1. That Duke is authorized to commence a system-wide competitive procurement seeking a minimum of 700 MW of utility-owned and third-party solar energy resources sited in both North Carolina and South Carolina subject to other terms and conditions to be contained in the final, Commission-approved RFP and pro forma PPA;

2. That Duke shall file its proposed RFP, which shall include the PPA Re-Pricing Mechanism, and pro forma PPA by no later than Wednesday, June 1, 2022; and

3. That parties may file comments pertaining to the proposed RFP and pro forma PPA by no later than Friday, June 3, 2022. The Commission will not consider requests for extension, given the need to align the timing of the Commission's decisions with DISIS.

ISSUED BY ORDER OF THE COMMISSION.

This the 26th day of May, 2022.

NORTH CAROLINA UTILITIES COMMISSION

Joann R. Snyder, Deputy Clerk