

PUBLIC SERVICE COMMISSION OF THE DISTRICT OF COLUMBIA
1325 G STREET, N.W., SUITE 800
WASHINGTON, DC 20005

ORDER

March 24, 2022

RM29-2021-01, IN THE MATTER OF 15 DCMR CHAPTER 29 – RENEWABLE ENERGY PORTFOLIO STANDARD, Order No. 21134

I. INTRODUCTION

1. By this Order, the Public Service Commission of the District of Columbia (“Commission”) adopts the attached final amendments to Chapter 29, “Renewable Energy Portfolio Standard (‘RPS’),” of Title 15 of the District of Columbia Municipal Regulations, amending the Commission’s RPS rules to generally require, among other things, all new renewable generating facilities, including behind-the-meter (“BTM”) generators, to account for energy output through the use of a revenue-grade generation meter or inverter-based generation measurement equipment. The amendments as shown in Attachment A shall become effective upon publication of the Notice of Final Rulemaking in the *D.C. Register*. In addition, the Office of the People’s Counsel for the District of Columbia’s (“OPC”) Motion for Leave to File Comments Out-of-Time is granted.¹

II. BACKGROUND

2. Chapter 29 establishes the Commission Rules governing the Renewable Energy Portfolio Standard, which are applicable to all District of Columbia (“District”) retail electricity sales as provided in D.C. Official Code §§ 34-1431 through 34-1439, and among other things, governs the certification and eligibility of solar energy systems to qualify for participation in the RPS program.² On August 13, 2021, in an effort to obtain more accurate data on the energy output of photovoltaic solar systems, the Commission published a Notice of Proposed Rulemaking (“First NOPR”) in the *D.C. Register* proposing to amend the Commission’s RPS rules to generally require, among other things, all renewable generating facilities, including small BTM generators with a capacity of less than ten kilowatts (“10kW”), to account for energy output through the use of a revenue-grade production meter or inverter-based production measurement equipment.³ On September 13, 2021, the District of Columbia Department of Energy and Environment (“DOEE”)

¹ *RM29-2021-01, In the Matter of 15 DCMR Chapter 29 — Renewable Energy Portfolio Standard (“RM29-2021-01”)*, Motion for Leave to File Comments Out-of-Time and Comments of the Office of the People’s Counsel for the District of Columbia regarding the Proposed Amendments to the Renewable Energy Portfolio Standard, filed October 14, 2021 (“OPC’s Comments”).

² 15 DCMR §§ 2900 *et. seq.* (2020).

³ 68 *D.C. Reg.* 008076-008081 (August 13, 2021).

filed a Motion for Enlargement of Time (“DOEE’s Motion”) to extend the comment period for the First NOPR to October 13, 2021.⁴ The Commission subsequently granted DOEE’s Motion,⁵ and a notice of extension was published in the *D.C. Register*.⁶ On October 8, 2021, the Commission adopted changes to Section 2902.12 on an emergency basis to no longer permit amendments to solar energy system capacity or orientation to be deemed approved, and to require as-built construction drawings with applications seeking to amend a solar energy system’s capacity and/or orientation.⁷

III. DISCUSSION

A. First NOPR

3. *Notice of Proposed Rulemaking.* The First NOPR amended Sections 2902, 2903, and 2999 of the Commission’s RPS rules. Section 2902 presently details the eligibility requirements that renewable generators must satisfy in order to be certified as a qualified resource and participate in the District’s RPS program. In the First NOPR, the Commission proposed the following amendments to Section 2902: (1) a new paragraph (i) was added to Subsection 2902.4 to require documentation of site maps or construction drawings which identify a photovoltaic solar system’s capacity, number of panels, tilt, and azimuth; (2) Subsection 2902.5 was amended to include two additional requirements in the applicant’s attestation; (3) Subsection 2902.12 was amended to require the submission of documentation of site maps or construction drawings which identify a system’s capacity, number of panels, tilt, and azimuth for applications seeking to change a solar energy system’s orientation or system size; (4) Subsection 2902.13 was amended to include gross negligence as grounds for decertification and further proposed that the Commission or its authorized representatives could conduct audits to certify systems’ production claims in the PJM Environmental Information Service EIS GATS (“PJM-EIS GATS”) system; and (5) Subsection 2902.14 removed fraud as the sole reason a decertified generator would be prohibited from generating Renewable Energy Credits (“REC”) for a three-year period.⁸

4. Section 2903 currently details the creation and tracking of RECs. The First NOPR proposed to amend Subsection 2903.2 to require, among other things, all renewable generating facilities, including small BTM generators less than 10kW, to account for energy output through the use of a revenue-grade production meter or inverter-based production measurement equipment. The proposed amendment to Subsection 2903.2 clarified all solar photovoltaic systems, including previously certified facilities must report revenue-grade energy production data to PJM-EIS GATS. The proposed amendment indicated previously certified systems would have until the end

⁴ *RM29-2021-01*, Department of Energy and Environment’s Motion for Enlargement of Time at 1, filed September 13, 2021.

⁵ *RM29-2021-01*, Order No. 21019, ¶ 1, rel. September 16, 2021.

⁶ 68 *D.C. Reg.* 010117 (September 24, 2021).

⁷ 68 *D.C. Reg.* 010605-010606 (October 8, 2021).

⁸ 68 *D.C. Reg.* at 008078-008079 (August 13, 2021).

of 2022 to come into compliance. Finally, the Commission amended Section 2999, adding definitions for “Azimuth,” “Inverter-Based Revenue-Grade Production Measurement Equipment,” “Revenue-Grade Production Meter,” and “Tilt.”⁹

5. *Comments.* Over 200 stakeholders submitted comments on the First NOPR, including residents, commercial generators, D.C. Councilmembers, DOEE, and OPC. Most comments primarily concerned the proposed change to Section 2903.2 that requires meter or production measurement equipment installation to previously installed solar photovoltaic systems that currently use engineering-based estimates to report system output.¹⁰ Many argued the significant cost to upgrade previously installed systems under 10kW would vastly outweigh the limited marginal benefit this requirement would have towards meeting the District’s climate goals.¹¹ Additionally, some stakeholders contended the proposed rule penalizes early adopters of solar systems, and retroactively applying the new rule erodes trust in the RPS program and disincentivizes new system installations.¹² If the Commission were to move forward with the rule change, stakeholders requested that previously installed systems under 10 kW be grandfathered in under the existing rules, with some commenters suggesting periodic audits for these systems to ensure accurate production reporting.¹³

6. OPC in its comments raised an unrelated issue regarding solar thermal systems and the entity that certifies these systems/equipment—the Solar Rating and Certification Corporation (“SRCC”). Specifically, OPC noted 15 DCMR Sections 2902.4(e) and (f) reference OG-100 certification from the SRCC, but the SRCC, effective July 1, 2021, adopted the 2020 edition of the ICC 901/SRCC 100 standard. Similarly, 15 DCMR Sections 2902.4(f) and (g) refer to the SRCC OG-300 performance protocol, which was also updated effective July 1, 2021, to the ICC 900/SRCC 300 standard. OPC asked the Commission to clarify whether it intends to apply the new version of the standards moving forward.¹⁴

B. Second NOPR

7. *Second Notice of Proposed Rulemaking.* In response to concerns expressed by commenters, the Commission published a Second NOPR on January 28, 2022, stating the Commission no longer proposes amendments requiring legacy solar photovoltaic systems to use a meter or production measurement equipment, but such requirement would apply to all newly installed systems.¹⁵ Additionally, to maintain consistency across Commission rules, the

⁹ 68 D.C. Reg. at 008079-008081 (August 13, 2021).

¹⁰ A method to estimate the output of a solar energy system using certain inputs. See, for example, the National Renewable Energy Laboratory’s PVWatts Calculator.

¹¹ See, e.g., *RM29-2021-01*, Comments of DOEE on the First NOPR, filed October 13, 2021.

¹² See, e.g., *RM29-2021-01*, Comments of SRECTrade, Inc. on the First NOPR, filed September 13, 2021.

¹³ See, e.g., *RM29-2021-01*, Comments of Sol Systems, LLC on the First NOPR, filed September 13, 2021.

¹⁴ OPC’s Comments at 4.

¹⁵ 69 D.C. Reg. 000733-000739 (January 28, 2022).

Commission substituted the word “production” for “generation” when referring to meters and measuring equipment because “production meter” is narrowly defined in Chapter 40 and would not encompass the full range of meters that are capable of measuring the generated electricity for RPS.¹⁶ For efficiency, the Commission also chose to address OPC’s concern related to the applicable standard for solar thermal energy systems in the Second NOPR by amending the pertinent language.

8. Specifically, the Second NOPR proposed the following: (1) to amend paragraphs (e), (f), and (g) of Subsection 2902.4 to require that solar thermal energy systems comply with the most current standards adopted by the SRCC; (2) to add a new paragraph (i) to Subsection 2902.4 to require documentation of site maps or construction drawings which identify the system’s capacity, number of panels, tilt, and azimuth; (3) to amend Subsection 2902.5 to include two additional requirements in the applicant’s attestation; (4) to amend Subsection 2902.12 to require the submission of documentation of site maps or construction drawings which identify the system’s capacity, number of panels, tilt, and azimuth for applications seeking to change a solar energy system’s orientation or system size; (5) to amend Subsection 2902.13 to add gross negligence as grounds for decertification and to include inspections or audits to certify systems’ production claims in the PJM-EIS GATS system; (6) to amend Subsection 2903.2 to generally require all new renewable generating facilities, including BTM generators, to account for the electricity output through the use of a revenue-grade generation meter, or inverter-based generation measurement equipment, while pending and previously installed systems under 10 kW shall be permitted to use engineering-based estimates; (7) to amend Subsection 2903.3 to require semi-annual reporting to GATS; and (8) to amend Subsection 2999.1 to modify the definition for “Renewable Generator” and to include definitions for “Azimuth,” “Community Renewable Energy Facility or CREF,” “Inverter-Based Revenue-Grade Generation Measurement Equipment,” “Revenue-Grade Generation Meter,” “Solar Thermal Energy System,” and “Tilt.”¹⁷

9. *Comments.* Three stakeholders filed comments on the Second NOPR, only two of which were filed on time. In its comments, DOEE acknowledges the Second NOPR addressed the concerns of stakeholders regarding the practical and cost implications of retrofitting previously installed small solar systems, and supports the Second NOPR as written, including the required use of revenue-grade measuring equipment for all new systems.¹⁸ Comments filed by an individual stakeholder opposed the Second NOPR, arguing the individual would not have installed solar panels if she would have known the Commission would initiate this rulemaking proceeding and add considerable cost to solar projects.¹⁹

¹⁶ 15 DCMR § 4099.1 (2021). A production meter is defined as a generation meter used to capture the level of customer-generated electricity of a Community Renewable Energy Facility (“CREF”).

¹⁷ 69 D.C. Reg. at 000734-000739 (January 28, 2022).

¹⁸ RM29-2021-01, Comments of DOEE on the Second NOPR, filed February 28, 2022.

¹⁹ RM29-2021-01, Comments of Jennifer Azzariti on the Second NOPR, filed February 14, 2022.

IV. DECISION

A. OPC's Motion for Leave

10. On October 14, 2021, OPC filed a Motion for Leave to File Comments Out-of-Time ("OPC's Motion") along with its comments regarding the First NOPR. In its Motion, OPC notes that comments were due October 13, 2021, and therefore requests the Commission accept its comments one day late. OPC contends its comments will add information to the record that will aid the Commission in its decision-making, and that no party will be prejudiced by this minute delay.²⁰ OPC adds the Commission has previously accepted comments into the record for rulemakings when they were filed shortly after the deadline and did not cause harm to other parties.²¹ Generally, the Commission will grant a request of this nature if good cause is shown.²² In this instance, OPC has presented good cause, indicating its comments would provide the Commission valuable input. Additionally, no opposition was filed, and no party or stakeholder would be prejudiced by the granting of the Motion. Therefore, the Commission grants OPC's Motion, and OPC's late comments are accepted into the record.

B. Final Rulemaking

11. The Commission initiated this rulemaking with the intent to obtain more accurate data as to the energy output of renewable generating facilities by requiring that they provide construction drawings and use revenue-grade meters and measuring equipment. Doing so remains an important Commission objective because this information, along with the additional compliance measures proposed, will assist the District in meeting its 100% renewable energy goal in 2032 by increasing accuracy of system output and efficiency in the RPS program.²³ However, the Commission acknowledges the extensive opposition to retrofitting legacy solar systems and therefore proposes to grandfather in small BTM solar systems less than 10kW that currently use engineering-based estimates. All new systems, however, shall be required to account for electricity output through the use of a revenue-grade generation meter or inverter-based generation measurement equipment. Though the Commission recognizes this will likely lead to additional costs for these new solar systems, we believe applying the amendments proactively strikes the

²⁰ OPC's Comments at 3.

²¹ OPC's Comments at 3. *See, e.g., RM29-2020-02, In the Matter of 15 DCMR Chapter 29-Renewable Energy Portfolio Standard*, Order No. 20740, ¶¶ 5, n.7, n.9, n.15, rel. May 13, 2021 (accepting late-filed comments).

²² *See, e.g., Formal Case No. 962, In the Matter of the Implementation of the District of Columbia Telecommunications Competition Act of 1996 and Implementation of the Telecommunications Act of 1996*, Order No. 12428, ¶ 13, rel. July 2, 2002. *See, e.g., Formal Case No. 1041, In the Matter of the Investigation into Washington Gas Light's Compliance with its Tariffs*, Order No. 14571 at 3, n. 7, rel. September 12, 2007; *Formal Case No. 712, In the Matter of the Investigation into the Public Service Commission's Rules of Practice and Procedure*, Order No. 15353, ¶ 2, rel. August 10, 2009. *See, e.g., TAC 19, Petition of Verizon Washington DC, Inc. for Arbitration Pursuant to Section 252(b) of the Telecommunications Act of 1996*, Order No. 13873, rel. February 7, 2006. *See also Gas Tariff-01-1, In the Matter of the Application of Washington Gas Light Company, District of Columbia Division, For Authority to Amend its General Service Provisions*, Order No. 15293, rel. June 4, 2009.

²³ CleanEnergy DC Omnibus Amendment Act of 2018, D.C. Law 22-257 (effective March 22, 2019).

appropriate balance between the stakeholders' concerns and the Commission's intent. Therefore, the Commission hereby adopts the attached amendments to Chapter 29, "Renewable Energy Portfolio Standard ('RPS')," of the Commission's rules, which shall become effective upon publication in the *D.C. Register*.

THEREFORE, IT IS ORDERED THAT:

12. The Office of the People's Counsel for the District of Columbia's Motion for Leave to File Comments Out-of-Time is **GRANTED**, and its Comments are **ACCEPTED** for the record; and

13. The attached amendments to Chapter 29 of Title 15 of the District of Columbia Municipal Regulations as discussed in this Order are **ADOPTED** and shall become effective upon publication of a Notice of Final Rulemaking in the *D.C. Register*.

A TRUE COPY:

BY DIRECTION OF THE COMMISSION:

A handwritten signature in black ink, reading "Brinda Westbrook-Sedgwick". The signature is written in a cursive, flowing style.

CHIEF CLERK:

**BRINDA WESTBROOK-SEDGWICK
COMMISSION SECRETARY**

ATTACHMENT A

Chapter 29, RENEWABLE ENERGY PORTFOLIO STANDARD, of Title 15 DCMR, PUBLIC UTILITIES AND CABLE TELEVISION, is amended as follows:

Section 2902, GENERATOR CERTIFICATION AND ELIGIBILITY, is amended as follows:

2902.4 In addition to the information required in § 2902.3, an applicant submitting an Application must also attach:

- (a) A current Certificate of Good Standing for the applicant issued by the state in which the business was formed, if applicable;
- (b) A copy of the U.S. Department of Energy, Energy Information Administration Form EIA 860, if the rated capacity is greater than one megawatt (1 MW);
- (c) A Certificate of Authorization to Conduct Business in the District of Columbia, if applicable;
- (d) Documentation of authority to sign on behalf of the applicant;
- (e) Documentation that the energy output of non-residential solar heating, cooling, or process heat property systems producing or displacing greater than ten thousand kilowatt hours (10,000 kWh) per year is determined by an on-site energy meter that meets performance standards established by the International Organization of Legal Metrology (OIML) and the solar collectors used have an OG-100 certification based on the most current adopted standard from the Solar Rating and Certification Corporation (SRCC), if applicable;
- (f) Documentation that the energy output of non-residential solar heating, cooling, or process heat property systems producing or displacing ten thousand (10,000) or less kilowatt-hours per year is determined by the most current adopted SRCC OG-300 annual system performance rating protocol applicable to the property or by an on-site energy meter that meets performance standards established by OIML and the solar collectors used have an OG-100 certification based on the most current adopted standard from the SRCC, if applicable;
- (g) Documentation that the energy output of residential solar thermal energy systems is determined by the most current adopted SRCC OG-300 annual rating protocol or by an on-site energy meter that meets performance

standards established by OIML and the solar collectors used have an OG-100 certification based on the most current adopted standard from the SRCC, if applicable;

- (h) Interconnection Approval for the renewable generator, if applicable; and
- (i) Documentation of site maps or construction drawings which identify the solar energy system's capacity, number of panels, tilt and azimuth, if applicable. These maps and/or drawings must include any as-built modifications, even if they are different from the site maps or construction drawings that were submitted to the Department of Consumer and Regulatory Affairs (DCRA), or the appropriate jurisdictional permitting authority.

2902.5 An applicant submitting an Application must attest to:

- (a) Environmental Compliance, if the fuel type is not solar energy;
- (b) General Compliance that all information contained in the Application is true and accurate;
- (c) General Compliance with all Commission rules; and
- (d) General Compliance, once certified, with production reporting requirements, terms of use, and the operating rules of the PJM Environmental Information Service GATS (PJM-EIS GATS).

...

2902.12 Upon approval of an application, the Commission shall assign a unique GATS certificate number to the eligible renewable energy generating resource.

- (a) The Commission shall be notified of any planned substantive changes in the operating characteristics of a certified generating facility at least thirty (30) days prior to the effective date of such changes. Substantive changes include, but are not limited to, changes in fuel type, fuel mix, generating capacity, generating resource tilt and/or azimuth, and generator type.
- (b) A revised application or amendments shall be submitted for Commission review, subject to the time periods prescribed in § 2902.7. In addition, applicants and District-certified generating facilities shall notify the

Commission of any substantive changes in information provided in an original or amended application within thirty (30) days.

- (c) Any application for change in a solar energy system's orientation or system size shall include documentation of site maps or construction drawings which identify the system's capacity, number of panels, tilt and azimuth. These maps and/or drawings shall include any as-built modifications, even if they are different from the site maps or construction drawings that were submitted to the DCRA, or the appropriate jurisdictional permitting authority.

2902.13 A renewable generator may be decertified by the Commission if it is determined to no longer be an eligible renewable resource due to fraud, gross negligence, or a material change in the nature of the resource. To make this determination, and to generally determine if renewable generators are in compliance with the RPS rules, the Commission or its authorized representative, may conduct a physical inspection or audit, as deemed appropriate, on any renewable generator to certify its production claims in the PJM-EIS GATS system. Before decertification, an owner of a renewable generator will be given thirty (30) days' written notice and an opportunity to show cause why it should not be decertified.

2902.14 Any renewable generator that is decertified due to fraud may not create any District of Columbia RECs for a three (3)-year period and may not retroactively create RECs for that same three (3)-year period.

2902.15 Any subsequent unrelated owner of the decertified renewable generator, pursuant to § 2902.14, is not subject to the three (3)-year exclusion beginning with its effective date of ownership.

...

Section 2903, CREATION AND TRACKING OF RENEWABLE ENERGY CREDITS, is amended as follows:

2903.1 RECs shall be created and tracked through the PJM-EIS GATS.

2903.2 Behind-the-meter generators and CREFs shall submit to PJM-EIS GATS actual production data from a revenue-grade generation meter, or inverter-based revenue-grade generation measurement equipment. The reporting shall comply with the production reporting requirements, terms of use, and the operating rules of the PJM-EIS GATS. The RPS applicant shall provide accurate production data to PJM-EIS GATS or risk facing the actions outlined in sections 2902.13 and 2902.14. Behind-the-meter generators that are certified or were submitted to the Commission for certification before the effective date of this subsection and currently use engineering-based estimates in PJM-EIS GATS may continue using

estimates to report output. For solar thermal energy systems that do not generate electricity:

- (a) If the output is to be estimated, the Commission will provide PJM-EIS GATS with the output in kilowatt-hour savings for the system, based on SRCC's estimated annual system performance of OG-300 certified systems; or
- (b) If the solar thermal energy system uses an energy meter that meets the performance standards established by OIML, then the solar thermal energy produced by the system shall be credited with one kilowatt hour (1 kWh) of electricity generated for each three thousand four hundred twelve British thermal units (3,412 BTUs) produced by the solar thermal energy system.

2903.3 Production data from behind-the-meter generators and CREFs shall be recorded in GATS no less than semi-annually in order to be eligible for compliance. Estimated production shall not be allowed if the metering equipment fails. However, production data may be submitted after the equipment failure has been corrected and a full month of data has been accurately recorded.

...

Section 2999, DEFINITIONS, is amended as follows:

2999.1 For the purposes of this chapter, the following terms and phrases have the following meanings:

Azimuth – The angle between the horizontal direction of the sun and a reference to direction (North) of a solar panel. This direction is non-magnetic unless so specified.

...

Community Renewable Energy Facility or CREF – an energy facility with a capacity no greater than five (5) megawatts that: (a) uses renewable resources defined as a Tier One Renewable Source in accordance with Section 3(15) of the Renewable Energy Portfolio Standard Act of 2004, effective April 12, 2005, (D.C. Law 15-340; D.C. Official Code § 34-1431(15) (2019 Repl.), as amended); (b) is located within the District of Columbia; (c) has at least two (2) Subscribers; and (d) has executed an Interconnection Agreement and a CREF Rider with the Electric Company.

...

Inverter-Based Revenue-Grade Generation Measurement Equipment – Electrical inverter equipment, advanced inverters (upon commercial availability), or inverter communicating equipment—used by a behind-the-meter generator or

CREF—that measures the generated electricity output at the inverter, is capable of recording the cumulative kilowatt-hours that the generator produces which meets the latest American National Standards Institute (ANSI) C-12.20 standard including an accuracy deviation no greater than +/- 0.5%, and that easily displays all collected data and retains lifetime production even in the event of a power outage.

...

Renewable Generator – a generator that produces energy from a Tier One renewable source or Tier Two renewable source.

Revenue-Grade Generation Meter – A meter used by a behind-the-meter generator or CREF that measures the generated electricity at the AC output of an inverter, is capable of recording the cumulative kilowatt-hours that the generator produces which meets the latest American National Standards Institute (ANSI) C-12.20 standard including an accuracy deviation no greater than +/- 0.5%, and that easily displays all collected data and retains lifetime production even in the event of a power outage.

...

Solar Thermal Energy System – a system that converts solar energy into useful thermal energy output, consistent with the definitions in this chapter.

...

Tilt – The vertical orientation to the sun of a solar panel in reference to level ground.