

**BEFORE THE HARYANA ELECTRICITY REGULATORY COMMISSION  
BAYS No. 33-36, SECTOR-4, PANCHKULA- 134112, HARYANA**

**Case No. HERC/PRO-22 of 2019**

**Date of Hearing : 01.05.2019  
Date of Order : 13.05.2019**

**In the Matter of**

Haryana Electricity Regulatory Commission (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, 2017 notified on 24.07.2018 and amendment thereof notified on 27.08.2018.

**And**

**In the Matter of**

Haryana Electricity Regulatory Commission (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, (2<sup>nd</sup> Amendment) 2017 - Suo Motu.

**Petitioner**

Haryana Renewable Energy Development Agency (HAREDA)

**Present:-**

1. Shri R. Birthal, Project Officer, HAREDA
2. Shri R.S. Poonia, Project Officer, HAREDA
3. Shri Sh. Gaurav Gupta, Xen/HPPC
4. Sh. Vikas Kadian, Xen/HPPC
5. Shri Randhir Singh, AEE/HPPC
6. Smt. Seema Sadana, AE/HPPC
7. Shri Ankur Sood, Advocate for Amplus Sun Solution Pvt. Ltd.
8. Smt. Romila Mandal, Advocate for Amplus Sun Solution Pvt. Ltd.
9. Shri Alok Verma for Amplus Sun Solution Pvt. Ltd.
10. Shri R.K. Jain, Advisor/Legal
11. Shri B.S. Yadav, Director, M/s. KAM Solar
12. Shri K.S. Sandhu, Project Manager, M/s. Redwin Solar System
13. Shri B.D. Sharma for M/s. JBM Solar
14. Shri Purohit
15. Shri Pankaj Sharma
16. Shri Sandeep Mittal
17. Shri Utkarsh Gautam
18. Shri Pranav Sihag

**Quorum**

**Shri Jagjeet Singh,  
Shri Pravindra Singh Chauhan,**

**Chairman  
Member**

## ORDER

### **Brief Background of the Case**

1. The present petition has been filed by Haryana Renewable Energy Development Agency (HAREDA) seeking amendment in the HERC RE Regulations, 2017.
2. HAREDA has submitted as under:-
  - i) That the Petitioner i.e. Haryana Renewable Energy Development Agency (hereinafter referred to as 'HAREDA'), having its registered office at Akshay Urja Bhawan, Panchkula, Institutional Plot no. 1 Sector-17, Panckula-134109, is the State Nodal Agency for co-ordinating all activities relating to Renewable Energy Development including generation of power using non-conventional energy sources as per the Haryana Govt. Policy for Promoting Generation of Electricity through Renewable Energy Sources Notified vide no. 22/69/2005-5P dated 23.11.2005. HAREDA is also implementing the Haryana Solar Power Policy 2016 notified vide No.19/4/2016-5Power dated 14.03.2016 and Haryana Bio-energy Policy 2018 notified vide No.19/06/2018-5Power dated 9.03.2018 and as amended from time to time.
  - ii) That the Commission has notified Haryana Electricity Regulatory Commission (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, 2017 vide No. HERC/40/2018 dated 24.07.2018 followed by its amendment notified on 27.08.2018.
  - iii) That Clause no. 58 of the HERC RE Regulations, regarding banking of RE Power, provides as under:-

*“A generator or a Captive Power Producer or a Consumer in the State may bank power on payment of the banking charges along with the transmission and distribution losses (Technical Loss) for availing the open access on the transmission or distribution network of the licensees for banking and drawl of banked power from the Discoms after entering into the banking agreement with the concerned Discoms at the terms and condition specified in the agreement, as follows:-*

    - a) *The solar power shall be allowed to be banked with the distribution licensee(s) subject to the condition that 5% of power banked in (kind) shall be deducted toward banking charges. Transmission and Distribution loss for open access shall be limited to Technical loss, in addition to banking charges @ 5%.*

- b) *The Energy Banked shall be permitted to be carried forward from month to month. The banked power shall be utilized within the same financial year failing which the unutilized energy at the end of the financial year shall lapse, and no compensation whatsoever shall be claimed/ paid for such lapsed banked energy, provided the solar energy banked during the last quarter of the financial year shall be carried forward to the next financial year.*
- c) *The banking shall be allowed throughout the year, however, the drawl of banked power shall not be allowed during the peak season period (July to mid October).*
- d) *The drawl of bank power shall also be not allowed during peak load hours and time of day (ToD) tariff period.”*

HVPNL / SLDC shall formulate the criteria for settlement of wheeled energy at Consumer end in consultation with the Stakeholders and submit the same to the Commission for approval within 3 months of notification of these Regulations.

- iv) That Clause no. 60 of the ibid Regulations provides as under:-

*“60(1) Notwithstanding anything contained in any other Regulation(s) notified by the Commission, Wheeling Charges, Cross Subsidy Charges, Transmission & distribution charges and Additional Surcharge shall be totally waived of, for third party sale /Open Access consumers for energy from ground mounted / Roof Top Solar power, commissioned during the control period under these Regulations. This shall be subject to the condition that the solar power is generated and utilized within the State of Haryana and is counted towards RPO of the Distribution Licensee(s). However, Solar Energy purchased or generated by an obligated entity is to be counted towards the RPO of the said entity and not that of the Discoms.*

*Further provided that if such generated power is sold to obligated entities, Distribution licensee shall be eligible for RPO benefits only to the extent the consumed solar power is in excess of the purchase obligation of the obligated entity.*

*Further provided, that the Distribution Licensee shall be eligible for RPO benefits to the extent of unutilized banked power at the end of the financial year.*

*The waiver shall be applicable to the Captive Solar PV Power for self consumption as well. However, the losses, as determined by the Commission,*

shall be recovered in kind by the Haryana Power Utilities. Further, banking charges as per these Regulations shall be applicable so that the Haryana Power Utilities are not burdened un-reasonably.

(2) All the waivers/concessions/banking provided in these Regulations shall correspond to the period of 10 years from the date of commissioning or date of notification of this regulation, whichever is later, for power generated and consumed within the State of Haryana. Provided the waivers / concessions /banking shall be applicable till the aggregate installed capacity of 500MW of Solar PV Plants in the State is achieved, where after the Commission shall review the provision of waivers / concessions /banking taking into account the financial impact on the Distribution Licensees. Further provided that waivers / concessions /banking once provided to any project shall be applicable for a period of 10 years, as above.

It is further clarified as under:-

1. The cap of 500MW is the aggregate installed capacity of the Solar PV projects commissioned in Haryana for consumption of power within Haryana and availing waivers/concessions provided under these Regulations. Accordingly, HVPNL shall consider grant of connectivity subject to feasibility, date of registration of the project and financial closure.

2. HAREDA, being the Nodal Agency shall monitor the progress of projects set up in the State in terms of milestones related to:-

- a) Installed capacity of Plant & Location.
- b) Installed capacity tied up for consumption in Haryana.
- c) Land acquisition.
- d) Grant of connectivity for open access.
- e) Financial closure.
- f) Commissioning date.

For this purpose, HAREDA shall develop a suitable interface on their website, within two months, so that developers can directly upload the status of progress of their projects as and when there is any change in status with respect to above mentioned milestone. The data shall be easily visible to all those visiting the HAREDA website.

All developers desirous of availing waivers/concessions under these Regulations shall register specific project with HAREDA. Connectivity for such Solar PV project shall be granted by the Utility provided they are found to be registered on the HAREDA website.”

The cap of 500MW is the aggregate installed capacity of the Solar PV projects commissioned in Haryana for consumption of power within Haryana and availing waivers/concessions provided under these Regulations. Accordingly,

HVPNL shall consider grant of connectivity subject to feasibility, date of registration of the project and financial closure.

- v) That with the approval of Council of Ministers in the meeting held on 13.02.2019 and 08.03.2019, the Clause no. 4.3 of Haryana Solar Power Policy 2016 has been amended and notified vide notification no. 19/7/2019-5 P dated 08.03.2019, which has been substituted as under:

***“4.3 Exemption of Wheeling, Transmission, cross subsidy charge and additional surcharges:***

*Wheeling and Transmission Charges will be exempted for ten years from the date of commissioning for all Captive Solar Power Projects which have submitted applications to Haryana Renewable Energy Development Agency (HAREDA) for registration of project, purchased land or have taken land on lease for thirty years and have bought equipments& machinery or invested at least Rs. one crore per Mega Watt for purchase of equipments& machinery for setting up of such Captive Solar Power Projects till 13th February, 2019, while cross subsidy surcharges and additional surcharges are not applicable for Captive Solar Power Projects as per provisions of Electricity Act 2003. For determining the investment of Rs. One crore per MW, payment for equipment should be made into the bank accounts of equipment supplier before 13<sup>th</sup> February, 2019 and proof of the same is to be submitted.*

*No waiver of wheeling and transmission charges, cross subsidy surcharges and additional surcharges shall be given to solar power Projects set up for third party sale.*

*Against the waivers, Renewable Purchase Obligation (RPO) benefit will be provided to Power Utilities as per RE Regulations 2017 with amendments from time to time.*

*Banking will be provided for captive/ third party solar generation projects. However, banking charges shall be applicable as per RE Regulations 2017 with amendments from time to time.”*

- vi) That the State Govt. has notified Policy for promoting Generation of Electricity through Renewable Energy Sources dated 23.11.2005. Under this Policy, facility of banking has been provided under Clause 11 of the said Policy which is reproduced as under:-

*“HVPNL/ DHBVN/ UHBVN/ licensee is to permit electricity generated by eligible producers to be banked. The banking facility shall be allowed for a period of one year by the Licensee/ Utilities free of cost. However, withdrawal of banked power should be allowed only during non-peak hours. If the banked*

*energy is not utilized within a period of twelve months from the date of power banked with the concerned power utilities/ licensee, it will automatically lapse and no charges shall be paid in lieu of such power.”*

- vii) That to give boost to biomass based power generation, the State Govt. has notified Haryana Bio-Energy Policy 2018 on 09.03.2018. Under this Policy also under Clause C (ii) & (iii) of Chapter 3, the banking facility has been provided for biomass based power projects. The said Clause C (ii) & (iii) of Chapter 3 reads as under:-

*“Third party Sale, Wheeling, Banking and Open Access*

*(ii) Discoms/ Licensees shall permit electricity generated by eligible producers to be wheeled and banked without any charges.*

*(iii) The banking facility shall be allowed on annual basis by the Licensee/ Utilities to eligible electricity producers as per HERC Regulations and IPP will pay the difference of Unscheduled Interchange charges (UI charges) at the time of injection and at the time of withdrawal. However, withdrawal of banked power will be allowed only during non-peak hours. If the banked energy is not utilized within a period of twelve months from the date of power banked with the concerned power utilities/ licensee, it will automatically lapse and no charges shall be paid in lieu of such power.”*

- viii) That in view of the above, the following is submitted:-

(i) The life of the Solar Power Project is of 25 years, but there is no mention in RE Regulations 2017 about the time period for which banking facility is to be provided to the Solar Power Projects.

(ii) In the HERC Regulations, 2017, the banking facility is allowed only for solar power projects whereas in Policy for Promoting Generation of Electricity Through Renewable Energy Sources 2005 and Haryana Bio-Energy Policy 2018 there is a provision for banking facility to all renewable energy projects. Accordingly, the facility of banking needs to be provided to all the RE projects.

(iii) The HERC Regulation, 2017 may be amended in-line with Clause no. 4.3 of Haryana Solar Power Policy 2016 amended and notified vide notification no. 19/7/2019-5P dated 08.03.2019.

- ix) That the following prayer has been made:-

a) The Clause No. 58 (1) may be substituted as under:-

Power generated from all the renewable energy sources shall be allowed to be banked with the distribution licensee(s) subject to the condition that 5% of power banked in (kind) shall be deducted toward banking charges.

Transmission and Distribution loss for open access shall be limited to Technical loss, in addition to banking charges @ 5%. Banking of power from all the renewable energy projects shall be permitted for the entire life of the respective RE project as defined by the Commission from the date of their commissioning.

b) The Clause no. 60 (1) & (2) of the HERC Regulation, 2017 may be amended in-line with Clause no. 4.3 of Haryana Solar Power Policy 2016 amended and notified vide notification no. 19/7/2019-5P dated 08.03.2019.

### **Proceedings in the Case**

3. The Commission issued Public Notice in The Tribune (English) and Dainik Bhaskar (Hindi) dated 17.04.2019 inviting written comments/objections in the case on or before 29.04.2019 and intimating the date of hearing of the Petition. The Public Notice was also hosted on the website of the Commission.
4. HAREDA mainly reiterated the contents of its Petition, which for the sake of brevity has not been reproduced herein. HAREDA additionally submitted that in order to utilize vast potential of solar generating plants on canal tops, prospective ground mounted solar power developers above 10 MW may be mandated to procure a Certificate from irrigation department/public water works department regarding non availability/feasibility of installation of such power plant on canals.
5. No objector filed any comments/objections on or before 29.04.2019. However, the following parties gave oral submissions for consideration of the Commission:-
  - i) M/s. Amplus Sun Solution Pvt. Ltd.
  - ii) Shri R.K. Jain, Advisor/Legal
  - iii) Shri B.S. Yadav, Director, M/s. KAM Solar
  - iv) HPPC
- i) M/s. Amplus Sun Solution Pvt. Ltd., submitted as under:-
  - a) That HERC RE Regulations, 2017 provides that "HVPNL/SLDC shall formulate the criteria for settlement of wheeled energy at consumer end in consultation with the Stakeholders and submit the same to the Commission for approval within 3 months of notification of these Regulations". However, neither the draft wheeling and banking agreement has been finalized nor the energy settlement procedure has been laid down.

- b) The Commission may clarify the capacity up to which banking facility would be made available;
- c) As provided in the amendment to the Haryana Solar Policy dated 08.03.2019, the banking should be made available for all captive /third party solar generation projects over the entire life of the project, as against the restriction of 10 years provided in the existing RE Regulations.
- d) No linkage of contract demand and project capacity: The Commission has considered the issue in its Order dated 30.06.2018 and directed as under:-  
*“The Commission has considered the issues raised above and is of the considered view that Regulation relating to reduction of contract demand shall not be applicable for Solar PV Power. Further, no provision is envisaged in the RE Regulation on the restriction of capacity of solar plant upto the contract demand”*

However, the direction to this effect has not been given in the notified RE Regulations, 2017.

- ii) Shri R.K. Jain deliberated at length on the Procedure/guidelines dated 09.10.2018 issued by HAREDA for approval of MW scale ground mounted/rooftop projects/solar park for captive consumption or third party sale under Haryana Solar Policy, 2016/HERC RE Regulations, 2017. The Commission observes that these guidelines have since been withdrawn by HAREDA, therefore, it serves no purpose to discuss the same.

Shri Jain further advanced his arguments by submitting that the State of Haryana is already lagging behind in terms of Solar Power development. Therefore, the waivers/concessions of Wheeling and Transmission charges allowed in the HERC RE Regulations, 2017 should continue and the cap of 500 MW up to which these waivers shall be applicable, should be removed.

- iii) Shri B.S. Yadav, Director, M/s. KAM Solar, raised suspicion on the cut off dated of 13.02.2019 mentioned in the guidelines dated 08.03.2019 issued by HAREDA. He alleged that the selection of captive solar power produced by HAREDA for grant of waiver of wheeling and transmission charges was not fair and transparent.

- iv) HPPC submitted that Regulation clause no. 59 of HERC RE Regulations, 2017, provides as under:-

*“The State transmission utility or the Transmission/Distribution Licensee shall bear the cost of Extra High Voltage (EHV)/ High Voltage (HV) transmission line up to a distance of 10 km. from the inter-connection point. In case the distance between the inter connection point and point of grid connectivity is more than 10 KMs then the cost*



*of transmission line for the distance beyond the 10 KMs shall be borne equally between the Independent Power Producer and the licensee.”*

In this regard, HPPC submitted that the HVPNL/DISCOMs should bear the transmission line cost upto 10 km, only in the case where the power is to be supplied to DISCOMs under approved PPA. RE Power producers installed under third party sale or captive consumption, should bear the cost themselves.

### **Commission’s Analysis and Order**

6. The Commission has examined the petition filed by HAREDA as well as considered the oral submissions made by the parties present in the hearing held in the case.

7. The issues raised by the stakeholders including HAREDA and the Commission’s decision thereto are as under:-

i) Wheeling and banking agreement has not been finalized by HVPNL/SLDC.

#### **Commission’s view:-**

**Procedure/guidelines for banking of energy from RE power projects submitted by HVPNL vide memo no. Ch-104/15B-521 dated 06.03.2019 as prepared in consultation with stakeholders, is approved and enclosed with these Regulations as Annexure-A-1.**

ii) Capacity up to which banking facility would be made available.

#### **Commission’s view:-**

**The Commission has observed that Rule 3.1.a.ii of The Electricity Rules, 2005 provides as under:-**

**“3(1) No power plant shall qualify as a ‘Captive Generating Plant’ under section 9 read with clause (8) of section 2 of the Act unless-**

**(a) In case of a power plant-**

**(i) .....**

**(ii) not less than fifty one per cent of the aggregate electricity generated in such plant, determined on an annual basis, is consumed for the captive use.”**

**Thus, in order to qualify a power plant as captive generating plant, it should be able to consume at least 51% of the electricity generated in such plant for its captive use as well as meet the requisite equity holding criteria. In terms of the specific provision in the Electricity Rules, 2005 for the captive generating plant, there is no need to separately specify the capacity upto which banking is allowed.**

- iii) The banking should be made available for all captive /third party solar generation projects over the entire life of the project.

**Commission's view:-**

**Banking will be provided for captive solar/non-solar RE generation projects, for the entire life of the project. However, banking charges shall be applicable as per RE Regulations 2017 with amendments from time to time.**

**The Commission is of the considered view that banking facility is allowed to take care of the power plant installed for captive use and power remaining unutilized for self consumption. Therefore, banking shall not be allowed for IPP set up for merchant sale & CPP selling power to consumers.**

- iv) No linkage of contract demand and project capacity:

**Commission's view:-**

**The Regulation clause no. 64.a already deals with the issue wherein it has been specified as under:-**

*“The provisions, if any, contained in any other regulation relating to reduction of contract demand shall not be applicable for solar PV Power.”*

**In this regard, it is further clarified that the consumers shall be allowed to install Rooftop solar power plant irrespective of their sanctioned load. Such consumers shall be allowed to sell the power so generated to HPPC at their least discovered solar power procurement price of latest preceding financial year. However, benefit of net metering shall not be allowed to such consumers. DISCOMs shall allow grid connectivity to such consumers within 15 days from the date of application.**

- v) The waivers/concessions of Wheeling and Transmission charges allowed in the HERC RE Regulations, 2017 should continue and the cap of 500 MW up to which these waivers shall be applicable, should be removed.

**Commission's view:-**

**The Commission observes that solar power generation in India has evolved rapidly over the years and solar tariff is seeking lower levels having attained grid parity quite sometimes back. It is observed that HPPC has been able to procure solar power from SECI at a tariff rate as low as Rs. 2.44/kWh. Thus, the benefits of waivers/exemptions promulgated in the Haryana Solar Policy, 2016 along with HERC RE Regulations, 2017 may not be required in the present circumstances for**

solar power generation, given the fact that the solar power tariff has declined significantly below those of the conventional and other RE power.

In view of the above, it is decided as under:-

- a) Wheeling and Transmission Charges will be exempted for the entire life of the project from the date of commissioning for all Captive Solar Power Projects which have submitted applications to Haryana Renewable Energy Development Agency (HAREDA) for registration of project, purchased land or have taken land on lease for thirty years and have bought equipment & machinery or invested at least Rs. one crore per Mega Watt for purchase of equipment & machinery for setting up of such Captive Solar Power Projects till 13th February, 2019, while cross subsidy surcharges and additional surcharges are not applicable for Captive Solar Power Projects as per provisions of Electricity Act 2003. For determining the investment of Rs. One crore per MW, payment for equipment should be made into the bank accounts of equipment supplier before 13<sup>th</sup> February, 2019 and proof of the same is to be submitted.
- b) No waiver of wheeling and transmission charges, cross subsidy surcharges and additional surcharges shall be given to solar/non solar power Projects set up by IPP/generator for third party sale.
- c) Against the waivers, Renewable Purchase Obligation (RPO) benefit will accrue to the Power Utilities as per RE Regulations 2017 as amended from time to time.
- vi) HVPNL/DISCOMs should bear the transmission line cost upto 10 km, only in the case where the power is to be supplied to DISCOMs under approved PPA.

**Commission's view:-**

Transmission/Distribution Licensee shall bear the cost of Extra High Voltage (EHV)/ High Voltage (HV) transmission line up to a distance of 10 km and shared cost in equal proportion beyond 10KM. Hence, this shall apply only in the case where the power is to be supplied to DISCOMs under approved PPA. RE Power projects, installed IPP for merchant sale or captive consumption, shall bear all such cost themselves.

It is further clarified that the terms & conditions for cost of evacuation of power in respect of PPA entered into by DISCOMs/HPPC with RE Power Producers under competitive bidding, shall be governed by the terms of such PPA.

- vii) Promotion of installation of solar power plant on canal/river/reservoir/nallah/water works etc.

**Commission's view:-**

**Solar power developers shall procure a Certificate from irrigation & water resources department/public health engineering department regarding availability/feasibility of installation of solar power plant on canal/river/reservoir/nallah/water works etc. The prospective developer shall proceed in the matter with concurrence of the department concerned and HAREDA.**

- viii) Other issues taken as suo-moto by the Commission:-

a) **The Commission has considered the clarification no. 30/04/2018-R&R dated 01.02.2019 issued by Ministry of Power with reference to the long term growth trajectory of Renewable Purchase Obligation (RPO). In this regard, it is clarified that RPO for fossil fuel based Captive Power Plants (CPP) of 5 MW and above including Fossil fuel based co-generation captive plant of 5MW and above, shall be under statutory obligation to meet the RPO targets applicable in the year in which CPP is commissioned. However, RPO of such plants commissioned up to 2018-19 shall be pegged at RPO applicable for the FY 2018-19. As and when the company add to the capacity of the CPP, it will have to provide for additional RPO as obligated in the year in which new capacity is commissioned. There should not be an increase in RPO of CPP without any additional fossil fuel capacity being added.**

b) **The DISCOMs, while complying with the RPO, shall ensure trade-off between REC & purchase of RE Power and take financial prudent action to minimize cost of mandatory RPO on the overall power purchase cost.**

c) **In order to promote Solar Power generation in Haryana along with battery storage, smart meter and smart grid, the licensees shall provide minimum incentive of Rs. 1/- unit for minimum period of 5 years. However, battery storage so installed should be of the minimum capacity equivalent to contract load. The incentive payable under these Regulations shall be reviewed by the Commission every year along with ARR/Tariff petition for that year and shall be made revenue neutral while issuing Order on the ARR/Tariff petition of the licensees.**

**The Petition is accordingly disposed of. The Haryana Electricity Regulatory Commission (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, (2nd Amendment) 2017 Regulations attached herewith at Annexure “A” shall be notified in the Haryana Government Gazette.**

This order is signed, dated and issued by the Haryana Electricity Regulatory Commission on 13<sup>th</sup> May, 2019.

Date: 13.05.2019  
Place: Panchkula

(Pravindra Singh Chauhan)  
Member

(Jagjeet Singh)  
Chairman

HERC

## **ANNEXURE - A-1**

### **PROCEDURE / GUIDELINES FOR BANKING OF RENEWABLE ENERGY (RE) POWER:**

This procedure has been prepared in compliance to the “Haryana Electricity Regulatory Commission RE Regulations, 2017(notification dated 24th July 2018). This Procedure shall be read in conjunction with the said Regulations.

The procedure covers guidelines, terms and conditions, various applicable charges, application format for applying for Banking/use of Transmission and/or Distribution system of the licensee(s) i.e. Haryana Vidyut Prasaran Nigam limited (HVPNL) and/or Uttar Haryana Bijli Vitran Nigam Limited (UHBVNL) and Dakshin Haryana Bijli Vitran Nigam Limited (DHBVNL) and disposal of applications made with HPPC for Banking of power by from Solar Power developers. This procedure shall be reviewed or revised by the nodal office i.e HPPC, as and when required to address any teething/ implementation problems that may arise, with prior approval of HERC. This procedure shall come into force after approval of the HERC.

**A. Nodal officers:** The following officers shall be the Nodal officers of the respective utility -

**(i) For Open Access:** The Chief Engineer/SO & Commercial, HVPNL, Shakti Bhawan, Sector-6, Panchkula shall be Nodal Agency for open access as per HERC Open Access Regulation, 2012.

**(ii) For Banking:** Chief Engineer / HPPC, Shakti Bhawan, Sector-6, Panchkula shall be the Nodal Agency for Banking. Applications for Banking shall be received and processed at HPPC in accordance with the procedure.

**B. APPLICABILITY /ELIGIBILITY:** Banking facility would be admissible only for RE Captive power Projects. Accordingly, RE Captive Power Producers (Meeting requirements of CPP under electricity rules 2005) registered/approved by HAREDA or Consumers buying power from such RE-Power Generators shall be eligible to apply for banking of power with HPPC. The eligibility shall be further governed as per the HERC (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, 2017. Solar Power Projects set up under Net Metering Regulations will not be eligible under this

Procedure. The facility of banking shall be admissible to Solar/ Non-Solar Power Plant set up in Haryana and for consumption of power in Haryana. Provided that banking once given to any Project as above shall be applicable for project life.

### **C. Application for Banking:**

- i. The eligible applicant shall apply for banking in the prescribed application form (enclosed as Annexure) at least a month prior to the commencement of wheeling/Banking and shall furnish the complete particulars about the Captive Generator & the consumers to whom the power is to be wheeled. Prior to applying for banking, the applicant should have secured connectivity, should have entered into connectivity agreement for open access with the Transmission licensee and Distribution licensee and should have been granted open access by the nodal agency.
- ii. The banking of power shall be governed by relevant provisions of HERC (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, 2017 and subsequent amendments thereof. A captive power producer or a consumer in the State may bank power on payment of the banking charges (in kind) subject to other terms and conditions as provided in the regulations.
- iii. **Documents to be submitted along with the Application:**
  - a. Copy of connectivity agreement;
  - b. Copy of Open Access approval from nodal agency i.e. HVPNL;
  - c. Copy of the Board Resolution of the company authorizing filing of application and designating an authorized person for filing the same, where the Applicant is a company;
  - d. Copy of Accreditation/approval of the project by HAREDA;
- iv. After scrutiny, nodal agency shall intimate the deficiencies in the application, if any, to the applicant within ten days of receipt of application. The applicant shall rectify the deficiency within ten days thereafter.
- v. **Banking Agreement**

After approval of banking from the nodal agency, the applicant shall enter into a tripartite banking agreement with the concerned DISCOMs/HPPC and HVPML at the terms and condition specified in the agreement as provided in the HERC Regulations,

2017, shall be for the project life unless it is terminated earlier on account of any default on the part of the Generator/consumer as provided in the Banking Agreement. Further, the agreement shall also be terminated in case the HERC withdraws the facility of Banking.

**D. Terms and conditions for Banking:**

- i. The Energy Banked shall be permitted to be carried forwarded from month to month. The banked power shall be utilized within the same financial year failing which the unutilized energy at the end of the financial year shall lapse, and no compensation whatsoever shall be claimed/ paid for such lapsed banked energy, provided the Renewable energy banked during the last quarter of the financial year shall be carried forward to the next financial year.
- ii. The RE power shall be allowed to be banked with the distribution licensee(s) subject to the condition that 5% of power banked (in kind) shall be deducted toward banking charges.
- iii. The banking shall be allowed throughout the year, however, the drawl of banked power shall not be allowed during the peak season/ period (July to mid-October).
- iv. The drawl of banked power shall also be not allowed during peak load hours ( As notified by HERC/ Discoms) or peak demand time of day (ToD) tariff period as applicable at the Drawl Point.
- v. At the end of a month, the total RE power injected during the month, the total RE Power adjusted during the month, RE Power adjusted from the previous banked energy during the month and net banked energy for the month (+ve or –ve) shall be worked out by **the Commercial wing of UHBVN/ Sr.A.O./Open Access of DHBVN** from the time slot wise energy statement prepared by SLDC, Haryana with the downloaded meter data. The Banked Energy shall be calculated at the end of a month by **the Commercial wing of UHBVN/ Sr.A.O./Open Access of DHBVN** as follows:-  
Banked Energy at the end of month (Ebi) = {Eg(1-losses)-Ec}\*(1-b) + Eb (i-1)

where

- \* Eg = Energy injected for the ith month
- \* Ec = Energy consumption for the ith month
- \* Eb (i-1) = Energy Banked at the end of previous month



\*b = Banking charges in kind as specified by HERC from time to time.

Losses are the transmission losses and distribution losses (Technical) as approved by the HERC in its Tariff Order for the relevant financial year.

The methodology is hereby illustrated with an example as under:

Solar power injected (Eg)		Transmission losses @ 2.46% as per HERC Order dated 15.11.2018	Distribution (technical) losses @5.87% as per HERC Order dated 15.11.2018	Solar power at consumer end (Eg(1-losses))	Energy consumption assumed Ec	Banking charges @ 5% (b)	Energy banked at the end of previous month assumed (Eb(i-1))	Banked energy at the end of month (Ebi)
kWh		kWh	kWh	kWh	kWh	kWh	kWh	kWh
Case 1: Generator and consumer both connected to 66 kV and above	100,000	2460	NA	97540	70,000	1377	20,000	46,163
Case 2: One of the Generator/Consumer is connected at 66 kV and other is connected at 33 kV in same utility	100,000	2460	5726	91814	70,000	1091	20,000	40,724
Case 3: Generator is connected to 11/33 kV in UHBVN and consumer is connected to 11/33 kV in DHBVN or vice versa	100,000	2460	11451	86089	70,000	804	20,000	35,284

vi. The solar power shall be adjusted as first charge in order of consumption of energy by a consumer. The banking will be counted on daily basis for the purpose of monthly account. Settlement of wheeled energy consumed at consumer end as per Special Energy Meter (SEM) installed shall be in the following priority.

1. Solar generation after deduction of transmission and distribution losses (technical).
2. Captive Power

3. Banked Energy from RE Power
4. Open Access Power through Exchange
5. Discom power

The cumulative energy drawn from the Discoms to be worked out as above shall be billed to the consumer as per relevant tariff category.

vii. As per Open Access Regulations 2012, by 10:00 hrs every day, the consumer shall submit slot wise schedule of power in MW to SLDC, Haryana on daily basis for the next day i.e. 00:00 hrs to 24:00 hrs showing his drawl from the following:-

1. Generation through Solar Plant.
2. Captive Power Plant.
3. Banked Power.
4. Open Access Power through Exchange.
5. Discom power.

Similarly, the generator shall also submit slot wise schedule of injection of power in MW to SLDC, Haryana on daily basis and power to be drawn at each of the drawl point.

viii. Any import of energy by the Generator/ CPP for start up or other allied purposes shall be charged at the HT Temporary tariff.

ix. In case, the power is wheeled to a OA customer, who is not a consumer of Discom, the following charges shall be leviable:

- a) Fixed charges per kVA per month as applicable to relevant category of consumer as determined by HERC from time to time corresponding to contracted capacity. In case of overdrawl beyond the contracted capacity, twice the fixed charges as applicable shall be recovered for the demand exceeding the contracted capacity.
- b) Energy charges for over drawl of power beyond the net injected power by the Generator/ CPP shall be applicable as per Open Access Regulations 2012, as amended from time to time.

x. The Generator/ CPP shall pay to the HVPNL before commencement of wheeling of power, security deposit equivalent to estimated open access charges for two months, which shall be retained by HVPNL till the expiry of agreement.

xi. In case HVPNL/ Discoms, on account of any force majeure conditions or breakdown of Grid / transmission lines are not in a position to evacuate/ wheel the power, then

HVPNL/Discoms shall not be liable to pay any compensation or damage or any claims whatsoever for any direct or indirect loss to Generator/ CPP.

xii. The solar power plant shall be governed as per HERC forecasting and scheduling Regulations as and when the same are notified.

xiii. The injected power through solar power plant and consumed power at the consumer end shall be submitted firstly in the form of downloaded meter data to SLDC, Haryana within 10 days of the following month. Thereafter, SLDC will process the data on the basis of meter data of consumer and prepare time slot wise actual energy statement within next 10 days. HVPNL shall forward this time slot wise energy statement to commercial wing of UHBVN / Sr.A.O./Open access of DHBVN which shall prepare Adjustment sheet including banked units in the current month and cumulative banked energy. Based on time slot wise actual energy statement, action shall be taken by HVPNL/DISCOM as under:-

a) The Transmission & SLDC charges shall be levied by HVPNL as per applicable HERC Open Access Regulation/MYT regulation for STOA/MTOA/LTOA

The wheeling charges shall be levied by DISCOMs as per applicable HERC Open Access Regulation/MYT regulation for STOA/MTOA/LTOA

b) Commercial wing of UHBVN/Sr. A.O. Open Access DHBVN shall prepare an adjustment sheet which includes "calculation sheet for adjustment of open access and solar energy" showing banked solar energy, solar energy consumed in current month, IEX Energy, DISCOM energy, amount in rupees payable etc.

xiv. Any solar power injected over and above the contracted capacity in any time block will be treated as dumped energy and not accounted for.

xv. **Metering**

The metering shall be provided for recording the energy injected as per the Central Electricity Authority (Installation and Operation of Meters) Regulations, 2006 read with subsequent amendments or re-enactment of the same or otherwise specified by the HERC. The metering equipment for measuring energy injected shall comprise of Main

and check meter and shall be installed at substation of HVPNL/DISCOMs at which energy is injected. The metering shall also be provided at the drawl point(s) of the Consumer(s).

Metering equipment shall be ABT compliant Special Energy Meters (SEMs) of accuracy class 0.2S required for the Project (both main and check meters) capable of recording both import and export of energy. CTs of 0.2S & PTs of 0.2 accuracy class shall also be provided. Meters shall have requisite communication facilities to ensure availability of real time data transfer connectivity with SLDC. Cost of metering shall be borne by the Generator/Consumer as the case be.

xvi. The injected energy (export) after deducting T&D losses and after setting off total drawl at drawl end at the end of the month shall be considered for banking purpose, hereinafter to be referred as “Banked Energy”.

xvii. The Generator/Consumer who wants to avail banking facility with wheeling of power under open access shall obtain connectivity with the grid as per HERC open access regulation, 2012 & amendment thereof.

#### **E. CPP RE Projects for Banking:-**

Capacity	The CPP will be allowed to inject power as per the banking agreement. The consumer will be allowed to draw power from CPP/banked power up to the contracted capacity. But, his overall drawl should remain within his contract demand. In case of exceeding the contract Demand, penalty as per relevant Regulations shall be leviable.
Metering	Metering shall be as per HERC Open Access Regulation, 2012 as amended from time to time.
Transmission Charge	Transmission charges as approved by the HERC in the tariff order for relevant year, shall be levied as per HERC RE-Regulation, 2017 (notified on 24.07.2018) as amended from time to time
Transmission Loss	Transmission losses as approved by the HERC in the tariff order for relevant year, shall be deducted in kind as per HERC RE-Regulation, 2017 (notified on 24.07.2018) as amended from time to time
WHEELING CHARGE	Wheeling charges as approved by the HERC in the tariff order for relevant year, shall be levied as per HERC RE-Regulation, 2017 (notified on 24.07.2018) as amended from time to time

WHEELING LOSS/Distribution (Technical loss)	Distribution losses (Technical) as approved by the HERC in the tariff order for relevant year, shall be deducted in kind as per HERC RE-Regulation, 2017 (notified on 24.07.2018) as amended from time to time
Banking Charges	5% of Power banked shall be deducted in kind toward banking charges
Energy Accounting	As provided in clause D (v & vi) above
CROSS SUBSIDY SURCHARGE	Cross subsidy surcharges as approved by the HERC in the tariff order for relevant year, shall be levied as per HERC RE-Regulation, 2017 (notified on 24.07.2018) as amended from time to time
ADDITIONAL SURCHARGE	Additional Surcharges as approved by the HERC in the tariff order for relevant year, shall be levied as per HERC RE-Regulation, 2017 (notified on 24.07.2018) as amended from time to time.
RPO	Energy sales (Solar Power) to third party and to obligated entities to the extent admissible as per RE-Regulations, 2017 as well as Banking charges in kind shall be counted towards RPO of DISCOMS.
Eligibility	All developers whose project have been registered/ Approved by HAREDA shall only be given banking facility.

**Application format for Banking:-**

- 1) Particular of CPP
  - i) Capacity of plant in MW:
  - ii) Location of the plant:
  - iii) Interconnection Voltage:
  - iv) Date of commissioning of project:
  - v) Contact Details:
  - vi) Substation where energy is injected:
  - vii) Accreditation/Approval of project by HAREDA:
  - viii) Schedule date of commencement of wheeling of power:
- 2) Capacity to be wheeled/banked in MW
- 3) Particular of Consumer(s) to whom power is to be wheeled:
  - i) Name of Consumer:
  - ii) Category:
  - iii) Contact Demand:
  - iv) Subdivision:
  - v) Supply Voltage:
  - vi) Quantum of power to be wheeled:
  - vii) Contact Details:
- 4) Metering Details:
  - i) At Generator End:
  - ii) At Consumer End:

**Validation:-**

I, undertake by the terms and conditions of Banking/Wheeling of power as set out in HERC RE Regulations, 2017 and the details mentioned above are true & correct.

(Signature of the Applicant)

**HARYANA ELECTRICITY REGULATORY COMMISSION**  
**BAYS NO. 33-36, SECTOR-4, PANCHKULA – 134112**  
**WWW.HERC.GOV.IN**  
**Email: herc-chd@nic-in**

Date of Order : 13.05.2019

**Regulation No. HERC/40/2018/2nd Amendment/2019:-** In exercise of the powers conferred on it by section 181 of the Electricity Act 2003 (Act 36 of 2003) and all other powers enabling it in this behalf, the Haryana Electricity Regulatory Commission makes the following regulations to partially amend the Haryana Electricity Regulatory Commission (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations, 2017, as under:-

**1. Short title, commencement, and interpretation.**

- (1) These Regulations may be called the Haryana Electricity Regulatory Commission (Terms and Conditions for determination of Tariff from Renewable Energy Sources, Renewable Purchase Obligation and Renewable Energy Certificate) Regulations (2nd Amendment), 2017.
- (2) These Regulations shall come into force w.e.f. the date of notification in the Haryana Government Gazettee.
- (3) These Regulations shall extend to whole of the State of Haryana.

**2. Amendment of Regulation 54**

The following shall replace Regulation 54 and shall be read as under:-

**54. Renewable Purchase Obligation –**

- (1) Every obligated entity including distribution licensee, consumers owning captive power plant and open access consumers including short term open access consumers in Haryana, shall purchase energy from renewable energy sources under the Renewable Purchase Obligation (RPO) as under:-

FY	Existing Total RPO (%) of Consumption		Revised Minimum RPO (%) of Total Consumption Excluding Hydro	
	Total RPO	Solar	Non Solar	Solar
2016-17	3.75	1.0	2.75	1.00
2017-18	4.00	1.25	2.75	2.50
2018-19	4.50	1.50	3.00	4.00

2019-20	4.75	2.00	3.00	5.50
2020-21	5.00	2.50	3.00	7.00
2021-22	5.50	3.00	3.00	8.00

- (2) Provided that solar renewable purchase obligation specified above shall be procured from generation based on solar energy sources only.
- (3) RPO for fossil fuel based Captive Power Plants (CPP) of 5 MW and above including Fossil fuel based co-generation captive plant of 5MW and above, shall be pegged at the RPO level applicable in the year in which CPP is commissioned. However, RPO of such plants commissioned up to 2018-19 shall be pegged at RPO applicable for the FY 2018-19. As and when the company add to the capacity of the CPP, it will have to provide for additional RPO as obligated in the year in which new capacity is commissioned.
- (4) The DISCOMs, while complying with the RPO, shall ensure trade-off between REC & purchase of RE Power and take financial prudent action accordingly.

Provided further, such obligation to purchase renewable energy shall be inclusive of the purchases, if any, from renewable energy sources already being made by obligated entity concerned.

Provided also that the power purchases under the power purchase agreements for the purchase of renewable energy sources already entered into by the distribution licensees and consented to by the Commission shall continue to be made till validity of the Power Purchase Agreement approved by the Commission, even if the total purchases under such agreements exceed the RPO as specified in these regulations.

Provided also that the issue of interchangeability of solar and non-solar RPO, if decided in favour at Central level, shall be applicable under these Regulations.

### 3. Amendment of Regulation 58

The following shall replace Regulation 58 and shall be read as under:-

**58. Banking of RE Power** –RE based captive generating plants in the State may bank power for captive/own use on payment of the banking charges along with the transmission and distribution losses (Technical loss) for availing the open access on the transmission or



distribution network of the licensees for banking and drawl of banked power from the Discoms after entering into the banking agreement with the concerned Discoms at the terms and condition specified in the agreement, as follows:

1. The RE power shall be allowed to be banked with the distribution licensee(s) subject to the condition that 5% of power banked in (kind) shall be deducted toward banking charges.
2. The Energy Banked shall be permitted to be carried forwarded from month to month. The banked power shall be utilized within the same financial year failing which the unutilized energy at the end of the financial year shall lapse, and no compensation whatsoever shall be claimed/ paid for such lapsed banked energy, provided the solar energy banked during the last quarter of the financial year shall be carried forward to the next financial year.
3. The banking shall be allowed throughout the year, however, the drawl of banked power shall not be allowed during the peak months (July to mid October).
4. The drawl of bank power shall also be not allowed during peak load hours as mentioned in the ToD tariff approved by the Commission.
5. The Banked Energy Shall be calculated at the end of a month as follows:-

Banked Energy at the end of month (E<sub>bi</sub>)= {E<sub>g</sub>(1-losses)-E<sub>c</sub>} \* (1-b) + E<sub>b</sub> (i-1)

\* E<sub>g</sub> = Energy Generation for the ith month

\* E<sub>c</sub> = Energy consumption for the ith month

\* E<sub>b</sub> (i-1) = Energy Banked at the end of previous month

\*b = Banking charges in kind.

Further, as far as scheduling and deviation mechanism is concerned, the Commission in the process of finalization of Regulations on forecasting, scheduling and settlement and once these Regulations are notified the same shall be applicable.

The RE power shall be adjusted as first charge in order of consumption of energy by a consumer. The banking will be counted on daily basis for the purpose of monthly account.

Settlement of wheeled energy at consumer End shall be in the following priority:

1. RE generation after deduction of losses.
2. Captive Power
3. Banked Energy
4. Open Access Power through Exchange
5. Discom power

4. Amendment of Regulation 59

The following clarification shall be inserted after Regulation 59:-

Transmission/Distribution Licensee shall bear the cost of Extra High Voltage (EHV)/ High Voltage (HV) transmission line up to a distance of 10 km and shared cost after 10KM, only in the case where the power is to be supplied to DISCOMs under approved PPA. RE Power producers installed by Independent Power Producers (IPP) for merchant sale or captive consumption, should bear the cost themselves.

It is further clarified that the terms & conditions for cost of evacuation of power in respect of PPA entered into by DISCOMs/HPPC with RE Power Producers under competitive bidding, shall be governed by the terms of such PPA.

5. Amendment of Regulation 60

The following shall replace Regulation 60 and shall be read as under:-

**60 (1)** Notwithstanding anything contained in any other Regulation(s) notified by the Commission, Wheeling and Transmission Charges will be exempted for the entire life of the project from the date of commissioning for all Captive Solar Power Projects which have submitted applications to Haryana Renewable Energy Development Agency (HAREDA) for registration of project, purchased land or have taken land on lease for thirty years and have bought equipment & machinery or invested at least Rs. one crore per Mega Watt for purchase of equipment & machinery for setting up of such Captive Solar Power Projects till 13th February, 2019, while cross subsidy surcharges and additional surcharges are not applicable for Captive Solar Power Projects as per provisions of HERC Regulations (Electricity Act 2003). For determining the investment of Rs. One crore per MW, payment for equipment should be made into the bank accounts of equipment supplier before 13th February, 2019 and proof of the same is to be submitted.

(2) No waiver of wheeling and transmission charges, cross subsidy surcharges and additional surcharges shall be given to solar/non solar power Projects set up by IPP/generators for third party sale.

(3) Against the waivers, Renewable Purchase Obligation (RPO) benefit will be provided to Power Utilities.

However, the losses, as determined by the Commission, shall be recovered in kind by the Haryana Power Utilities. Further, banking charges as per these

Regulations, shall be applicable so that the Haryana Power Utilities are not burdened un-reasonably.

6. Amendment of Regulation 64

The following clarification shall be inserted after Regulation 64 (a):-

a) In this regard, it is further clarified that the consumers shall be allowed to install Rooftop solar power plant irrespective of their sanctioned load. Such consumers shall be allowed to sell the power so generated to HPPC at their least discovered solar power procurement price of latest preceding financial year. However, benefit of net metering shall not be allowed to such consumers. DISCOMs shall allow grid connectivity to such consumers within 15 days from the date of application.

The following clauses shall be inserted after Regulation 64 (c):-

d) Solar power developers shall procure a Certificate from irrigation & water resources department/public health engineering department regarding availability/feasibility of installation of solar power plant on canal/river/reservoir/nallah/water works etc., before going ahead with the project. The prospective developer shall proceed in the matter with concurrence of the department concerned and HAREDA.

e) In order to promote Solar Power generation in Haryana along with battery storage, smart meter and smart grid, the licensees shall provide minimum incentive of Rs. 1/- unit for minimum period of 5 years. However, battery storage so installed should be of the minimum capacity equivalent to contract load. The incentive payable under these Regulations shall be reviewed by the Commission every year along with ARR/Tariff petition for that year and shall be made revenue neutral while issuing Order on the ARR/Tariff petition of the licensees.

Date: 13.05.2019 (Pravindra Singh Chauhan)  
Place: Panchkula Member

(Jagjeet Singh)  
Chairman