

**MEETING BETWEEN MINISTRY OF INDUSTRY & TRADE, MINISTRY OF
PLANNING AND INVESTMENT AND VBF ON THE DRAFT OF PRIME MINISTER'S
DECISION ON ENCOURAGEMENT MECHANISM FOR
SOLAR POWER DEVELOPMENT IN VIETNAM**

Time & Date: 14:00, Tuesday, April 16, 2019

Venue: MPI's Office, 6B Hoang Dieu, Hanoi

SUMMARY OF DISCUSSION

Participants:

Ministry of Planning and Investment

- Mr. Nguyen Noi - Deputy Director, Foreign Investment Agency
- Mr. Son, Department of Industrial Economy
- Mr. Vu Xuan Huong, Policy Division, Foreign Investment Agency

Ministry of Industry and Trade

- Mr. Nguyen Ninh Hai - Director of New & Renewable Energy Department, Electricity and Renewable Energy Authority (“EREA”)
- Mr. Le Anh Duc - Director of Electricity Market Development & Human Resource Training Center, Electricity Regulatory Authority of Vietnam (“ERAV”)

VBF

- Mr. John Rockhold – Head of VBF Power & Energy WG
- Mr. Tetsu Funayama – VBF Board Member
- Mr. Luong Ba Hung – Project Director of Sustainable Energy Project/ VBF Power and Energy WG
- Mr. Nguyen Thanh Hai – Steering Committee Member, VBF Power & Energy WG

And more than 25 representatives from enterprises

RESPONSE ON SOME KEY ISSUES OF THE DRAFT DECISION

Response by Mr. Nguyen Ninh Hai – Director of New & Renewable Energy Department, EREA

- Ministry of Industry and Trade (“MOIT”) has just issued a new Draft, which reflected some of the comments from VBF, specifically:
 - Definition of rooftop solar power has been written in more simple language for easier understanding.
 - Direct power sale and purchase agreement model (DPPA) for rooftop solar power systems: the power generators and the buyers shall agree on commercial terms according to current regulations. MOIT does not regulate this matter.
 - The capacity limit for rooftop solar power system must be less than or equal to 1 MWp. Such regulations are set due to the following reasons:

- ✓ Rooftop solar power system usually has a wide range of capacity, up to 20MW. The threshold of 1MWp is to encourage small-scale projects (1 - 5kV capacity) because of their large installation costs. Electricity pricing in the Draft is also to encourage small-scale projects.
 - ✓ For large-scale projects, the production and installation costs will be smaller. Therefore, the Draft does not propose the application of a separate pricing mechanism for large-scale rooftop solar power projects.
 - ✓ From a technical perspective:
 - The solar power projects with a capacity of more than 1 MWp can greatly affect the power grid system both in voltage fluctuation and frequency fluctuation.
 - Some countries around the world provide for a much stricter regulations on capacity limit. For example: France sets a range of 16kV - 50kV.
 - The threshold of 1MWp is a very “flexible” regulation introduced by MOIT.
 - ✓ From a legal perspective: According to the Law on Master Planning, all of the projects must be submitted to the Prime Minister for approval. MOIT is not sure whether the 1MWp limit proposal will be approved.
- Regarding the proposal to raise the threshold of exemption of Power Generation Licence requirement from 1 MWp to 3 MWp, MOIT well noted and will consider in the process of preparing draft implementing Circular and draft Model Power Purchase Agreement.
 - The latest draft Decision does not yet specify the planning categories which solar power projects belong to (provincial or regional, or power development plans). In the future, the regulations shall be more specific.

Summary of key contents of the latest Draft:

- The buyers have been expanded to cover 2 main entities:
 - Vietnam Electricity (EVN) → this requires compliance with the Model PPA and other regulations.
 - Other entities → it will be based on commercial agreements between sellers and buyers.
 - In terms of rooftop solar power, 4 separate models have been developed:
 - 1) ***Power consumption model:*** is a model wherein organizations and individuals that invest in and install rooftop solar power system will use a portion of output of the electricity produced from the solar power system and sell surplus/excess electricity to the national grid.
 - 2) ***Business model for surplus/excess electricity:*** is a model wherein organizations and individuals that invest in and install rooftop solar power system will sell a portion of output of electricity to other organizations and individuals and sell surplus/excess electricity to the national grid.
- ➔ A Circular in the future will further provide clearer regulations in a way that the power purchase agreements will be separated and not an annex of the power consumption agreements.

- 3) ***Business model for entire electricity output:*** is a model wherein organizations and individuals that invest in and install rooftop solar power system will sell entire output of the electricity produced from their rooftop solar power system to the national grid.
- 4) ***Direct power purchase model:*** is a model wherein organizations and individuals that invest in and install the rooftop solar power system will sell electricity output generated by the system to other organizations and individuals, and will not use the national grid directly.
- Clause 3, Article 12: Indicating clearly that, *if the power buyer is not EVN or one of its authorized affiliates, the power purchase price and the power purchase agreement are performed in accordance with current regulations.*
 - The draft has removed the regulations on the preferential electricity pricing for grid-connected solar power projects with battery storage as the proper timing has not come.

OTHER QUESTIONS BY VBF

Mr. Tran Minh Thanh - Senior Associate, Duane Morris Vietnam

- 1) Enforcement of this Decision requires a model power purchase agreement. Thus, does MOIT have a plan to draft and issue a draft Model Power Purchase Agreement? Are there any differences between the model PPA for different models, such as the purchase of floating solar power projects or ground-mounted solar power projects, and if there will be any changes to the current model agreements?
- 2) The new draft defines that the power buyers include EVN and other power buyers and sellers. However, the clauses related to connection contracts, transmission system, etc. have not been thoroughly adjusted in model/normal PPA; instead, they are still targeted for EVN and its affiliates. This leads to misunderstandings.

What are the criteria to determine "other electricity buyers and sellers"? If this is not stated in the Draft, will it be specified in the Circular? Currently, only industrial buyers of electricity are entitled to purchase electricity directly from the developers. Will the future definition have a wider coverage?

- 3) According to MOIT, the new electricity pricing applicable to other electricity buyers will be valid specifically to the rooftop solar power projects. So, in case the power purchase agreement between other electricity buyers and sellers is not about rooftop solar power, is it possible for the two parties to agree on their own pricing or are they required to follow FiT as well as the model power purchase agreements?
- 4) For Ninh Thuan province, it is only applicable to grid-connected solar power projects with a total maximum capacity of 2,000 MW. So, by the time the Decision enters into effect, is it possible to issue a list of eligible projects? Is there any possibility for investors to participate in new projects in Ninh Thuan?

5) The auction plan for new solar power sources will be implemented in 2020. Has the MOIT developed a Draft on this issue?

Response by Mr. Nguyen Ninh Hai – Director of New & Renewable Energy Department, EREA

- Regarding the model PPA, EREA is given the leading role in drafting process. When the Prime Minister approves this Decision, EREA will draft a Circular, including a draft model PPA.
- Regarding other electricity buyers and sellers: Chapter III on rooftop solar power provides for separate clauses on power purchase applicable to other EVN entities; however, Chapter II on grid-connected solar power does not specify this issue. The ground-mounted solar power projects must fully comply with regulations on power sale to EVN and adopt the model PPA. For the clauses under Chapter I - *General provisions* that do not clearly distinguish between buyers who are EVN and those who are different from EVN, the MOIT will have a review and provide for clarification to avoid confusion between these two. Regarding connection techniques in case the electricity buyer is not EVN, the projects are still required to comply with the technical standards for direct and indirect grid connection.
- Circular No. 05 only provides for the rooftop solar power purchase agreement, but it does not cover model power purchase agreements for ground-mounted solar power.
- Regarding the capacity adjustment plan for Ninh Thuan province, in line with the Government's direction in Resolution 115 on pricing mechanism for solar power projects in Ninh Thuan province, the pricing mechanism at Decision 11 shall be further applicable to the end of 2020. Currently, the Draft is following closely the Resolution 115. According to MOIT's internal review, as of December 31, 2018, the total approved capacity for Ninh Thuan is about 1,930 MW. However, supplementary planning at this time is not possible due to requirements under the Law on Master Planning.
- Regarding the auction plan for solar power, MOIT has studied this matter and generated initial reports and recommendations, however, it remains difficult in the implementation process. MOIT plans to work with the World Bank to develop a procurement mechanism after 2021.
- MOIT expects to apply FiT 2 mechanism for 2.5 years, from July 1, 2019 to the end of December 2021 should it be timely approved.

**Mr. Nguyen Thanh Hai – Steering Committee Member, VBF Power and Energy WG,
Associate/Baker & McKenzie Vietnam**

- In terms of the feasibility of the Behind the Meter on-site solar projects applicable to both ground-mounted and rooftop solar power projects with installed capacity of over 1MWp, it has not been clearly stated in the Draft Decision? If this model is legally regulated for implementation, the Draft Decision is also not clear in terms of any requirements that must be met (power planning, legal, technical, licensing requirements, etc.). These points have not yet been clear in the wordings of the Draft Decision?
- For Ninh Thuan province, in relation to grid-connected solar power projects to be eligible within a total maximum capacity of 2,000MW, the Draft Decision's drafting refers to two criteria: (1) Such a project is included in the power development plans at all levels, and (2) The commercial operation date of the project is before January 1, 2021. In particular, in terms of criteria (1), the Draft Decision is not yet clear on the date on which the criteria (1) will apply to determine eligible projects that have been included in the development plans (whether it is determined based on a date before the issuance date of Resolution 115 of August 31, 2018, or the expected effective date of this Decision, i.e. July 1, 2019, or a future date before January 1, 2021). The unclear drafting of this provision in the Draft Decision on the applicable date of the criterion (1) should be clarified and if it remains unclear, it may lead to different interpretations as to determine which projects are eligible for the 2,000MW package. MOIT may consider to clarify such provisions in the Draft Decision for consistent understanding and interpretation when implementing.
- Recently, some projects in Ninh Thuan have been revoked due to delayed progress. So how does this development affect the evaluation and determination of a list of projects eligible for the 2,000MW package? This is not entirely clear at this moment.

***Response by Mr. Nguyen Ninh Hai – Director of New & Renewable Energy Department,
EREA***

- The regulations already approved by the Prime Minister will continue to be effective. The regulations that are issued later must avoid overlaps with the previously issued ones.
- The capacity of a rooftop solar power system is required to be less than or equal to 1 MWp. In case of power purchase in the industrial parks and given that they do not use EVN's power grid, a direct power purchase agreement, not the model power purchase agreement, shall be applied.
- In the case of Ninh Thuan province, based on current reports, MOIT will only focus on two conditions: (1) the total capacity does not exceed 2,000 MW, and (2) the date of commercial operation is before January 1, 2021.

- In case a project is revoked by the Province, the Law on Investment regulates that it is still a planned project. Should the Province select another investor in accordance with current regulations, it remains as a planned project and this mechanism may still be applicable.

Mr. Vu Toan Thang – Power Market Manager, AES Vietnam

- Will the MOIT continue to collect feedback on the new Draft or will it be submitted to the Prime Minister for approval?
- Decision 11 will soon expire, leading to certain disruptions in supplementary planning for power projects. If an investor currently wishes to submit an application for supplementation for construction in the master plan for its solar power projects to MOIT for approval, is it necessary to wait for official issuance of new Decision as a replacement of Decision 11 or a Decree guiding the implementation of Law on Master Planning, or such a submission can be undertaken at this moment?
- Currently, it is stated that Vietnam's conditions are not suitable to issue a price support mechanism for grid-connected solar power projects with battery storage. Is it possible for MOIT to consider pilot introduction of this mechanism because the energy storage system has many advantages in grid congestion relief, voltage regulation and many other supports?

Response by Mr. Nguyen Ninh Hai – Director of New & Renewable Energy Department, EREA

- According to the Law on promulgation of legislative documents, MOIT will not collect further comments. For the feedback which have not been reflected, MOIT will list them in the explanatory section of its report to the Prime Minister.
- Under the Law on Master Planning, the investors can now submit new proposed projects to MOIT without a need to wait for official issuance of the Decision as a replacement of Decision 11. However, the Law on Master Planning currently presents many issues, leading to suspension of many projects.
- As advised by a consultant, the construction of the storage system in parallel with each solar power project does not generate social benefits and should not be implemented. However, building storage systems in the power system is quite an obvious requirement, especially when many renewable energy sources are more integrated to the power grid. Currently, MOIT is targeting to build a centralized storage system that can be managed by EVN or other investors in a suitable location for dispatch of ENV power system. MOIT will undertake further study on this issue.

DPPA progress:

Response by Mr. Le Anh Duc – Director of Electricity Market Development & Human Resource Training Center, ERAV

Under ERAV's study, DPPA aims to cover renewable energy projects that are directly connected to the national grid and sell electricity to non-EVN third parties (i.e., off-grid DPPA). At present, a DPPA model proposed for Vietnam has been agreed. The ERAV will further discuss to develop the basic principles for the pilot scheme, which are tentatively completed by the end of April for consultation in late May/early June 2019. Tentatively, by the end of 2019/early 2020, official announcement will be made on whether the DPPA pilot scheme will be implemented.

CLOSING

Mr. Nguyen Noi - Deputy Director, Foreign Investment Agency, MPI

Should VBF have further comments on the new Draft Decision, it is advised to consolidate and submit to MOIT for its further consideration.