



**Republic of the Philippines  
DEPARTMENT OF ENERGY**

**Department Circular No. DC2020 - \_\_-\_\_\_\_\_**

**ADOPTING A GENERAL FRAMEWORK GOVERNING THE TEST AND  
COMMISSIONING OF GENERATION FACILITIES**

**WHEREAS**, Section 2 of Republic Act No. 9136, otherwise known as the Electric Power Industry Reform Act of 2001 (EPIRA), declared as the policy of the State to ensure the quality, reliability, security and affordability of the supply of electric power;

**WHEREAS**, Section 37 of the EPIRA further mandates the Department of Energy (DOE) to supervise the restructuring of the electricity industry, and in addition thereto, to a) *ensure the reliability, quality and security of supply of electric power*; b) *jointly with the electric power industry participants, establish the wholesale electricity spot market and formulate the detailed rules governing the operations thereof*; and c) *monitor private sector activities relative to energy projects in order to attain the goals of the restructuring, privatization, and modernization of the electric power sector as provided for under existing laws*;

**WHEREAS**, Republic Act No. 11234, otherwise known as the Energy Virtual One-Stop Shop Act (“EVOSS”) and its Implementing Rules and Regulations, provides for specific time frame for mother agencies and its attached bureaus to act upon all applications involving power generation, transmission or distribution projects, upon submission of complete documentary evidence, and imposes corresponding penalties for non-compliance thereof;

**WHEREAS**, Section 6 of the EPIRA states that a Generation Company shall, before it operates, secure from the Energy Regulatory Commission (ERC) a Certificate of Compliance (COC);

**WHEREAS**, Article I, Section 2 (iii) of the 2014 Revised Rules for the Issuance of Certificates of Compliance (COCs) for Generation Companies and Entities with Generation Facilities prescribed a maximum period of two (2) months for the conduct of Test and Commissioning for new Generation Facilities;

**WHEREAS**, DOE Department Circular No. DC2013-05-0009 entitled “*Guidelines for the Selection Process of Renewable Energy Projects under Feed-in-Tariff System and the Award of Certificate of Feed-in-Tariff Eligibility*” mandated that successful commissioning must be achieved by an RE facility prior to issuance of the DOE of a Certificate of Endorsement for FIT Eligibility;

**WHEREAS**, generating units under regulatory and commercial testing are scheduled and dispatched in the Wholesale Electricity Spot Market (WESM) through imposition

of over-riding constraints and are considered price takers, pursuant to Section 7.6 of the WESM Dispatch Protocol Manual Issue 12.0;

**WHEREAS**, in 2018, the Philippine Electricity Market Corporation flagged to the DOE that several Variable Renewable Energy plants were recorded to have exceeded the two-month Test and Commissioning period as part of its presentation on the 2017 annual forecast accuracy performance of must-dispatch generating units;

**WHEREAS**, for the period 26 March to 25 April 2020, the Market Surveillance Committee reported that 97.1% of instances of imposition of over-riding constraints in the WESM can be attributed to test and commissioning of generating units;

**WHEREAS**, based on data provided by the Independent Electricity Market Operator of the Philippines, thirty-eight (38) plants were recorded to be on Test and Commissioning status in the WESM for more than 2 months, the longest period being 5 years, as of 01 April 2020;

**WHEREAS**, the extended Test and Commissioning of generation facilities pose material effect to WESM outcomes by displacing scheduled generators while not being required to comply with the mandatory requirements in the submission of offers or projected outputs;

**WHEREAS**, determining the definite status of power plants intending to transition to commercial operations is crucial information in planning for short and medium-term supply;

**WHEREAS**, there is a need among various agencies involved in the processing of requirements for commercial operations of Generation Companies to harmonize their procedures and monitoring activities;

**WHEREAS**, the DOE cognizant of the need to address any policy gaps and ensure the optimal utilization of available capacities in the Grid, conducted review of all relevant policies and guidelines and subjected these to focus group discussions and virtual public consultations on various dates as follows:

Activity	Leg	Date	Venue/Platform
Focus Group Discussion	Luzon	11 November 2019	Metro Manila
	Visayas	14 November 2019	Cebu City
	Mindanao	21 November 2019	Davao City
Public Consultation	Luzon	29 June 2020	Microsoft Teams
	Visayas	01 July 2020	
	Mindanao	03 July 2020	

**NOW, THEREFORE**, pursuant to its authority and mandate under the EPIRA and its Implementing Rules and Regulations (IRR), and after due consideration of the inputs from various stakeholders, the DOE hereby issues, adopts and promulgates the following:

## Section 1. General Principles

- 1.1 No Generation Company and its Generation Facility/ies shall commercially operate and participate in the WESM unless such entity is authorized by the ERC;
- 1.2 All Generation Companies intending to conduct Test and Commissioning of their Generation Facility/ies shall comply with the requirements provided under this Circular and the applicable ERC guidelines for the issuance of the COC;
- 1.3 The conduct of Test and Commissioning shall not adversely affect the security and reliability of the grid operations as well as the competitiveness of market outcomes; and
- 1.4 Processing of applications submitted to respective agencies relative to the implementation of this policy shall not exceed the timeframes as prescribed in EVOSS Act and its Implementing Rules and Regulations and shall adhere to the principles and procedures embodied therein.

**Section 2. Scope and Application.** This Circular shall apply to the following:

- a) Generation Companies operating or intending to operate Generation Facilities including:
  - i. Grid-connected Generation Facilities; and
  - ii. Embedded Generators mandated to register to the WESM pursuant to Department Circular No. DC2019-12-0003;
- b) System Operator (SO);
- c) Market Operator (MO); and
- d) Network Service Providers (NSPs) including the Transmission Network Provider (TNP) and Distribution Utilities (DUs).

Entities operating Self-Generation Facilities are excluded from the Scope of this Circular. Notwithstanding, the NSPs shall be responsible to ensure that connection of Self-Generation Facilities shall be done in accordance with applicable guidelines in the PGC and the PDC and shall not result in degradation of the power system.

**Section 3. Definition of Terms.** The terms as used in this Circular shall have their respective meanings as follows:

- a) **“Certificate of Compliance” or “COC”** refers to a license issued by the ERC in favor of a person or entity to operate a power plant or other facilities used in the generation of electricity pursuant to Section 6 of R.A. 9136 and Section 4 of the Implementing Rules and Regulations of R.A.9136.
- b) **“Certificate to Conduct Test and Commissioning” or “CTCTC”** refers to the certification issued by the ERC to a Generation Company, allowing the conduct of Test and Commissioning with respect to its Generation Facility/ies.

- c) **“Commercial Operations”** refer to the generation of electricity for sale or disposition upon achievement by the generation facility of operational and capability criteria in accordance with standard engineering practice for Generation Facilities.
- d) **“Electromechanical Completion”** shall mean that the generating unit including all substation and other facilities for grid or distribution system connections are in place but not yet connected and the generating unit is ready for test and commissioning.
- e) **“Embedded Generator”** refers to generating units that are indirectly connected to the Grid through the distribution system that supplies power to its host DU or the Grid.
- f) **“Generation Company”** refers to any person or entity authorized by ERC to operate Generation Facilities.
- g) **“Generation Facility”** refers to a facility for the production of electricity.
- h) **“Test and Commissioning”** refers to conduct of a set of procedures to show that a generating unit was erected and connected in accordance with the Philippine Grid Code (PGC), Philippine Distribution Code (PDC) and other relevant guidelines and specifications and to determine readiness to deliver energy to the Grid or distribution network.

For the purpose of this policy, Test and Commissioning includes the conduct of capability tests as specified in the PGC and the PDC and excludes any procedures that are in accordance with specifications of the owner or the Engineering, Procurement and Construction (EPC) contractor.

- i) **“Variable Renewable Energy (VRE) Generation Facility”** refers to a facility consisting of one or more generation units, where electric energy is produced from a source that is renewable, and has inherent intermittency that is beyond the control of the facility owner or operator. For avoidance of doubt, it refers to wind farms, solar energy generation systems and run-of-river hydroelectric generation facilities.

All other terms used but not defined in this Circular shall have the same meaning as defined in the EPIRA, its IRR, PGC, PDC, WESM Rules and its Market Manuals, and other DOE and ERC issuances.

**Section 4. General Test and Commissioning Procedures.** The following procedures are designed to have an orderly and expedient Test and Commissioning for all types of Generation Facilities.

#### 4.1 ***Timeline for Test and Commissioning***

- 4.1.1 The maximum period for Generation Facilities identified under Section 2 to conduct Test and Commissioning is two (2) months for the purpose of securing a COC from the ERC. This shall also apply to Generation Facilities applying for Feed-in-Tariff (FIT) COC.
- 4.1.2 The start of Test and Commissioning shall commence on the date indicated in the CTCTC issued by the ERC.
- 4.1.3 The MO and the SO in consultation with the ERC and electric power industry participants, shall review the maximum allowable period for the conduct of Test and Commissioning and recommend to the DOE revision on the same as necessary with consideration on the varying Test and Commissioning procedures per technology. The review shall consider the factors such as technology and procedural limitations as may be encountered during the implementation of this Circular.

#### 4.2 ***Procedures Before Test and Commissioning***

- 4.2.1 The Generation Company shall advise the following of its intention to conduct Test and Commissioning at least six (6) months before target date thereof:
  - 4.2.1.1 The SO and the TNP with respect to a grid-connected Generation Facility; and
  - 4.2.1.2 The SO, the TNP, and the DU with respect to an Embedded Generator.
- 4.2.2 A Generation Company shall commence Test and Commissioning only upon attainment of Electromechanical Completion of its Generation Facility.
- 4.2.3 The following certification issued by the DOE shall serve as proof of Electromechanical Completion.
  - a) Certificate of Endorsement for FIT Eligibility for VRE Generation Facilities intending to avail Feed-in Tariff (FIT);
  - b) Certificate of Endorsement to the ERC for VRE Generation Facilities not intending to avail FIT; and
  - c) Certificate of Endorsement to the ERC for non-VRE Generation Facilities.

At the minimum, the Generation Company shall submit a certification under oath to the DOE signifying that Electromechanical Completion has been achieved.

To this end, the DOE Electric Power Industry Management Bureau (EPIMB) and Renewable Energy Management Bureau (REMB) shall update, as necessary, their respective protocols for issuance of Certificate of Endorsements. The updated guidelines shall be issued no more than thirty (30) calendar days from the effectivity of this Circular.

4.2.4 Within eighteen (18) calendar days from the submission of requirements, the ERC shall issue a CTCTC indicating the start and end date of Test and Commissioning corresponding to the maximum period specified in Section 4.1.1 of this Circular. The requirements shall include the following:

- 4.2.4.1 Scheduled date of Test and Commissioning, as coordinated with the following:
  - 4.2.4.1.1 TNP and SO for grid-connected Generation Facilities;
  - 4.2.4.1.2 TNP, SO and DU for Embedded Generators;
- 4.2.4.2 Certification from the DOE attesting Electromechanical Completion;
- 4.2.4.3 Provisional Approval to Connect issued by the TNP or the DU;
- 4.2.4.4 Proof of WESM Registration issued by the MO; and
- 4.2.4.5 Other requirements, as may be determined by the ERC.

To this end, the Generation Company shall be responsible to ensure timely application for obtaining the above requirements to ensure the scheduled date of Test and Commissioning will not be compromised. Likewise, the DOE, TNP, DUs and the MO shall ensure timely issuance of above requirements to the Generation Company is observed in accordance with respective guidelines.

4.2.5 Within three (3) working days upon receipt, the Generation Company shall furnish a copy of the CTCTC to the following:

- 4.2.5.1 The MO, the TNP and the SO with respect to a grid-connected Generation Facility;
- 4.2.5.2 The MO, the TNP, the SO and the DU with respect to an Embedded Generator.

4.2.6 Prior to commercial operations, no injection to the Grid or distribution network shall be allowed without a valid CTCTC.

### 4.3 ***Procedures During Test and Commissioning***

4.3.1 For the duration of the validity of the CTCTC:

- 4.3.1.1 The TNP shall witness the Test and Commissioning activities of grid-connected Generation Facilities. The TNP may also conduct the Test and Commissioning activities in the event that a third-party testing entity is not available.
- 4.3.1.2 The TNP and the concerned DU shall witness the Test and Commissioning activities of Embedded Generators. The DU may also conduct the Test and Commissioning activities in the event that a third-party testing entity is not available.
- 4.3.1.3 The SO shall submit to the MO over-riding constraints with respect to energy injections of Generation Facilities undergoing Test and Commissioning for inclusion in the Market Dispatch Optimization Model (MDOM).

- 4.3.1.4 Any injected or withdrawn energy during Test and Commissioning of a Generation Facility, less any energy offtake from a bilateral contract counterparty, shall be settled at WESM prices.
- 4.3.2 The MO shall notify the Generation Company fifteen (15) calendar days prior the date of expiry of the CTCTC.
- 4.3.3 Immediately upon expiry of the CTCTC or upon certification that the Generation Facility has completed and passed Test and Commissioning, the following shall be observed:
  - a) The SO shall cease to submit over-riding constraints in the MDOM to prevent continuous injection of the Generation Facility while awaiting approval to commence Commercial Operations.
  - b) Should energy injections still be recorded from the Generation Facility, the Generation Company shall not be entitled to any WESM payments for any injected energy but shall be charged for any energy withdrawn from the grid or distribution network.

#### 4.4 ***After Test and Commissioning***

- 4.4.1 Within seven (7) calendar days upon completion of the conduct of Test and Commissioning and validation that the Generation Facility is ready to deliver energy to the Grid or distribution network, the following shall issue a certification attesting successful Test and Commissioning:
  - 4.4.1.1 the TNP for a grid-connected Generation Facility;
  - 4.4.1.2 the DU for an Embedded Generator.
- 4.4.2 The ERC, within sixty (60) calendar days upon receipt of the certification attesting successful Test and Commissioning and satisfaction of other applicable requirements, shall issue the COC to the Generation Company with respect to its Generation Facility.
- 4.4.3 The Generation Company shall submit the COC to the MO within three (3) working days from receipt thereof. Non-compliance to this provision shall be a ground for disconnection from the Grid or distribution network in accordance with existing guidelines for disconnection issued by the DOE.
- 4.4.4 Within fifteen (15) calendar days upon receipt of the COC, the MO shall provide full access to the Market Participant Interface and grant full WESM registration to the Generation Company with respect to its Generation Facility.

#### 4.5 ***Extension of CTCTC Validity***

- 4.5.1 The ERC shall extend the validity of a CTCTC on the following grounds:
  - a) The Generation Company was not able to conduct Test and Commissioning, due to resource limitations of a VRE Generation Facility resulting from:

- i. Adverse impact of weather conditions for solar and wind resources; and
    - ii. Unavailability of water for run-of-river hydro resources.
  - b) Test and commissioning procedures cannot be done due to various grid or distribution network conditions resulting from:
    - i. Alerts or emergency state; or
    - ii. Transmission or distribution line congestion or limitation.
  - c) Force majeure events.
- 4.5.2 Within eighteen (18) calendar days from receipt of the request for extension and submission of all applicable requirements, the ERC shall issue a revised CTCTC reflecting the new end date of Test and Commissioning to the Generation Company. The requirements shall include, but not limited to, endorsement from the TNP, DU and/or third-party testing entity of the existence of the grounds for extension as specified in Section 4.5.1.
- 4.5.3 Within three (3) working days upon receipt, the Generation Company shall furnish a copy of the revised CTCTC to the following:
- 4.5.3.1 The MO, the TNP and the SO with respect to a grid-connected Generation Facility;
  - 4.5.3.2 The MO, the TNP, the SO and the DU with respect to an Embedded Generator.
- 4.5.4 Unless the revised CTCTC was submitted to the SO and the MO before the original date of expiry of the CTCTC, Section 4.3.3 shall still be observed.
- 4.5.5 Inability of a Generation Facility to secure a certificate of completion of Test and Commissioning from the TNP or DU due to unsatisfactory results arising from technical issues internal to the Generation Facility shall not be considered as a ground for extension.

In this case, the Generation Company shall inform the ERC, the DOE and the MO immediately that the Test and Commissioning cannot be/was not completed within the prescribed period.

Thereafter, the Generation Company must undertake necessary measures to correct technical issues and apply for the issuance of another CTCTC from the ERC in accordance with Section 4.2.4.

**Section 5. Additional Responsibilities of the System Operator.** The SO shall:

- 5.1 Submit, as necessary, revised process flow to the EVOSS Steering Committee and ensure timely processing of applications and issuance of permits and certificates in relation to Test and Commissioning;
- 5.2 Ensure reliability of grid operations during Test and Commissioning of Generation Facilities;



- 5.3 Recommend to the Rules Change Committee, as necessary, improvements to the WESM Dispatch Protocol to clarify real-time dispatch of Generation Facilities on Test and Commissioning during normal and abnormal system conditions; and
- 5.4 Notify the DOE, ERC and the Generation Company, in a timely manner, any concerned instances when the Test and Commissioning has adverse impacts to grid operations.

**Section 6. Additional Responsibilities of the Transmission Network Provider.** The TNP shall:

- 6.1 Submit, as necessary, revised process flow to the EVOSS Steering Committee and ensure timely processing of applications and issuance of permits and certificates in relation to Test and Commissioning;
- 6.2 Ensure timely processing of applications and issuance of permits and certificates in relation to Test and Commissioning;
- 6.3 Develop or update existing procedures for witnessing or conducting Test and Commissioning for grid-connected Generation Facilities in line with the policies provided herein;
- 6.4 Closely coordinate with Distribution Utilities with respect to Test and Commissioning of Embedded Generators; and
- 6.5 Ensure adherence to the maximum allowable period for Test and Commissioning and report to the DOE, ERC and the Generation Company, in a timely manner, any instances of violation by Generation Facilities.

**Section 7. Additional Responsibilities of the DUs.** The DUs shall:

- 7.1 Ensure timely processing of applications and issuance of permits and certificates in relation to Test and Commissioning of Embedded Generators;
- 7.2 Develop or update existing procedures for witnessing or conducting Test and Commissioning for Embedded Generators in line with the policies provided herein;
- 7.3 Closely coordinate with TNP with respect to Test and Commissioning of Embedded Generators; and
- 7.4 Ensure adherence to the Maximum Allowable Period for Test and Commissioning and report to the DOE, ERC and the Generation Company, in a timely manner, any instances of violation by Generation Facilities.

**Section 8. Additional Responsibilities of the Market Operator.** The MO shall:

- 8.1 Prepare and submit to the Rules Change Committee proposed changes to the WESM Rules and relevant Market Manuals in accordance with the policy provided herein as necessary;

- 8.2 Submit, as necessary, revised process flow to the EVOSS Steering Committee and ensure timely processing of applications and issuance of permits and certificates in relation to Test and Commissioning;
- 8.3 Closely coordinate with the ERC, SO, NSPs and Generation Companies to reflect the actual status of Generation Facilities in the WESM registered capacity list, which is being submitted to the DOE;
- 8.4 Request disconnection of Generation Facilities that have not submitted their COC within fifteen (15) working days from receipt thereof in accordance with existing guidelines for disconnection; and
- 8.5 Ensure adherence to the maximum allowable period for Test and Commissioning and report in a timely manner to the DOE, ERC and the Generation Company, in a timely manner, any instances of violation by Generation Facilities.

**Section 9. Regulatory Support.** The ERC shall:

- 9.1 Review, update and harmonize, as necessary, all pertinent resolutions and regulations relevant to the implementation of the policies stated under this Circular and promulgate guidelines on the same, which shall include, but not limited to:
  - 9.1.1 Rules for Issuance of COC;
  - 9.1.2 Guidelines for the Recovery of Costs for the Generation Component of the Distribution Utilities' Rates with respect to transactions during Test and Commissioning; and
  - 9.1.3 Accreditation Guidelines for Third-Party Testing Entities.
- 9.2 Closely monitor and maintain an updated inventory of Generation Facilities undergoing Test and Commissioning;
- 9.3 Ensure timely issuance of CTCTC and COC, consistent with the timelines provided in this Circular and the EVOSS Act and its IRR; and
- 9.4 Implement enforcement and penalty mechanisms in cases of non-compliance—with this Circular by any electric power industry participant identified herein.

**Section 10. Transitory Provisions.** Generation Companies already on Test and Commissioning for more than the maximum period prescribed in Section 4.1.1 prior to effectivity of this Circular shall be subject to the measures under Section 4.3.3. They are required to apply for a CTCTC with the ERC pursuant to Section 4.2.4 to continue Test and Commissioning.

Generation Companies already on Test and Commissioning prior to effectivity of this Circular but have not exceeded the maximum period prescribed in Section 4.1.1 shall ensure completion of Test and Commissioning within the maximum period and thereafter comply with requirements under Section 4.4. Otherwise, they shall apply

for extension of Test and Commissioning or secure a CTCTC, as may be applicable, pursuant to Section 4.5.

**Section 11. Failure to Act on Applications.** Section 13 of the EVOSS Act and Rule 9, Section 4 of its IRR shall apply to applications with complete submissions which were not acted upon by the DOE, ERC, NSPs, MO or SO within the prescribed time frames identified under this Circular.

**Section 12. Separability Clause.** If for any reason, any section or provision of this Circular is declared unconstitutional or invalid, such parts not affected shall remain valid and subsisting.

**Section 13. Repealing Clause.** Any department circular or issuance, contrary to or inconsistent with this Circular is hereby repealed, modified or amended accordingly except for Department Circular No. DC2013-05-0009 which shall stay in effect until the FIT installation targets for run-of-river hydroelectric plants have been fully subscribed.

**Section 14. Effectivity.** This Circular shall take effect fifteen (15) days after publication in at least two (2) newspapers of general circulation. Let a copy of this Circular be furnished to the University of the Philippines Law Center - Office of National Administrative Register (UPLC-ONAR).

Issued this \_\_\_\_\_ 2020 at the DOE, Energy Center, Rizal Drive, Bonifacio Global City, Taguig City, Metro Manila.

**ALFONSO G. CUSI**  
Secretary