



## MP URJA VIKAS NIGAM LTD.

URJA BHAVAN, MAIN ROAD # 2, NEAR BUS-STOP# 5, BHOPAL-462016

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No: F/UVN/2024/KUSUM-C/V/5938

Dated: - 26/03/2025


**Sub: - Setting up of Grid connected Solar PV based Power Plants (SPP) under feeder solarization component of PM KUSUM - C Scheme for sale of power to MPPMCL – minutes of pre bid meeting- reg.**

**Ref: - 1. RFP No: F/UVN/2024/KUSUM-C/V/5183 Date: 11.02.2025.**

This has reference to above referred RFP for “Setting up of Grid connected Solar PV based Power Plants (SPP) under feeder solarization component of PM KUSUM - C Scheme for sale of power to MPPMCL”. About 90 potential stakeholders participated in pre-bid meeting on 3 March 2025 organized online. Bidders put queries during online pre-bid meeting and those were replied appropriately. Some of the bidders also have submitted their concerns and queries through e-mail.

Some major points of concerns and clarification are provided in **appendix-1** to this letter. Further, the full copies of updated RfP and PPA with detailed changes are uploaded in the portal (**appendix-2** to this letter). Bidders are advised to consider only latest version of RfP and PPA read with clarifications through this minutes of pre-bid meeting. Accordingly, previous version of RfP and PPA stand set aside.

These minutes shall be treated as part of the RFP and/or PPA, as relevant and appropriate.

  
(Ajay Shukla)  
Executive Engineer  
(MPUVNL)

## Appendix-1

1. **Applicability of indigenous component:** The RfP provides break up of Project Capacity as per applicability of CFA, non-CFA. Accordingly, the requirement of compliance to ALMM list and sourcing of indigenous components for respective portion of Project Capacity would be governed as per MNRE's Comprehensive Guidelines for Implementation of PM KUSUM Scheme, dated 17.01.2024, and its amendments/ modifications as relevant and applicable read with Office Memorandum of MNRE dated 09.12.2024.
2. **Provisions related to SCD:** Schedule Commissioning Date (SCD) for respective Project Capacity would be end date of NSCD or SSD, whichever is earlier. Whereas:
  - a. Normative Scheduled Commissioning Date (NSCD) shall mean a date falling on last day of eighteenth (18th) month from date of LoA.
  - b. Scheme Sunset Date (SSD) shall mean a date notified by Ministry of New and Renewable Energy Govt. of India (MNRE), when overall sanction timelines of Component- (FLS) of PM KUSUM Scheme would cease to exist, which, unless modified by MNRE, is 31.03.3026.

However, these timelines would be subjected to decision of MNRE on sunset period for existing PM KUSUM Scheme as may be notified in future.

3. **Requirement of minimum CUF:** Projects under this RfP have no ceiling of maximum or minimum CUF. Only for the purpose of demonstration of commissioning of Project Capacity, minimum generation (CUF) requirement would have to be fulfilled as per Article 5 of PPA.
4. **Alternate instruments for EMD and PBG:** In addition to financial instruments provided in the RfP for Bid Security or/ and Performance Bank Guarantee (PBG), following instruments would also be considered towards Bid Security or/ and PBG as applicable:
  - a. FDRs from commercial bank pledged in the name of MPUVNL.
  - b. Account Payee Demand Draft
  - c. Unconditional Insurance Surety Bond
5. **Payment of monthly bill or supplementary bill:** These timelines would be as per PPA. No change is being considered for now.
6. **Availability of government land:** This RfP is intended to be established on private land. No differentiation is provisioned in the RfP for government land.
7. **Bid for modified Project Capacity:** Bidder can not submit bid for modified Project Capacity for a Project. However, if the Project Capacity is changed by MPUVNL

after selection of Successful Bidder such Successful Bidder would be obliged to execute Project if the revised Project Capacity is within (+/-) 20% of one provided at Annexure-1 of RFP. Beyond that, the Successful Bidder would have choice to implement or not to implement concerned Project without any penal obligations. Change in Project Capacity in any other form is not allowed.

8. **Alternate financial eligibility criteria:** Bidders participating in developer mode are advised to note following key changes to establish financial eligibility criteria:

- a. Net-worth would be utilized towards financial eligibility as prescribed in RfP;
- b. Alternately, Minimum Average Annual Turnover (MAAT) of Bidder is allowed as per provisions of revised RFP.

However, in case Bidder submits both MAAT and net-worth details with the as per RFP, only one of those two, which makes Bidder financially eligible for maximum capacity, would be considered, not both.

9. **Financial statement for net-worth or turnover assessment:** For purpose of net-worth or MAAT assessment, only audited annual statement for applicable year(s) would be relied upon. Net-worth or MAAT would not be assessed on the basis of unaudited financial statement or any other form of certificate in lieu of it.

10. **Relaxation to MSME for bid security and tender fees:** MSMEs are exempted from paying MPUVNL's Bid Processing Cost and Bid Security but they will have to submit NSIC certificate valid at the time of Bid Deadline in order to avail this exemption.

11. **Financial bid format:** Bidders have to strictly follow financial bid format provided in online portal. In case of any discrepancy between format for financial bid provided at online portal and in the RFP, the format provided at online portal would prevail.

12. **Remote Monitoring System:** Bidders would make necessary arrangement as per protocols attached with RFP to integrate the projects with National / MPUVNL's remote monitoring portal.

13. **Key dates:** Except dates and stages passed by, remaining Key dates mentioned at Bid Information Sheet as well as at Cl. 2.7 of RFP stand revised as below:

S. No.	Nodal Agency Stage	Date	Time (Hrs.)
1.	Submission of further queries and suggestions from eligible bidders	01.04.2025	15:30
2.	Purchase of RFP End Date	22.04.2025	18:00
3.	Bid Submission End Date	22.04.2025	20:00
4.	Submission hard copy of required Bid documents	25.04.2025	17:00
5.	Technical Bid & Bid Security Opening Date	29.04.2025	11:00
6.	Financial Bid Opening Date	13.05.2025	16:00



**Madhya Pradesh Urja Vikas Nigam Limited**

**Invites Request for Proposal (RFP)**

**For**

**Selection of Renewable Power Generators (RPGs)**

**Through**

**Tender process**

**For**

**Setting up of Grid connected Solar PV based Power Plants (SPP)  
under feeder solarization component of PM KUSUM - C Scheme  
for sale of power to MPPMCL**

**RFP No: F/UVN/2024/KUSUM-C/V/ 5183**

**Date: 11.02.2025**

**Issued by: -**

**Madhya Pradesh Urja Vikas Nigam Limited (MPUVNL)**

Urja Bhawan Link Road No. 2, Shivaji Nagar, Bhopal – 462016

Telephone No.: +91-755-25756566, 2553595

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**Notice Inviting Tender**

**RFP No: F/UVN/2024/KUSUM-C/V/5183**

**Dated: 11.02.2025**

Madhya Pradesh Urja Vikas Nigam Limited, invites Bids from eligible Bidders to participate through this Request for Proposal (RFP) for Selection of Renewable Power Generators (RPGs) for Implementation of cumulative CFA equivalent capacity of approximate **1500 MW** of Grid Connected Solar PV Systems for Sale of Solar Power to MPPMCL under feeder solarization component of PM KUSUM-C at various locations in the state of Madhya Pradesh, India.

For the implementation of above mentioned work, Bidders should submit their bid and all requisite documents complete in all respects on or before **31.03.2025** up to 20:00 Hours online in <https://www.bharat-electronictender.com> and in the office of “Nodal Agency”, as required, in prescribed format. Bids received without the prescribed Bid Processing Fee shall be rejected. Also, every Bidder is required to mandatorily submit Bid Security in prescribed manner. In the event of any date indicated RFP is a declared Holiday, the next working day shall become operative for the respective purposes mentioned in RFP. Technical Bid will be opened on **07.04.2025** at 11:00 Hours online in the presence of authorized representatives of Bidders who wish to be present.

Bid documents which include eligibility criteria, technical specifications, various conditions of Agreement, formats, etc. can be viewed from Nodal Agency's website [www.mprenewable.nic.in](http://www.mprenewable.nic.in) and can be downloaded from <https://www.bharat-electronictender.com> for online submission.

EE  
(MPUVNL)

## **DISCLAIMER**

1. Though adequate care has been taken while preparing the RFP documents (inclusive of Formats, Agreement and Annexures, as applicable), the Bidder shall satisfy themselves that the documents are complete in all respects. Intimation of any discrepancy shall be given to this office immediately. If no intimation is received from prospective Bidder on or before pre-bid meeting date, it shall be considered that the RFP document is complete in all respects and has been carefully reviewed by concerned Bidder. Bidder shall be responsible to read all clauses of RFP in conjunction with PPA and formats attached to it (Part of RFP, in the form of Annexure).
2. Nodal Agency reserves the right to modify, amend or supplement RFP documents including all formats and annexure at any time before Bid submission deadline. Interested Bidders are advised to follow and keep track of Nodal Agency's website as well as designated e-tender portal for updated information. Nodal Agency is not obligated to send/ communicate separate notifications for such notices/ amendments/ clarification etc. in the print or electronic media or individually. Nodal Agency shall not be responsible and accountable for any consequences to any party, whatsoever.
3. While this RFP and associated bid process is carried out in good faith and adequate reasonableness, neither Nodal Agency nor their employees or advisors make any representation or warranty, expressed or implied, or accept any responsibility or liability, whatsoever, in respect of any statement or omissions herein, or the accuracy, completeness, procedural inadequacy or reliability of information and shall incur no liability under any law, statute, rules or regulations as to the accuracy, reliability or completeness of this RFP, even if any loss or damage is caused by any act or omission on their part.
4. The capitalized term or any other terms used in this RFP, unless as defined in RFP or repugnant to the context, shall have the same meaning as assigned to them by the Electricity Act, 2003 or Company Act, 1956/ 2013 or Indian Partnership Act, 1932 or Limited Liability Partnership Act, 2008 or Income Tax Act, 1961, Guidelines for implementation of PM KUSUM scheme, 17.01.2024 and applicable rules or regulations framed under these Acts/ Guidelines.

Request for Proposal for Grid Connected SPPs in Madhya Pradesh under feeder solarization component of PM KUSUM - C Scheme

**A. BID INFORMATION SHEET**

<b>Document Description</b>	Request for Proposal (RFP) for Selection of RPGs for Implementation of cumulative CFA equivalent capacity of approximate <b>1500 MW</b> Grid Connected Solar based power plants connected to selected 33/ 11 kV substation for Sale of Solar Power to MPPMCL at various locations in the state of MP under feeder solarization component of PM KUSUM-C
<b>RFP No. &amp; Date</b>	RFP No: F/UVN/2024/KUSUM-C/V/5183 Dated: 11.02.2025
<b>RFP Purchase Start Date</b>	17.02.2025 at 23:55 Hrs.
<b>RFP Purchase End Date</b>	31.03.2025 at 18:00
<b>Total Capacity</b>	Cumulative CFA equivalent capacity of approximate <b>1500 MW</b>
<b>Project or Project Capacity</b>	<p>As per demand assessed for all concerned agricultural feeders emanating from a particular sub-station, subject to maximum available capacity of concerned PTR at concerned sub-station. The Project or Project Capacity would be as provided at Annexure-1 of RFP.</p> <p><b><u>Important note:</u></b></p> <p>Bidder can not submit bid for modified Project Capacity for a Project. However,</p> <ol style="list-style-type: none"> <li>If the Project Capacity is changed by MPUVNL after selection of Successful Bidder such Successful Bidder would be obliged to execute Project if the revised Project Capacity is within (+/-) 20% of one provided at Annexure-1 of RFP. Beyond that, the Successful Bidder would have choice to make without any penal obligations</li> <li>Change in Project Capacity in any other form is not allowed.</li> </ol>
<b>Bid Size</b>	Bidder can place Bid for any number of sub-stations. There is no cap on total bid capacity by a Bidder
<b>Exclusivity</b>	A Bidder shall place only one bid for a substation/ Project i.e. all target feeders emanating from one substation shall be considered as one

	Project. Total Bid capacity (in MW) at one substation shall be considered as one Project.
<b>Selection of substation for SPPs under component-C of PM KUSUM scheme</b>	Substations to be considered for feeder solarization under component-C of PM KUSUM scheme as identified by concerned Discoms as per pre-defined criteria and are provided at Annexure-1 of the RFP.
<b>Duration of PPA</b>	25 years from Commercial Operation Date
<b>Maximum CUF</b>	Procurer, in any Contract Year, shall be obligated to purchase all energy generated by RPG as per provisions of PPA.
<b>Minimum CUF</b>	There is no requirement of minimum CUF to be achieved.
<b>Broad Scope</b>	Design, Engineering, Supply, construction, erection, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) in accordance with the applicable Law, the Grid Code, the terms and conditions of PPA and prudent utility practices for Sale of Solar Power to MPPMCL at the delivery point in each substation at various locations in the state of Madhya Pradesh, India.
<b>Subsidy from Govt. of India i.e. Central Financial Assistance (CFA)</b>	<p>Shall be governed by relevant and applicable Subsidy provisions of Govt. of India and its guidelines valid at the time of bid submission date.</p> <p>Details of it is provided at Cl. 3.42 of RFP and Cl. 9.2 of draft PPA attached with RFP.</p>
<b>Reactive Power Compensation</b>	Successful Bidders would come under reactive power compensation regime, which shall provide for incentive or disincentive for concerned Projects to support grid in reactive power management. It would be applicable at a rate and in manner as determined by MPERC from time to time.
<b>Selection Procedure</b>	The detailed procedure is given in the section IV of this RFP.
<b>Pre-bid Meeting</b>	The pre-bid meeting shall be hosted on an online platform on 24.02.2025 at 15:30 hours. Interested Bidders may nominate their representatives (up to a maximum of 2) to attend the same.

	<p>The Bidders should share the following participation details by 23.02.2025 at kusumc.mpuvn@gmail.com</p> <ul style="list-style-type: none"> <li>Name of the Bidder</li> <li>Name, Email, Contact No. of the Representative (s)</li> </ul> <p>Joining instructions shall be shared 24 hours before the Pre-Bid Meeting.</p>
<b>Last date &amp; Time of Submission of Bid submission (ONLINE only)</b>	31.03.2025 up to 20:00 hours
<b>Last date &amp; Time of Submission of required Bid documents in HARD copies</b>	03.04.2025 up to 17:00 hours
<b>Bid Opening (Technical)</b>	07.03.2025 at 11:00 hours
<b>Bid Opening (Financial)</b>	<p>17.04.2025 at 16:00 hours</p> <p>(Any modification in date, time and venue for Financial Bid opening shall be updated on websites. Bidders are advised to keep tracking of the same).</p>
<b>Bid Processing Fee (non- refundable)</b>	<p><b>MPUVNL's Bid Processing Cost:</b> INR 5,000/- (Rupees Five Thousand only) + GST (18%) i.e. INR 5,900/- per MW or a part thereof, which would be utilized at the stage of bid evaluation. The bid processing fees will be paid to MPUVNL in following account (through NEFT/RTGS) and proof of the same shall be mailed to MPUVNL as well as submitted with online bid:</p> <ol style="list-style-type: none"> <li>Account Holder Name: M. P. Urja Vikas Nigam Ltd.</li> <li>Bank Name: ICICI Bank Ltd.</li> <li>Bank Branch Address: Shivaji Nagar, Bhopal</li> <li>Account No.: 656501700049</li> <li>IFSC Code: ICIC0006565</li> <li>MICR Code: 462229012</li> </ol>

	<p>MSMEs are exempted from paying MPUVNL's Bid Processing Cost but they will have to submit NSIC certificate valid at the time of Bid Deadline in order to avail this exemption.</p> <p>Further, it may be noted that no exemption towards MPUVNL's Bid Processing Cost is allowed to Govt./ semi Govt./ PSUs.</p> <p>The e-tendering portal charges will be charged by the tendering portal directly as per following:</p> <ol style="list-style-type: none"> <li><b>E-Tender Portal Registration Fees:</b> During the registration process each bidder will have to pay the applicable ETS Registration-Fee of INR 3,000 + GST (18%). For already registered bidder on the portal, need not to re-pay registration fees for 1 year from date of their registration.</li> <li><b>Bid Participation Fee:</b> Bidder Participation Charges Per - INR 7,000/ per sealed bid + GST (18%)</li> </ol> <p>Charges towards the e-tender portal, are governed by the portal service provider, and shall be borne by the bidder.</p> <p>Further, it may also be noted that e-tendering fees to all type of organizations/ agencies, including MSMEs or any Govt./ semi Govt./ PSUs, would be as per requirement of e-tendering portal.</p>
<b>Bid Security</b>	It shall be provided by interested Bidders as per Cl. 3.24 of RFP.
<b>Performance Bank Guarantee ("PBG")</b>	It shall be provided by Successful Bidders in accordance with Cl. 4.7 of RFP.
<b>Update on this RFP</b>	Bidders are advised to keep track of the changes/ updates/ corrigendum regarding this RFP on <a href="https://www.bharat-electronictender.com">https:// www.bharat-electronictender.com</a> and <a href="http://www.mprenewable.nic.in">www.mprenewable.nic.in</a> (for reference only)
<b>Address for correspondence with nodal agency</b>	<p>To,</p> <p>Executive Engineer (KUSUM-C),</p> <p>Madhya Pradesh Urja Vikas Nigam Limited,</p> <p>"Urja Bhawan"</p> <p>Link Road No. 2, Shivaji Nagar, Bhopal – 462016</p> <p>Mobile No – 0755-2553595</p>

## **B. DEFINITIONS & ABBREVIATIONS**

In this “Bid / RFP Document” the following words and expression will have the meaning as herein defined where the context so admits:

**“Affiliate”** shall mean a Company / Limited Liability Partnership (LLP) Firm/ Partnership Firm/ Sole Proprietor that directly or indirectly

- i. controls, or
- ii. is controlled by, or
- iii. is under common control with

a Bidder or Member of a Consortium/ JV. Any bank or financial institution shall not be considered as Affiliate. Also, any organization/ entity/ institution where the President of India or Governor of a State are the ultimate owner but otherwise are separate organization/ entity/ institution from each other shall not be considered as Affiliate;

**“Appropriate Commission”** - Unless otherwise stated, Appropriate Commission shall be the commission of the state where DISCOM is situated; In this case, it shall mean Madhya Pradesh Electricity Regulatory Commission (MPERC);

**“Bid”** shall mean the Technical and Financial Proposal submitted by the Bidder along with all documents/ credentials/ attachments/ annexure etc., in response to this RFP, in accordance with the terms and conditions hereof;

**“Bidder(s)”** shall mean individual farmers/ Group of farmers/ Cooperatives/ Panchayats/ Farmer Producer Organizations (FPO)/ Water User associations (WUA)/ Government agricultural institute/ other agriculture related institutions participating under **Self Development Mode** or bidding Company/ Limited Liability Partnership (LLP) firm/ Partnership Firm/ Sole Proprietor or Consortium in any form of a Company/ LLP/ Partnership Firm/ Sole Proprietor submitting the Bid under **Developer Mode** and is hereinafter also called Renewable Power Generator (RPG). Any reference to the Bidder includes its successors, executors and permitted assigns as the context may require;

**“Bidding Consortium (Consortium) or Joint Venture (JV)”** shall refer to a group of bidding Company/ Limited Liability Partnership (LLP) firm/ Partnership Firm/ Sole Proprietor that has collectively made a Bid in response to RFP for the project. Consortium/ JV of a maximum of two entities/ members is allowed under this RFP.

**“Bid Deadline”** shall mean the last date and time for submission of Bid in response to this RFP as specified in Bid Information Sheet;



**“Bid Security”** shall mean Bid Security to be submitted by the Bidder along with the Bid as per provision of RfP;

**“B.I.S.”** shall mean specifications of Bureau of Indian Standards (BIS);

**“Bid Validity Period”** shall mean 180 days from the bid deadline. It may be extended further for a period of up to ninety (90) days with mutual consent of the nodal agency and bidder;

**“CEA”** shall mean Central Electricity Authority;

**“CERC”** shall mean Central Electricity Regulatory Commission

**“Chartered Accountant”** shall mean a person practicing in India or a firm whereof all the partners practicing in India as a Chartered Accountant(s) within the meaning of the Chartered Accountants Act, 1949;

**“Competent Authority”** shall mean Managing Director of Nodal Agency, himself and/ or a person or group of persons nominated by him for the mentioned purpose herein of this RFP;

**“Completion”** shall mean supply and erection/installation of the Project and demonstration of CUF as per provisions of the PPA;

**“Commissioning”** shall mean demonstration of successful operation of the Grid Connected Project in accordance with prevailing regulations;

**“Commercial Operation Date” or “COD”** shall mean the date on which the commissioning certificate is issued upon successful commissioning (as mentioned in Article 1 of PPA) of the project;

**“Company”** shall mean a body incorporated in India under the Companies Act, 1956 or Companies Act, 2013 including any amendment thereto;

**“Comprehensive Operation and Maintenance” or “Comprehensive O&M” or “O&M”** shall mean insurance, warranty, spare parts and operation & maintenance of Projects during the term of the PPA;

**“Control”** shall mean with respect to any Entity means more than 51% ownership, directly or indirectly, of such Person or the power to direct the management and policies of such Person by operation of law, contract or otherwise;

**“Day(s)”** shall mean a 24 (twenty-four) hour period beginning at 00:00 hours Indian Standard Time and ending at 23:59:59 hours Indian Standard Time;

**“Delivery point”** shall mean a point a point a provided in Annexure-1 of the RfP, where power is injected into grid at 33/11 kV substation and it shall be 11 kV bus bar at the 33/ 11

kV Sub-station, unless specified otherwise. Metering shall be done at this interconnection point where the power is injected into the 33/ 11 kV Sub-station. Depending upon Project Capacity, there could be multiple interconnection cum delivery points at PTR at same substation.

For interconnection with grid and metering, the RPG shall abide by the relevant and applicable regulations, Grid Code notified by the State Commission and Central Electricity Authority (Installation and Operation of Meters) Regulations, 2006 as amended and revised from time to time, or orders passed thereunder by the Appropriate Commission or CEA and relevant provision of PPA;

All costs and charges including but not limited to line losses and other charges as notified by the appropriate commission up to the point of interconnection (Delivery Point), if applicable, associated with the evacuation arrangement shall be borne by RPG.

“**DISCOM**” shall mean Madhya Pradesh Poorv Kshetra Vidyut Vitaran Company Ltd., Madhya Pradesh Paschim Kshetra Vidyut Vitran Company Ltd. and Madhya Pradesh Madhya Kshetra Vidyut Vitaran Company Ltd.

“**Effective Date**” shall means the date as defined in Article 1 of PPA;

“**Eligibility Criteria**” shall mean the Eligibility Criteria as set forth in this RFP;

“**Expiry Period**” Shall mean the date occurring twenty-five (25) years from the Commercial Operation Date subject to that the supply of power shall be limited for a period of 25 years from the COD unless extended by the Parties as per this Agreement;

“**Farmer**” for this RfP shall mean any legal person who owns Prescribed Land in Madhya Pradesh meant for general farming and allied activities, which will be used for setting up renewable energy plant near identified sub-stations (as per **Annexure 1** of RfP) for power injection under KUSUM – C (feeder solarization), and includes individual farmers/ group of farmers/ cooperatives/ panchayats/ Farmer Producer Organisations (FPO)/ Water User associations (WUA)/ Government agricultural institute or other agriculture related institutions;

“**Financial Bid**” shall mean online financial Bid, containing the Bidder’s quoted fixed tariff for the entire term of the PPA, with effect from the COD as per format given in the RFP;

“**Financially Qualified Bidder**” shall mean, for a Project, a Qualified Bidder who has quoted lowest tariff (L-1) for the Project.

“**First Operational Year**” shall mean the period commencing from the Commissioning and expiring at the end of the Calendar Month in which Project completes twelve (12) Months from the COD of PPA Capacity;

“**IEC**” shall mean specifications of International Electrotechnical Commission;

“**Inspecting Authority**” shall mean the authority designated by the Competent Authority for the said purpose;

“**kW**” shall mean Kilowatt;

“**kWh**” shall mean Kilowatt Hour;

“**Lead Member**” shall mean the member of Bidding Consortium/ Group of Farmer/ Cooperatives/ Panchayats/ Farmer Producer Organizations (FPO)/ Water User associations (WUA)/ Government agricultural institute or other agriculture related institutions, which is designated as leader by other members to represent them as Bidder for this RFP;

“**LOA**” shall mean Letter of Award issued by the MPUVN to the RPG;

“**MPERC**” shall mean Madhya Pradesh Electricity Regulatory Commission

“**MPPMCL / MP DISCOMs**” shall mean Madhya Pradesh Power Management company and Distribution companies

“**MNRE**” shall mean Ministry of New and Renewable Energy, Government of India;

“**Month(s)**” shall mean a period of 30 days from (and excluding) the date of the event, where applicable, else a calendar month;

“**MW**” shall mean Mega Watt;

“**MWp**” shall mean Mega Watt Peak;

“**Nodal Agency**” shall mean the Madhya Pradesh Urja Vikas Nigam Limited, (MPUVNL) Bhopal;

“**Nominal Voltage**” shall mean, 11,000 Volts in case Delivery Point is at LV side of 33/11 kV transformer and 33,000 Volts, in case Delivery Point is at HV side of 33/11 kV transformer;

“**Operational Year(s)**” the First Operational Year and thereafter each period of 12 (twelve) Months till the Expiry Date of PPA;

“**Paid-up Share Capital**” means the paid-up share capital as defined in Section 2 of the Company Act, 2013;

“**Power Purchase Agreement or PPA**” shall mean the agreement to be executed between RPG and the Procurer for the supply of Solar Power from the Project commissioned by the RPG to Procurer;

**“Prescribed Land”** shall mean 1 hectare per MW of land parcel for setting up of concerned Project(s) within 5 kilometre radius of concerned substation as provided at Annexure-1.

**“Procurer(s)”** shall mean the person or company or organization procuring solar power from the Power Producer at competitively determined tariff under the RFP i.e. MPPMCL;

**“Project(s)”** shall mean the Grid Connected Solar PV Project(s) [SPPs] corresponding to a concerned substation as provided at Annexure-1 of this RfP;

**“Project Capacity”** means the capacity of the individual Projects mentioned in this RfP and subsequent PPA;

**“Project Company”** shall mean Company incorporated by the Bidder/ RPG as per Indian Laws. However, in case Bidders participating under Farmer/self-development mode, a Project Company may be a Company or LLP or Partnership Firm or Sole Proprietor as per law;

**“Qualified Bidder(s)”** shall mean Bidder(s) who have submitted Bid(s) in compliance with this RfP and is/are qualified as per the Eligibility Criteria pursuant to this RFP who shall be eligible for opening of Financial Bid;

**“RFP”** shall mean Request for Proposal (RFP) / Bid document / Tender document and shall include formats and annexures in it;

**“Renewable Power Generator” or “RPG”** shall mean Bidder declared successful following due process in accordance with this RfP. Any reference to the RPG shall include its successors, executors and permitted assigns as the context may require;

**“Scheduled Commissioning Date” or “SCD”** shall mean as defined in Article 1 of PPA;

**“Statutory Auditor”** shall mean the auditor of a Company appointed under the provisions of the Companies Act, 1956 or Companies Act, 2013 or under the provisions of any other applicable governing law;

**“Successful Bidder(s)”** shall mean the RPG(s) selected by Nodal Agency pursuant to this RFP for implementation of Project as per the terms and condition of the RFP Documents, and to whom LOA has been issued;

**“Term of PPA”** shall have the meaning ascribed thereto in article 2 of PPA;

**“Year”** shall mean 365 Days or 366 Days in case of leap year when February is of 29 Days;

### **C. INTERPRETATIONS**

1. Words comprising the singular shall include the plural & vice versa.
2. Bidder shall mean sole bidding entity, lead bidding entity or members of consortium/ joint venture.
3. An applicable law shall be construed as reference to such applicable law including its amendments or re-enactments from time to time.
4. A time of day shall save as otherwise provided in any agreement or document be construed as a reference to Indian Standard Time.
5. Different parts of this contract are to be taken as mutually explanatory and supplementary to each other and, if there is any differentiation between or among the parts of this contract, they shall be interpreted in a harmonious manner so as to give effect to each part.
6. MD of MPUVNL will have authority to take appropriate decision in line with guidelines or directions of MNRE from time to time in matters pertaining to implementation of feeder solarization under KUSUM-C scheme.
7. MD of MPUVNL will have authority to interpret and take appropriate decision in matters pertaining to timelines or situations posing challenge in execution of awarded Projects for feeder solarization under KUSUM-C scheme in the State.

## **SECTION-I: INTRODUCTION**

### **1. INTRODUCTION:**

- 1.1 In reference to the KUSUM-C guidelines, Madhya Pradesh Urja Vikas Nigam Limited (MPUVN) on behalf of MPPMCL, hereby invites the Bids against the RFP from interested bidders for development of solar power plants (SPP) of different capacities to meet requirement of target feeders associated with substations provided in **Annexure 1** and as amended till Bid Deadline. Bids received for any substation not included in **Annexure 1** of RfP as amended shall not be considered for technical or financial evaluation. The power should be delivered at delivery point as defined in the RFP and subsequent PPA. The total capacity to be allotted under this RFP is cumulative CFA equivalent capacity of approximate **1500 MW** across various substations provided at Annexure-1 of RFP.
- 1.2 Such plants near sub-stations may be primarily developed by utilizing **private land**-cultivable land, pastureland, marshland, barren or uncultivable land. It shall be sole responsibility of RPG to identify private land necessary for Project and arrange the same at applicable risk and cost. However, following must be noted:
- a) **Bidders participating under Developer mode:** No land proof is required as condition for bid participation. But, necessary land will have to be arranged by such Bidders at their own risk and cost within appropriate time-frame after LoA/PPA, as relevant.
  - b) **Bidders participating under Self Development Mode:** At the time of bidding, bidder (under self-development mode) needs to own the Prescribed Land on which bidder (under self-development mode) is intending to set-up the solar power plant under KUSUM – C (feeder solarization) scheme. The bidder shall own the Prescribed Land at the time of bid submission to qualify under the self-development mode.

Bidder will have to submit the land ownership documents, on which setting-up of solar power plant is proposed as mentioned under the FORMAT S2 or D2: General Particular of Bidder [**Important note:** Land ownership proof shall be either of following updated certified documents- *khasara/khatauni, bhoo-adhikar pustika, naksa*, and/or land registry which suffice that land ownership in name of bidder is undisputed. An equivalent documentary evidence may also be considered subject to sole discretion of MPUVNL. However, at any stage during or after bidding, if land ownership status at the time of bidding is found disputed,

the participation or selection as RPG may be cancelled and/or appropriate legal actions may be initiated]. Within ninety (90) days of execution of PPA, the Successful Bidder needs to own/ lease complete piece of land required for the setting up the awarded capacity of solar plant under KUSUM – C (feeder solarization) scheme for injecting the power at selected sub-station, and the proof the same will be submitted to MPUVNL. Competent Authority may provide for another thirty (30) days period to allow Successful Bidder to arrange complete piece of land required for concerned Project(s).

Failing to submit the required land ownership documents with competent authority as per timelines in RFP/ PPA, Competent Authority will have right to cancel PPA/ selection of such bidders and take necessary action under laws of land, including forfeiture of bid security and/or blacklisting/ debar of such bidders to participate in any tender of MPUVNL.

- 1.3 For avoidance of any doubt, it is re-stated that the RPG (**selected under Self Development Mode or Developer Mode**) shall be solely responsible and make arrangements of necessary land for Project and associated infrastructure for development of the Project and for Connectivity with the concerned sub-station (as per Annexure-1 of RFP) for confirming the evacuation of power by the Scheduled Commissioning date or COD, whichever is earlier, and all clearances. The RPG will be responsible for Design, Supply, Construction, Erection, Testing and Commissioning, of Solar Power Project in accordance with the applicable Law, Grid Code, as per regulations and terms & conditions of the Agreement as well as Prudent Utility Practices.
- 1.4 RPG shall have option to get connectivity infrastructure from Project to substation developed by Discom by bearing appropriate expenses towards it.
- 1.5 It may be noted that BoQ estimates and specifications related to evacuation and connectivity infrastructure shall be approved by the concerned Discom.
- 1.6 The power generated from such SPP's shall be sold to MPPMCL on the tariff discovered for the RPG through process defined in this RfP and conditions as specified in the PPA document.
- 1.7 The Bidder is advised to read carefully all instructions and conditions of this RFP and understand the scope of work completely. All information and documents required as per the RFP must be furnished with the bid. Nodal Agency reserves the right to seek clarifications or additional submissions on submitted bids. Failure to provide the information and/ or documents as required shall render the Bid(s) unacceptable for

further evaluation and may lead to rejection of the bid(s) or award of work. All Bidders qualifying the technical stage shall be treated at par. Financial Bid of the Bidder(s) qualifying at technical stage only shall be opened.

- 1.8 Bidder shall be deemed to have examined the RFP, to have obtained information in all matters whatsoever that might affect carrying out of works in line with the scope of work specified in the RFP at the Bid price and to have satisfied himself of the sufficiency of his Bid. The Bidder shall be deemed to know the scope, nature and magnitude of the works and requirement of materials, equipment, tools and labour involved, wage structures and as to what all works Power Producer shall have to be complete in accordance with the RFP, irrespective of any defects, omissions or errors that may be found in RFP. It is assumed that Bidder has satisfied himself with the site conditions at the Premises of Procurer and has assessed the quantum of work required to comply with the RFP and PPA conditions.
- 1.9 Developers/ RPGs shall make themselves aware of MNRE guidelines for KUSUM-C (FLS) pertaining to quality control and system specifications, standards, indigenously manufactured components' requirement/ waiver, ALMM requirement/ waiver etc. valid and relevant at the time of bid submission deadline and factor in relevant aspects while bidding. Nodal Agency or its officers/ advisors/ staff/ consultants would not be accountable, liable or responsible for any implications on their bid or project implementation as well as O&M for project life.



## **SECTION-II: BID DETAILS**

### **2. BID DETAILS:**

- 2.1 The bidding process is for Implementation of cumulative CFA equivalent capacity of approximate 1500 MW capacity of Grid Connected Solar based power projects (SPPs) of different capacities under feeder solarization component of KUSUM-C for Sale of Solar Power to MPPMCL at various locations in the state of Madhya Pradesh at substations and Delivery Points provided at **Annexure-1** of RFP.
- 2.2 Eligible applicants are the Bidders as defined under this RFP. It shall be sole responsibility of RPG to arrange land for concerned SPP and associated infrastructure. Provision for government land is not envisaged under this RfP for any category of Bidders.
- 2.3 For setting up of a SPP, concerned RPG can arrange land near substations provided in **Annexure-1** and as amended from time to time.
- 2.4 The Bid of an applicant will also be disqualified if it is found that its owner/ proprietor/ partner/ director/ member or any of its affiliate has also filed application as/ for another Bidder/ RPG for the same sub-station.
- 2.5 Bidder/ RPG should ensure compliance to the MNRE's guidelines pertaining solarization of feeders under **KUSUM-C, dated 17.01.2024** and amended till date of **online bid submission**.
- 2.6 A list of substations along with the estimated project capacity has been attached as **Annexure 1** and as amended from time to time. The Bidders are advised to undertake their own due diligence before submitting of the Bid(s) as regards necessary Project Capacity, availability of bay/ space for bay at concerned substation, RoW issues, if any, pertaining to connectivity and associated sub-transmission lines and any other critical aspect that may have implications on implementation as well as O&M of concerned Project(s). MPUVNL or Procurer shall not be responsible or answerable in any manner for any matters related technical feasibility, implementation or O&M arising at any stage from Bid submission through life of concerned Project(s).
- 2.7 **Key Dates**

S. No.	Nodal Agency Stage	Date	Time (Hrs.)
1.	Date of issue of RFP	15.02.2025	

S. No.	Nodal Agency Stage	Date	Time (Hrs.)
2.	Purchase of RFP Start Date	17.02.2025	23:55
3.	Pre-Bid Meeting	24.02.2025	15:30
4.	Bid submission start date	05.03.2025	11:00
5.	Purchase of RFP End Date	31.03.2025	18:00
6.	Bid Submission End Date	31.03.2025	20:00
7.	Submission hard copy of required Bid documents	03.04.2025	17:00
8.	Technical Bid & Bid Security Opening Date	07.04.2025	11:00
9.	Financial Bid Opening Date	17.04.2025	16:00

## 2.8 Connectivity with the sub-station and delivery point:

- a) SPP may be connected at a Delivery Point as provided in Annexure-1. The selected RPG will be responsible for laying of dedicated evacuation line, getting ROW clearance from SPP to interconnecting sub-station, construction of bay and related switchgear at interconnecting sub-station where the plant is connected to the grid and metering is done at his own cost as per MPERC regulations/ applicable DISCOM utility practices/ CEA standards and relevant provisions of PPA. Alternatively, RPG can get the evacuation lines constructed through DISCOM by paying the applicable cost and other charges. RPG will be responsible for maintaining this dedicated evacuation line.
- b) It may be noted that BoQ estimates and specifications related to evacuation and connectivity infrastructure shall be as prescribed by concerned Discom/ MPPMCL for various combination of conductors, poles, bays etc. RPGs shall have to follow those prescriptions and no separate approvals would be required for BOQ or associated elements of evacuation infrastructure. A copy of the same in the form of standard operating procedure (SOP) is annexed with this RFP for reference (Annexure-3). The same would become a part of PPA as well. In case of any discrepancy, the information hosted on the website of the DISCOM shall prevail.
- c) The SOP provided at **Annexure-3** also contains various activities, compliances, timelines as well as roles and responsibilities of concerned stakeholders.
- d) In the event the bay and related switchgear is already available at the interconnecting substation then the associated cost as communicated by the DISCOM has to be reimbursed by the RPG(s) to the DISCOM at pre-determined rate notified by Discoms at the time of bid submission.

### **SECTION-III: INSTRUCTIONS TO THE BIDDER**

#### **3. INSTRUCTIONS TO THE BIDDER:**

- 3.1.** MP Discoms have assessed demand on feeders targeted to be solarized under KUSUM-C and those feeders are mapped against respective substations. A Bidder will have to bid substation-wise for total capacity envisaged for a substation.
- 3.2.** Substation wise estimated project capacities is listed in **Annexure-1** of in this tender. Bidders can place only one bid for one substation. However, a Bidder may submit bids for multiple substations. Bids received for any substation not included in **Annexure 1** of RfP, as amended, shall not be considered for technical or financial evaluation.
- 3.3.** Substation wise estimated project capacities is listed in **Annexure-1** of in this tender. However, if Successful Bidder/ RPG bring to notice of MPUVNL feasibility of a different capacity following methodology as per MNRE's guidelines for component-C of PM KUSUM scheme, MPUVNL may take a reasoned decision in the matter in discussion with Procurer.
- 3.4.** The Bidders are allowed to participate in this tender under two categories i.e. Self-Development Mode and Developer Mode.
  - a) **Self-Development Mode:** Under this mode bidders which belong to Individual farmers / group of farmers / cooperatives / panchayats / Farmer Producer Organisations (FPO)/Water User associations (WUA)/Government agricultural institute or other agriculture related institution are allowed to participate under this tender. No financial eligibility criteria are prescribed under RFP for Bidders participating under self-development mode. However, at the time of bidding, Bidder (under self-development mode) needs to own **Prescribed Land** on which bidder (under self-development mode) is intending to set-up the solar power plant under KUSUM – C (feeder solarization) scheme.

Bidder will also submit the land ownership documents, on which setting-up of solar power plant is proposed as mentioned under the FORMAT S2 or D2: General Particular of Bidder. **Within ninety (90) days of execution of PPA, the bidder needs to own/ lease the complete piece of land** which is required for

the setting up the awarded capacity of solar plant under KUSUM – C (feeder solarization) scheme for injecting the power at selected sub-station, and the proof the same will be submitted to MPUVNL. Competent Authority may provide for another thirty (30) days period to allow Successful Bidder to arrange complete piece of land required for concerned Project(s).

For bid participation or post-selection project implementation, land ownership proof shall be following updated certified documents-  *khasara/khatauni, bhoo-adhikar pustika, naksa*, and/or land registry which suffice that land ownership in name of bidder is undisputed. An equivalent documentary evidence may also be considered subject to sole discretion of MPUVNL. However, at any stage during or after bidding, if land ownership status at the time of bidding is found disputed, the participation or selection as RPG may be cancelled and/or appropriate legal actions may be initiated.

Failing to submit the required land ownership documents with Competent Authority, will have right to cancel PPA/ selection of such bidders and take necessary action under laws of land, including forfeiture of bid security and/or blacklisting/ debar of such bidders to participate in any tender of MPUVNL.

- b) **Developer mode:** The Bidders are allowed to participate in this tender as individual entity (Company/ LLP/ Partnership/ Sole Proprietor) or as Bidding Consortium/ Joint Venture of said entities. The bidding entities should be a body corporate incorporated in India under the Companies Act, 1956 / 2013 including any amendment thereto or a Partnership Firm having executed partnership deed and registered as per sections 58 & 59 of the Partnership Act, 1932, as amended or a Limited Liability Partnership Firm (LLP) registered under section 12 of Limited Liability Partnership Act, 2008, as amended or registered Sole Proprietor.

- 3.5.** A Bidder is required to quote one tariff for total SPP capacity associated with all target agricultural feeders on a sub-station. Bidders bidding for multiple sub-stations shall quote tariff separately for SPP on respective sub-stations.

**3.6.**

- 3.7.** A Bidder shall not have a conflict of interest. Bidder(s) shall be disqualified in the SPP(s) where it has conflict of interest. In a particular SPP, the Bidder may be considered to have conflict of interest with one or more parties in this bidding process, if:

- a) A Bidder submits more than one Bid for a substation in the bidding process, either individually [including bid submitted as authorised representative on behalf of one or more Bidder(s)] or as Member of consortium/ Joint Venture.
- b) They have a relationship with each other, directly or through common third parties/ Affiliates, that puts them in position to have access to information about or influence on the Bid of another Bidder or influence the decisions of Nodal Agency regarding this bidding process.

**3.8.** Except as required by Competent Authority, Nodal Agency have rights to annul/ cancel the Bid of Bidders who will take any assistance or support in any form from any of the independent consultant or consulting agency who is directly associated with Nodal Agency during preparation/ submission of RFP, PPA or work execution.

**3.9.** Instruction to Bidders on E-Tendering

- a) For participation in e-tendering module, it is mandatory for Bidders to get registration on website <https://www.bharat-electronictender.com>. Therefore, it is advised to all Bidders to get registered at the E-Procurement portal at the earliest.
- b) Tender documents can be downloaded from website <https://www.bharat-electronictender.com>.
- c) Service and gateway charges shall be borne by the Bidders.
- d) Upon enrolment, the Bidders will be required to register their valid Digital Signature Certificate (DSC) of appropriate class as specified for the E-Procurement system (in the name of person who will sign the proposal) in the form of smart card/ e-token, from any of the licensed Certifying Authority recognized by CCA India (e.g. Sify/ nCode/ eMudhra, etc).
- e) For further information regarding issue of Digital Signature Certificate, the Bidders are requested to visit website <https://www.bharat-electronictender.com>. Please note that it may take up to 3 to 5 working Days for issue of Digital Signature Certificate. Nodal Agency will not be responsible for delay in issue of Digital Signature Certificate.
- f) The Browser should be Java enabled. Java Runtime Environment (JRE) should be installed in the client system. This can be downloaded from the download links of the eProcurement System.
- g) If Bidder is participating for the first time in e- tendering, then it is advised to fulfil all formalities, such as registration, obtaining Digital Signature Certificate, etc. well

in advance.

- h) Bidders are requested to regularly visit the website of MPUVNL and e-tendering portal for any clarification, amendments and / or extension of due date.
- i) Bidder must positively complete online e-tendering procedure at <https://www.bharat-electronictender.com>.
- j) Nodal Agency shall not be responsible in any way for delay / difficulties / inaccessibility of the downloading facility from the website for any reason whatever.
- k) Whosoever on behalf of the Bidder is submitting the tender by his Digital Signature Certificate, shall invariably upload the scanned copy of the authority letter, as well as submit the copy of the same in physical form with the offer of particular Bid.
- l) All Bidders are required to pay bid security as prescribed in this RFP and a copy of the same should be uploaded online by Bidders, as applicable.
- m) After the final submission of bid, Bidder should ensure that he has received the acknowledgment slip and should keep this slip until opening of the Bid. If acknowledgment slip is not generated, it means the Bid is not submitted.
- n) During submission of bid through e-tender portal, Bidder needs to encrypt their technical and financial bid through two separate pass-phrases. A pass-phrase should be of minimum 11 characters containing at least two spaces. Pass-phrases for financial and technical bid should be different.  
  
Both pass-phrases are to be submitted online/ offline to MPUVNL in separate envelope (Writing - Technical Pass Phrase & Financial Pass Phrase) along with other required offline submissions, before the bid submission deadline.  
[EXAMPLES OF A PASS PHASE- "abc 375 spd" OR "I love India" OR "God is great"].
- o) It is important to note, same pass-phrase should be submitted through online/ offline by the bidder to MPUVNL, as it is required to decrypt the bids. MPUVNL shall not be held liable, in case there is any discrepancy, between the pass-phrases used in encrypting of bids and the submitted in hard copy.

- 3.10.** The Bidders shall have to submit their Financial Bid and Technical Bid/ other required relevant documents/ certificates, if any, online only (duly encrypted bids) as per time schedule (Key dates) as mentioned in Clause 2.7. Only desired Technical Bid

documents as prescribed in RfP shall be submitted in hard copies (original copy or print copy, as applicable) to reach to the office undersigned by the Key Dates.

**3.11.** For any type of clarification, Bidders can visit [https:// / www.bharat-electronictender.com](https://www.bharat-electronictender.com) and can call at help desk contact no. From Monday to Friday between 10:00 AM and 6:00 PM (except Government Holidays). ETS Support Email Id is [support@isn-ets.com](mailto:support@isn-ets.com). Customer Support Escalation Mobile No. is +91-8287663763. All these contacts are given on the Portal also.

**3.12.** Bidders are advised to contact following for more information related to RFP or e-tendering process:

- a) **For RfP related queries: MP Urja Vikas Nigam Officers:** Executive Engineer – 0755-2553595; Assistant Engineer – 8839464361
- b) **Bharat Electronic Tender for E - Tendering process:** Mr Rakesh Ranjan – 8789029238 / 9717038132

**3.13.** Bidder (s) may opt for training directly from the tendering portal at their own cost.

### **3.14. ELIGIBILITY CRITERIA**

#### **3.14.1. GENERAL**

##### **A. Eligible Bidders participating in Self Development Mode:**

Eligible Bidders [hereinafter called Renewable Power Generator (RPG)] for participation under Self Development Mode could be- individual farmers, Group of farmers, Cooperatives, Panchayats, Farmer Producer Organizations (FPO), Water User associations (WUA), Government agricultural institute or other agriculture related institutions.

No financial eligibility criteria are prescribed under RFP for Bidders participating under self-development mode. However, at the time of bidding, bidder (under self-development mode) needs to own the Prescribed Land on which bidder (under self-development mode) is intended to set-up the solar power plant under KUSUM – C (feeder solarization) scheme.

##### **B. Eligible Bidders participating in Developer Mode:** Following could be Bidders eligible to participate under Developer Mode:

- a) Bidder should be a body corporate incorporated in India under the



Companies Act, 1956 or 2013 including any amendment thereto or a Partnership Firm having executed partnership deed and registered as per sections 58 & 59 of the Partnership Act, 1932, as amended or a Limited Liability Partnership Firm (LLP) registered under section 12 of Limited Liability Partnership Act, 2008, as amended or registered Sole Proprietor. A copy of certificate of incorporation, partnership deed or LLP/ Sole Proprietor registration, as applicable and relevant, shall be enclosed with FORMAT D2: General Particulars of Bidder;

- b) Bidder can form a Bidding Consortium/ Joint Venture of two (2) Companies or LLPs or Partnership Firms or any combination thereof;
- c) Bidder or members of Bidder (in case of Consortium/ JV), should meet net-worth or MAAT criteria required under the RfP.

**3.14.2.** Not used.

**3.14.3.** Bidder or any member of Consortium/ Joint Venture and their Affiliates having been blacklisted or debarred as on bid submission date by Nodal Agency or by any Govt./ PSU, for whatever reasons, shall not be eligible/allowed to participate in this RFP.

**3.14.4.** Bidders may note following:

- A. **Self-development mode:** Bidders participating under self- development mode, will have one authorized signatory/ representative for the purpose of RFP and subsequent award of works, if any.
- B. **Developer mode:** Bidders may note following:
  - a) There shall be one authorized signatory for Bid and shall substantially be in the form set out FORMAT D5: Power of Attorney. In case sole proprietor firm as Bidder, no power of attorney would be required if authorized signatory is proprietor of such firm.
  - b) The Members of the Consortium/ JV shall nominate a Lead Member. Such nomination shall be supported by a power of attorney signed by all the Members of Consortium/ JV (and duly acknowledged by the Lead Member) and shall substantially be in the form set out FORMAT D5: Power of Attorney.
  - c) The Lead Member shall have the authority to represent all the Members of the Consortium/ JV during the Bid Process.
  - d) In a situation, where a consortium/ JV that is selected as a Successful Bidder, decides not to form a Project Company, the Lead Member would be



responsible for all the correspondence and documentation.

- e) In case Bidder is a Consortium/ joint venture, an agreement as per FORMAT D9: Format for Consortium Agreement shall be required to be furnished along with the Bid.
- f) A Bidder, as sole bidder, shall not be allowed to reduce its equity for at least first operational year from COD (equity lock-in period, as applicable to such specific cases).
- g) In-case members/ Lead Member of Consortium/ Joint Venture has referred its Affiliate to meet the Financial Eligibility criteria, then the same relationship with the Affiliate by the Bidder shall continue at least for the period of First Operational Year (equity lock-in period, as applicable to such specific cases). Further, affiliate of lead member or member of consortium/ JV shall furnish the details, as sought in FORMAT D1: Covering Letter and FORMAT D6: Financial Eligibility Criteria Requirement.
- h) If Bidder, as consortium/ JV, is meeting financial eligibility jointly through its members, members of such consortium/ joint venture shall not be allowed to reduce their equities in respective entities for at least first operational year from COD (equity lock-in period, as applicable in this specific case).

### **3.14.5. FINANCIAL ELIGIBILITY CRITERIA:**

- 1. Self-development mode** - For Bidders participating and submitting bid under this mode (i.e. Individual farmers or Group of farmers or Cooperatives or panchayats or Farmer Producer Organizations (FPO) or Water User associations (WUA) or Government agricultural institute or other agriculture related institutions), no financial eligibility requirement is prescribed under this RFP.
- 2. Developer Mode:** Following financial eligibility criteria (net-worth or MAAT) would be evaluated for Bidder based on audited annual financial statements. Bidders participating as consortium/ joint venture, as per RfP, can meet financial eligibility criteria jointly or individually through its members. However, such Bidder (participating as Consortium/ JV) shall not be allowed to reduce their equities in respective entities for at least first operational year from COD (equity lock-in period, as applicable in this specific case):
  - a) Net-worth of the Bidder (in case of sole bidder) or members of Consortium/ JV (in case of bidder as Consortium/ JV), should be INR 1 crore per MW based

on latest available audited financial statement i.e. FY24 or FY25. Net-worth will be calculated as follows:

Sr No	Particulars	Amount
1.	Paid Share Capital in case of Companies/ Partnership Capital in case of Partnership Firm /Proprietors' Capital in case of Proprietorship firm	
2.	Add: Reserve created out of profits	
3.	Add: Security Premium Account in case of Companies	
4.	Add: Credit Balance of Profit and Loss Account	
5.	Add: Credit Balance of Deferred Tax Assets in case of Companies	
6.	Total	
7.	Less: Aggregate value of accumulated losses	
8.	Less: Debit Balance of Profit and Loss Account	
9.	Less: Deferred Expenditure and Miscellaneous Expenditure not written-off	
10.	Less: Reserves created out of revaluation of assets, write-back of depreciation and amalgamation	
11.	Less: Debit Balance of Deferred Tax Assets in case of Companies	
12.	Net Worth	

- b) Bidder (in case of sole bidder) or members of Consortium/ JV (in case of bidder as Consortium/ JV), should have enough liquidity to manage the fund requirements for the Project, which shall be assessed through minimum average annual turnover (MAAT) of any of two (2) financial years among FY22, FY23 and FY24 or FY23, FY24 and FY25 to be at least INR 2.00 Crore per MW for the capacity applied for each.

Turnover means the gross amount of revenue recognised in the profit and loss account from the sale, supply or distribution of goods or an account of services rendered or both by a company/ partnership firm/ proprietorship firm during a financial year, but it does not include non-operational income.

**Note:**

1. The Bidder should be eligible to apply for the substation that they are bidding in
2. Bidder(s) would have choice to participate against any number of substations, subject to fulfilling net-worth or MAAT criterion for the substation

*which has the maximum Project Capacity amongst the substations Bidder has bid for. If they are Successful Bidder for multiple substations, the eligibility criterion requirement shall add up.*

*Illustration- considering above requirement of net-worth or MAAT:*

- (a) If Bidder has a net-worth of INR 2 crore, Bidder would be eligible to bid for a substation with Project Capacity of less than or equal to 2 MW. Any bid submitted for a Project Capacity greater than 2 MW would not be considered a valid bid for that substation. Similarly, if Bidder has MAAT of INR 4 crore, Bidder would be eligible to bid for a substation with Project Capacity of less than or equal to 2 MW. Any bid submitted for a Project Capacity greater than 2 MW would not be considered a valid bid for that substation.*
- (b) A Bidder with net-worth of INR 4 crore would be eligible to bid for any number of substations subject to Project Capacity(ies) being limited to less than or equal to 4 MW. However, at the time of project award, the final allotment would be done, as per process laid down in Section IV, to a maximum capacity of 4 MW. Similarly, a Bidder with MAAT of INR 8 crore would be eligible to bid for any number of substations subject to Project Capacity(ies) being limited to less than or equal to 4 MW. However, at the time of project award, the final allotment would be done, as per process laid down in Section IV, to a maximum capacity of 4 MW.*

**3.14.6.** For all types of Bidders (Companies/ LLPs/ Partnership/ sole proprietor), computation of net worth shall be based on latest consolidated/ unconsolidated audited annual accounts of FY24 or FY25, as applicable.

**3.14.7.** For all types of Bidders (Companies/ LLPs/ Partnership/ sole proprietor), computation of MAAT shall be based on consolidated/ unconsolidated audited annual accounts of any two (2) financial years among FY22, FY23 and FY24 or FY23, FY24 and FY25, for which latest FY consolidated/ unconsolidated audited annual statements are available.

**3.14.8.** In relation to a Partnership Firm/ Limited Liability Partnership Firm, the Net-worth shall be equal to Partner's Capital in case of a Partnership Firm/Limited Liability Partnership Firm and Proprietor's Capital Account in case of Sole Proprietor (including any reserves). The net-worth shown should not be earlier than FY24.

**Note:**

1. For the purpose of evaluation of Bidder, a certificate from Chartered Accountant (CA) clearly mentioning the UDIN number etc., in support of Bidder's claim for meeting the financial eligibility criteria shall be mandatorily submitted online (FORMAT D6: Financial Eligibility Criteria Requirement). Such certificate shall clearly undertake that calculation of net-worth or MAAT, as applicable, has been done in accordance with methodology prescribed in this RFP.
2. For the purposes of meeting financial requirements, only latest unconsolidated audited annual accounts shall be used as prescribed in this RfP. However, audited consolidated annual accounts of the Bidder may be used for the purpose of financial requirements provided the Bidder has at least twenty six percent (26%) equity in each company whose accounts are merged in the audited consolidated accounts.

**3.15. CHECK-LIST:**

To ensure that the online and only minimum required hard copy submission of RFP is complete in all respects, check-lists are required to be duly tick marked/filled for the enclosures which are attached with the RFP document. The requisite documents required for application, are indicated in the check-list. It is essential for the Bidders to submit check-list duly sealed and signed with Bid. However, check-list given in RfP is indicative, and Bidder shall be responsible for meeting and submitting all information requirement as per provisions of this RFP.

**3.16. INCORPORATION OF A PROJECT COMPANY BY BIDDERS:**

- a) In case a Bidder is selected as a Successful Bidder, it can choose to incorporate a Project Company/ SPV. In case a Bidder is a consortium/ JV, it would be mandatory to incorporate a Project Company to sign the PPA. The said Project Company has to be formed within sixty (60) days from the issuance of LOA. Further, Bidder/ RPG shall be responsible to get all required clearances in the name of the Project Company, and transfer already obtained clearances, if any.
- b) Except in case of a Bidder being a listed company, the aggregate equity shareholding of the Successful Bidder in the issued and paid up share capital, and the voting rights of the Project Company shall not be less than fifty one percent (51%) up to a period of one (1) year as calculated from Commercial Operation Date of concerned Project.

- c) Further, any member of the consortium/ JV or Partner in a Partnership firm or an LLP, shall maintain individual equity in newly formed Company of, at least, 51% of its share in the bidding consortium/ JV or in the partnership deed, as the case may be, submitted along with the Bid, up to a period of one (1) year as calculated from Commercial Operation Date of concerned Project.
- d) The Affiliate of a Successful Bidder or in case of a Consortium/ JV, its member, whose financial credentials have been relied upon by the Successful Bidder to demonstrate Financial Eligibility, is also permitted to execute the PPA by itself or by forming an SPV, as the case may be. In such cases, all the obligations and liabilities of the Successful Bidder as set out in the Bid Documents shall apply to the Affiliate.
- e) Except in case of a Bidder being a listed company, in the event that the Successful Bidder, which is a single Entity, chooses not to incorporate any Project Company, then the shareholders of the Successful Bidder, as on the date of submission of the Bid, shall not decrease their ownership below 51% until the expiry of a period of 1 (one) year from the COD. If the successful bidder forms a Project Company (SPV), the shareholders of the Successful Bidder, as on the date of submission of the Bid, shall continue to hold up to 51% of the total ownership of the Project Company (SPV), from the date of incorporation of SPV until the expiry of 1 (one) year from Project Commissioning (COD).
- f) Except in case of a Bidder being a listed company, any change in ownership and liabilities shall be in accordance with Article 15 of the PPA.

**Special note:**

Though Partnership firms are allowed to participate in RfP, it is understood that Partnership firms are not eligible to form SPV or Project Company as per Indian laws. Concerned entities/ firms are advised to take prudent decision after their own due diligence in the matter. MPUVNL or its officers and advisors shall not be responsible for any thing in this matter

### **3.17. BID SUBMISSION BY THE BIDDER:**

- a) The information and/ or documents shall be submitted by the Bidder as per the formats specified in this document.
- b) Bid(s) that are incomplete in any respect or those that are not consistent with the requirements as specified in this RFP or those that do not adhere to formats prescribed herein, wherever specified, may be considered non-responsive. However, Nodal Agency reserves the right to seek additional information/ clarifications/ documents from the Bidders, if found necessary, during the course of evaluation/ processing of the Bid(s). A period of seven days would be given for submitting such additional information/ clarifications/documents. Such additional information/ clarifications/documents would be considered a part of the bid. Non-submission or delayed submission of such additional information or clarifications sought by Nodal Agency may be a ground for rejecting the Bid(s).

**Important note:** Additional information/ clarification is limited to fact/ data/ document which are either historical in nature and existed before Bid Deadlines.

- c) Each format has to be duly signed and stamped (if applicable) by the authorized signatory of the Bidder. In case of a Consortium/ Join Venture, it has to be signed by authorized representative of the Lead Bidder. Strict adherence to the documents required to be submitted as per clause 3.19 shall be ensured, failure on this account may lead to rejection of Bid.
- d) As relevant and eminently necessary, not compulsorily, Nodal Agency may seek documentary evidence in support of meeting eligibility criteria as indicated in this RFP to the satisfaction of Nodal Agency and the Bidder shall furnish the same in prescribed timelines, failing which Nodal Agency shall not be answerable or accountable for any consequential impact on Bidder or Bid.
- e) As relevant, Bidder/ Bidding Company/ Consortium/ Joint Venture should designate one person to represent the Bidding Company in its dealings with Nodal Agency. The person should be authorized to perform all tasks including, but not limited to providing information, responding to enquires, signing of Bid etc. The Bidder should submit, along with Bid, a Power of Attorney in original as per FORMAT D5: Power of Attorney for authorizing the signatory of the Bid.

### **3.18. CLARIFICATIONS AND PRE-BID MEETING:**

- a) The Bidder may seek clarifications or request amendments to RFP in writing, through e-mail to reach Nodal Agency on or before date and time mentioned in

Bid Information Sheet.

- b) The Bidder(s) or their authorized representative(s) is / are invited to attend (physical or VC as may be applicable) pre-bid meeting(s), which will take place on date(s) as specified in Bid information Sheet, or any such other date as notified by Nodal Agency.
- c) The purpose of the pre-bid meeting will be to clarify any issues regarding the RfP including in particular, issues raised in writing and submitted by the Bidder.
- d) Nodal Agency is not under any obligation to entertain/ respond to suggestions made or to incorporate modifications sought for.

**3.19. BID DOCUMENTS:**

Bidder needs to mandatorily submit scanned copies of all formats along with necessary support documents (if applicable) ONLY on the e-tendering portal ([https:// www.bharat-electronictender.com](https://www.bharat-electronictender.com)).

However, documents/ formats/ agreements required on stamp paper, Bid Security (if in the form of Bank Guarantee) and such other documents/ formats as may be required under this RFP shall be submitted in original hard copies to MPUVNL as per key dates.

Further, Bidder to note that Financial Bid shall be submitted ONLY through online portal. Any deviation from this shall lead to cancellation of Bid submitted by concerned Bidder.

Bidders shall have to submit following documents:

- i. **ONLINE submission by Bidders participating in Developer Mode:** Scanned copies or proof thereof of the following documents have to be MANDATORILY uploaded on the e-tendering portal:
  - 1. FORMAT D1: Covering Letter
  - 2. FORMAT D2: General Particulars of the Bidder, General particulars of Bidder, including Certificate of Incorporation of Bidder/ Affiliate as applicable.
  - 3. FORMAT D3: Shareholding certificate for company / partner contribution



in a partnership firm (as applicable), bidder's composition and ownership structure as per prescribed in shareholding certificate for a Company/ Partner contribution for an LLP certified by Director/ practicing Chartered Accountant/ Company Secretary and authorised signatory of the Bidder (as applicable).

4. FORMAT D4: Bid Security, if applicable in the form of bank guarantee.
5. FORMAT D5: Power of Attorney, Original power of attorney (on the stamp value of Rs.1,000/-, as per, as applicable) issued by the Bidder (in case of consortium/ JV then by lead consortium/ JV member) in favour of the authorized person signing the Bid, in the form prescribed in this RFP (Power of Attorney must be supplemented by Board Resolution to above effect for the company incorporated under Company Act 1956 or Company Act-2013 OR Partnership Deed/ Agreement or such other equivalent documents).
6. FORMAT D6: Financial Eligibility Criteria Requirement.
7. FORMAT D7: Format for certificate of relationship of affiliate with the bidder, if applicable, supported by Board Resolution of the Affiliate.
8. FORMAT D8: Undertaking Form, if applicable Undertaking(s) from the member of Consortium or Affiliate of Bidder/ Affiliate of lead member of Consortium, as applicable.
9. FORMAT D9: Format for Consortium/JV Agreement for Participation in for Consortium/ JV Agreement, if applicable.
10. FORMAT D10: Power of attorney in favour of lead member of the consortium/ JV.
11. FORMAT D11: Declaration (for submission of Bid and acceptance of terms and conditions of RFP).
12. FORMAT D12: Deleted
13. Proof of bid processing fee submission.

ii. **OFFLINE submission of original documents by Bidders participating in**

**Developer Mode:** Original hard copies of the following documents have to be submitted to MPUVNL as per key dates for reference and records:

1. FORMAT D4: Bid Security, if applicable in the form of bank guarantee
2. Pass-phrases for decrypting Technical Bid and Financial Bid should be



submitted e-mail by the bidder to MPUVNL.

iii. **ONLINE submission by Bidders participating in Self Development Mode:**

Scanned copies or proof thereof of the following documents have to be MANDATORILY uploaded on the e-tendering portal:

1. FORMAT S1: Covering Letter
2. FORMAT S2: General Particulars of the Bidder, General particulars of Bidder, including Certificate of Incorporation of Bidder/ Affiliate as applicable.
3. FORMAT S3: Unconditional acceptance of RFP terms and conditions
4. FORMAT S4: Undertaking for participation under Self-Development-Mode
5. FORMAT S5: Bid Security, if applicable in the form of bank guarantee;
6. FORMAT S6: Declaration, to be stamped on non – judicial stamp paper of minimum INR 1000 value;
7. FORMAT S7: Power of Attorney for authorized representative to be stamped on non – judicial stamp paper of minimum INR 1000 value, if applicable;
8. FORMAT S8: Joint Bidding Agreement to be stamped on non – judicial stamp paper of minimum INR 1000 value, if applicable;
9. FORMAT S9: Power of attorney in favour of lead member of the joint bidding to be stamped on non – judicial stamp paper of minimum INR 1000 value, if applicable;
10. Proof of bid processing fee submission.

iv. **OFFLINE submission of original documents by Bidders participating in Self Development Mode:** Original hard copies of the following documents have to be submitted to MPUVNL as per key dates:

1. FORMAT S5: Bid Security, if applicable in the form of bank guarantee;
2. Pass-phrases for decrypting Technical Bid and Financial Bid should be submitted e-mail by the bidder to MPUVNL.

v. Hard or scan (soft) copy of RfP document and its amendments and corrigenda are **NOT REQUIRED** to be submitted online or offline.

### 3.20. METHOD OF BID SUBMISSION

- a) Except for the hard copy submission to MPUVNL as required under the RfP, **bidders are required to mandatorily submit technical bid**, along with all relevant documents as detailed in Clause 3.19 above, **online at e-tendering portal**.
- b) **Financial Bid** shall be submitted **only through online mode** with due encryption through passphrase. ONLINE BID PORTAL SHALL ALERT A BIDDER TWO (2) TIMES TO CHECK IF HE HAS SUBMITTED ONLINE FINANCIAL BID. Failure to submit correct online financial bid shall be sole responsibility of Bidder.
- c) For hard copy submission, the Bidder has the option of sending necessary documents either by registered post or by speed post or by hand delivery, so as to reach Nodal Agency by deadlines as per key dates. Nodal Agency shall not be responsible for any delay in receipt of the required hard copies of documents as prescribed under this RfP. It should be noted that except online Financial Bid, no other envelope/document should contain any information/document relating to Financial Bid. Nodal Agency shall not be responsible for premature opening of the Financial Bid in case of non-compliance of above. In such non-compliances, Competent Authority may reject bid of such Bidders at any stage without any liability on Nodal Agency or its advisors.
- d) **In case of hard copy submission (as applicable):** Hard copies required to be submitted under this RfP should be submitted in appropriate manner duly signed by same authorized signatory, as applicable. Further, any officially published/ historical document submitted with the Bid may be signed by the authorized signatory, if applicable.
- e) **In case of online bid submission:** In terms of Section 3 and 3A of chapter-II and Section 4, 5 and 6 of chapter-III of the Information Technology Act, 2000, as amended, digitally signed documents shall be treated equivalent to affixing hand written signature of authorized signatory of the Bidder. Such documents may not require hand-written signature of authorized signatory.

### 3.21. BID DEADLINE:

- a) The Bidder should submit the online Bid on or before the time schedule mentioned in Bid Information Sheet.

### 3.22. VALIDITY OF BID:

- a) The bid shall remain valid for a period of one hundred and eighty (180) Days from the date of bid deadline and will be called the Bid Validity Period for this tender. In case, Successful Bidder/ RPG is revoking or cancelling his offer or varying any term & conditions in regard thereof or not accepting Letter of Award ("LOA"), Nodal Agency shall forfeit Bid Security and take other necessary action as specified in the RFP. The date of issuance of LOA shall be intimated by the Nodal Agency to the Successful Bidder. In exceptional circumstances if LOA is not issued to the Successful Bidder(s), the Nodal Agency may solicit the Bidder's consent to an extension of the period of Bid Validity Period by 90 days.

### **3.23. COST OF BIDDING:**

- a) The Bidder shall bear all the costs associated with the preparation and submission of his offer, Nodal Agency in any case will not be responsible or liable for these costs, under any conditions. The Bidder shall not be entitled to claim any costs, charges and expenses of and incidental to or incurred by him through or in connection with submission of Bid even though Nodal Agency may elect to modify/ withdraw the invitation of Bid.

### **3.24. BID SECURITY:**

**3.24.1.** Bidder is required to submit interest free Bid Security at a rate of INR 1 lakh per MW or part thereof through NEFT/ RTGS in the account of MPUVNL provided below or in the form of bank guarantee as per prescribed format in this RFP or FDRs from commercial bank pledged in the name of MPUVNL or Account Payee Demand Draft or Unconditional Insurance Surety Bond. It shall be valid for 180 days from the bid deadline. It may be extended further for a period of ninety (90) days with mutual consent of the nodal agency and bidder. Scanned copy of bid security shall be uploaded online at e-tendering portal at the time of submission of Bid and original hard copy of bid security, if in the form of bank guarantee, shall be submitted to MPUVNL along with hard copies of bid documents as required in RFP.

- a) Account Holder Name: M. P. Urja Vikas Nigam Ltd.
- b) Bank Name: ICICI Bank Ltd.
- c) Bank Branch Address: Shivaji Nagar, Bhopal
- d) Account No.: 656501700049
- e) IFSC Code: ICIC0006565

f) MICR Code: 462229012

MSMEs are exempted from paying Bid Security but they will have to submit NSIC certificate valid at the time of Bid Deadline in order to avail this exemption.

No exemption towards Bid Security is allowed to any Govt./ semi Govt./ PSUs.

Notwithstanding other rights or actions Nodal Agency in accordance with provisions of this RFP or law, Nodal Agency shall forfeit Bid Security if:

- a) a Bidder withdraws/ revokes or cancels or unilaterally varies his Bid in any manner during the Bid Validity Period specified in the RFP document.
- b) Successful Bidder fails to accept the LOA or submits the PBG of needful value in the stipulated time.
- c) Successful Bidder fails to sign the PPA within the indicated timelines, unless there is default/ delay from Procurer or Govt. of Madhya Pradesh.

**3.24.2.** Bid Security shall be returned to all other Bidders except Successful Bidder, within fifteen (15) Days from date of opening of Financial Bid. The Bid Security of the Successful Bidder will be returned at the earliest after submission of PBG of required value as per RFP.

**3.24.3.** Bidders placing Bid for more than one Project may furnish individual Bid Security desired for each Project or single bid security for the combined capacity as they may choose. However, following may be noted:

- a. Bid security would not be utilized as elimination criterion before opening of financial bid.

**3.24.4.** After opening of financial bid, Bid Security submitted by Bidder would be applied in accordance with Cl. 4.3 of RFP to determine Qualified Bid(s)/ Qualified Bidder(s).

**3.25. OPENING OF BID - Online:**

Technical Bid of the Bidders for evaluation purpose, shall be opened online at the mentioned date and time in Key Dates as mentioned under 2.7.

Financial Bids of the Qualified Bidders will be opened online at the mentioned date

and time in Key Dates as mentioned under clause no. 2.7.

**3.26. RIGHT TO WITHDRAW THE RFP AND TO REJECT ANY BID:**

- a) This RFP may be withdrawn or cancelled by the Nodal Agency at any time without assigning any reasons thereof. The Nodal Agency further reserves the right, at its complete discretion, to reject any or all of the Bids without assigning any reasons whatsoever and without incurring any liability on any account.
- b) The Nodal Agency reserve the right to interpret the Bid submitted by the Bidder in accordance with the provisions of the RFP and make its own judgment regarding the interpretation of the same. In this regard the Nodal Agency shall have no liability towards any Bidder and no Bidder shall have any recourse to the Nodal Agency with respect to the selection process.
- c) Nodal Agency reserves its right to vary, modify, revise, amend or change any of the terms and conditions of the RFP before Bid Deadline. The decision regarding acceptance of Bid by Nodal Agency will be full and final.

**3.27. ZERO DEVIATION:**

- a) Bidder is to ensure compliance of all provisions of the RFP and submit their Bid accordingly. Bid with any deviation to the RFP conditions shall be liable for rejection without any explanation.

**3.28. EXAMINATION OF BID DOCUMENT:**

- a) Before submission of Bid, Bidder is required to carefully examine the technical specification, terms and conditions of RFP/Agreement, and other details relating to envisaged work as per the RFP.
- b) The Bidder shall be deemed to have examined the RFP and Agreement, to have obtained information on all matters whatsoever that might affect the execution of the Project activity and to have satisfied himself as to the adequacy of his Bid. The Bidder shall be deemed to have known the full scope, nature and magnitude of the work and related supplies and the requirements of material and labour involved etc. and as to all supplies he has to complete in accordance with the RFP.
- c) Bidder is advised to submit the Bid on the basis of conditions stipulated in the RFP. Bidder's standard terms and conditions, if any for what-so-ever reasons, will not be considered. The cancellation/ alteration/ amendment/ modification

in RFP shall not be accepted by Nodal Agency and shall invite rejection of such Bid(s).

- d) Bid not submitted as per the instructions to Bidder is liable to be rejected. Bid shall confirm in all respects with requirements and conditions referred in this RFP or its amendments, if any.

### **3.29. CHANGE IN LAW**

- a) If such reference comes up after execution of PPA, Change in Law shall have the meaning ascribed thereto in Article 12 of the PPA. Treatment of change in law shall be accordingly.
- b) Else, change in law shall be referenced with respect to last date of submission of online bid and shall be covered as per provisions of RfP.

### **3.30. TAXES AND DUTIES:**

- a) The Financial Bid should include all taxes and duties etc., if any. Power Producer shall be entirely responsible for all taxes, duties, license fees, etc. All taxes shall be payable by the Power Producer. However, if any new change in tax/ duty and cess is effected in the period after the Financial Bid Submission Deadline the same shall be dealt in accordance with Article 12 of the PPA.

### **3.31. PROGRESS REPORT:**

- a) Power Producer shall have to commission the Project within eighteen (18) Months from the date of LOA. The Power Producer shall submit monthly progress report to Nodal Agency in the prescribed proforma to be designed in discussion with Nodal Agency till the COD. Nodal Agency shall have the right to depute his/ their representatives to ascertain the progress at the premises of work of the Power Producer.

### **3.32. FORCE MAJEURE:**

- a) For purpose of this RFP, force majeure shall mean an event beyond the control of the Power Producer and not involving his fault or negligence and not foreseeable, in its contractual capacity. Such events may include but are not restricted to Acts of God, wars or revolutions, fires, floods, epidemics, quarantine restriction, freight embargoes, site clearance etc. Whether a force majeure situation exists or not, shall be decided by Nodal Agency and its

decision shall be final and binding on the Power Producer and all other concerned.

- b) In the event that the Power Producer is not able to perform his obligations under this Agreement on account of force majeure, he will be relieved of his obligations during the force majeure period.
- c) If a force majeure situation arises, the Power Producer shall promptly notify Nodal Agency and Power Procurer both in writing, not later than three (3) Days from the date such situation arises (in case, communication is not possible to Nodal Agency, Power Producer shall notify Nodal Agency not later than one (1) Days from the day when communication system will be restored). The Power Producer shall notify Nodal Agency and Power Procurer not later than three (3) Days of cessation of force majeure conditions. After examining the cases and associated facts, Nodal Agency shall decide and grant suitable additional time for the completion of the work, if required.
- d) Failure of such Power Producer in timely intimating Nodal Agency will suspend its right for any relief otherwise eligible under such force majeure conditions.

### **3.33. APPLICABLE LAW:**

- a) The Agreement shall be interpreted in accordance with the laws of India.

### **3.34. SETTLEMENT OF DISPUTE:**

- a) If any dispute of any kind whatsoever arises between Nodal Agency and the Power Producer in connection with or arising out of the Agreement including without prejudice to the generality of the foregoing, any question regarding the existence, validity or termination, the parties shall seek to resolve any such dispute or difference by mutual consent.
- b) If the parties fail to resolve, such a dispute or difference by mutual consent, within forty five (45) Days of its arising, then the dispute shall be referred by either party by giving notice to the other party in writing of its intention to refer to arbitration conducted under the provisions of the "Madhya Pradesh Madhyastham Adhikaran Adhiniyam, 1983". The decision of MP Madhyastha Adhikaran Adhiniyam shall be final and binding up on the parties. The language of the arbitration proceedings and that of the documents and communications between the parties shall be English. All the dispute will be

settled in the High Court of MP. No arbitration proceedings will commence unless such notice is given.

- c) Notwithstanding any reference to the arbitration herein, the parties shall continue to perform their respective obligations under the Agreement unless they otherwise agree.
- d) Cost of arbitration shall be borne as per the award of the arbitration.

### **3.35. LANGUAGE:**

- a) All documents, drawings, instructions, design data, calculations, operation, maintenance and safety manuals, reports, labels and any other data shall be in Hindi/English Language. The Agreement and all correspondence between the Nodal Agency and the Bidder shall be in Hindi/English language.

### **3.36. AMENDMENT:**

- a) Nodal Agency reserves the right to modify, amend or supplement RFP documents including all formats and annexures at any time. Bidder are advised to follow and keep track of Nodal Agency website for updated information till the selection of Bidder. No separate notifications will be issued for such notices/amendments/clarification etc. in the print media or individually. Nodal Agency shall not be responsible and accountable for any consequences to any party.

### **3.37. SEVERABILITY:**

- a) It is stated that each paragraph, clause, sub-clause, schedule or annexure of this contract shall be deemed severable, and, in the event of the unenforceability of any paragraph, clause sub-clause, schedule or the remaining part of the paragraph, clause, sub-clause, schedule annexure & rest of the contract shall continue to be in full force and effect.

### **3.38. PREFERENCE:**

- a) Unless specifically provided in RfP, there is no relaxation in terms of any conditions of the RFP or Bid Processing Fee or Bid Security or PBG for any Bidder participating in Self Development Mode or in Developer Mode (private company or State or Central company/ agency).
- b) The bid processing fees will be paid to MPUVNL in following account (through



RTGS/ NEFT) and proof of the same shall be mailed to MPUVNL as well as submitted with online bid:

- i. Account Holder Name: M. P. Urja Vikas Nigam Ltd.
- ii. Bank Name: ICICI Bank Ltd.
- iii. Bank Branch Address: Shivaji Nagar, Bhopal
- iv. Account No.: 656501700049
- v. IFSC Code: ICIC0006565
- vi. MICR Code: 462229012

### **3.39. TAX EXEMPTIONS:**

- a) Nodal Agency will extend possible cooperation to Power Producer in availing any tax exemptions. However, the responsibility of availing any such exemptions, if any, would rest with the Power Producer.

### **3.40. FRAUD AND CORRUPTION**

The Power Producers, suppliers and contractors and their sub-contractors under the contracts are required to observe the highest standard of ethics during the procurement and execution of such contracts. In pursuance of this, the Nodal Agency:

- a) Defines, for the purpose of this provision, the terms set forth below as follows:
  - i. **“corrupt practice”** is the offering, giving, receiving or soliciting, directly or indirectly, of anything of value to influence improperly the actions of another party;
  - ii. **“fraudulent practice”** is any act or omission, including a misrepresentation, that knowingly or recklessly misleads or attempts to mislead, a party to obtain a financial or other benefit or to avoid an obligation;
  - iii. **“collusive practice”** is an arrangement between two or more parties designed to achieve an improper purpose, including to influence improperly the actions of another party;
  - iv. **“coercive practice”** is impairing or harming, or threatening to impair or harm, directly or indirectly, any party or the property of the party to influence improperly the actions of a party;

v. **“obstructive practice” is**

aa) deliberately destroying, falsifying, altering or concealing of evidence material to the investigation or making false statements to investigators in order to materially impede a Nodal Agency’s investigation into allegations of a corrupt, fraudulent, coercive or collusive practice; and/ or threatening, harassing or intimidating any party to prevent it from disclosing its knowledge of matters relevant to the investigation or from pursuing the investigation;

**or**

- ab) acts intended to materially impede the exercise of the Nodal Agency’s inspection and audit rights.
- b) will reject a proposal for award if it determines that the Successful Bidder recommended for award has, directly or through an agent, engaged in corrupt, fraudulent, collusive, coercive or obstructive practices in competing for the contract in question;
- c) will sanction a firm or individual, including declaring ineligible, either indefinitely or for a stated period of time, to be awarded a contract if it at any time determines that the firm has, directly or through an agent, engaged in corrupt, fraudulent, collusive, coercive or obstructive practices in competing for, or in executing, a contract; and
- d) will have the right to require that the provision be included in Bidding Documents and in contracts, requiring Bidders, suppliers, and contractors and their sub-contractors to permit the Nodal Agency to inspect their accounts and records and other documents relating to bid submission and contract performance and to have them audited by auditors appointed by the Nodal Agency.

**3.41. DEBARRED FROM PARTICIPATING IN NODAL AGENCY’S TENDER**

- a) Agency reserves the right to carry out the performance review of each Bidder from the time of submission of Bid onwards. In case it is observed that a Bidder has not fulfilled its obligations in meeting the various timelines envisaged, in addition to the other provisions of the RFP, such Bidder may be debarred/ blacklisted from participating in Nodal Agency’s any future tender/ RFP for a period of five (5) years.

### 3.42. CENTRAL FINANCIAL ASSISTANCE (CFA) FROM GOVT. OF INDIA

- a) Subsidy from Govt. of India in the form of central financial assistance (CFA) for feeder level solarization (FLS) projects under component-C of PM KUSUM scheme would be in accordance with guidelines and/ or orders of Ministry of New and Renewable Energy, Govt. of India (MNRE) as applicable on bid submission end date.
- b) As per MNRE order dated 29.01.2024 read with its order dated 14. 02. 2024, CFA of INR 1.05 crore/ MW i.e. 30% of estimated project cost of INR 3.5 crore, shall be available for FLS projects under component-C of PM KUSUM scheme till any further update is announced by MNRE. This subsidy is irrespective of actual cost of project incurred by RPG.
- c) As per MNRE order dated 05.04.2024, the release of CFA shall as per manner and milestones prescribed below:

CFA release/ tranches	Milestone achieved	Activities to be completed by project developer	Release mechanism
30% of CFA as first instalment	30% of work	(i) Letter of award and signing of PPA by RPG with Procurer. (ii) Signing of EPC contract and releasing of advance to EPC contractor. (iii) Encumbrance free land available for project with either copy of land record with RPG ownership or copy of lease agreement. (iv) Bay allocation letter received from Discom. (v) Escrow agreement, if financial assistance is obtained from FI/ banks. (vi) GST invoices of solar module, inverters and transformer.	30% CFA would be released to Nodal Agency on submission of documents duly verified by Nodal Agency.  Nodal Agency shall transfer the CFA to RPG/ Developer.

<b>CFA release/ tranches</b>	<b>Milestone achieved</b>	<b>Activities to be completed by project developer</b>	<b>Release mechanism</b>
		(vii) Financial closure of project.  (viii) 50% completion of preliminary civil work, including foundation for module mounting etc.	
30% of CFA as second instalment	75% of work	(i) Completion of preliminary civil work, including foundation for module mounting structure etc.  (ii) Receipt of solar PV module and solar inverter at project site.  (iii) 75% completion of installation work of solar PV modules.	Second instalment would be released to Nodal Agency.  Nodal Agency would transfer the fund to lender/ financier in case the project is under financing, otherwise, release to RPG/ Developer.
40% of CFA as final instalment	100% of work	(i) Instalment of 25% shall be released through Nodal Agency on completion of the plant commissioning.  (ii) 15% on successful performance of the solar plants for two (2) months after the commissioning, with achievement of at least one month CUF as per the minimum CUF agreed in PPA	Final instalment would be released to Nodal Agency.  Nodal Agency would transfer the fund to lender/ financier in case the project is under financing, otherwise, release to RPG/ Developer.



## **SECTION IV: BID EVALUATION**

### **4. BID EVALUATION:**

#### **4.1. THE EVALUATION PROCESS COMPRISES THE FOLLOWING FIVE STEPS:**

- a) Step I - Responsiveness check of Technical Bid and Evaluation of Bidder' fulfilment of Eligibility Criteria described in Section-I & III.
- b) Step II - Evaluation of Financial Bid
- c) Step III – Identification of Financially Qualified Bidder and filling required bucket
- d) Step IV – Selection of Successful Bidder.

#### **4.2. RESPONSIVENESS CHECK OF TECHNICAL BID:**

The Technical Bid submitted by Bidder (both the hard copies of required documents and the online Bid) shall be scrutinized to establish responsiveness to the requirements laid down in the RFP. However, subject to decision of Competent Authority, if there is any difference between hard copy and online copy, **the online version of submitted Bid and associated documents will prevail.**

Any of the following may cause the Bid to be considered “Non-responsive” and liable to be rejected, at the sole discretion of Nodal Agency, subject to sufficient justification and decision of Competent Authority:

- a) Bid that are incomplete, i.e. not accompanied by any of the applicable and required formats;
- b) Bid not accompanied by contents of as per RfP;
- c) Bid not signed by authorized signatory and / or stamped in the manner indicated in this RFP;
- d) Material inconsistencies in the information / documents submitted by the Bidder affecting the Eligibility Criteria;
- e) Bid being conditional in nature;
- f) Bid not received by the Bid Deadline;
- g) Bid having conflict of interest;
- h) Bidder makes any misrepresentation;
- i) Any other act of Bidder which may be unlawful for the purpose of this RFP.

- j) Bid submitted is not in requisite format(s).

Each Bid shall be checked for compliance with the submission requirements set forth in this RFP before the evaluation of Bidder's fulfilment of Eligibility Criteria is taken up.

#### 4.3. QUALIFIED BIS(S)/ BIDDER(S) SELECTION:

- a) Bid responsive as per RfP and qualifying in as per General Eligibility Criteria would be evaluated in this stage and their Financial Bid would be opened on <https://www.bharat-electronictender.com> Portal.
- b) Subsequently, all Bids would be checked as per following to identify Qualified Bids/ Bidders:
  - b. Bids meeting both Bid Security and tender fees criterion, as referenced with respective Financial Bid, would be considered as Qualified Bids/ Bidders
  - c. In case of any discrepancy between Bid Security, tender fees and Financial Bid descriptions, round-down number of substations from amongst Financial Bid with lowest tariff in ascending order adding to cumulative capacity up to least of the numbers applicable for Bid Security, tender fees and financial bid descriptions would be considered for purpose of Qualified Bid(s)/ Bidder(s).

*Explanation:*

Tender Fees compliant for how much capacity (MW)	Bid Security compliant for how much capacity (MW)	Financial Bid submitted for how much capacity (MW)	Considered Qualified Bid/ Bidder for how many substations
(A)	(B)	(C)	(D)
23	23	23	Round-down number of substations corresponding to capacities against column (C) with lowest tariff in ascending order adding to cumulative capacity up to least of the numbers mentioned in column (A), (B) and (C)
20.7	25.2	18.3	
27.4	18.9	30.0	

- c) All Qualified Bids would be placed as equal for a concerned Project.
- d) Bidder shall quote the fixed tariff, in the Financial Bid for a substation, for the entire term of the PPA with effect from the COD. The Quoted Tariff shall be in Rupees/ Unit, up to three (3) decimal places.
- e) A Bidder is required to quote one tariff for a Project as listed at Annexure-1. Bidders bidding for multiple sub-stations shall quote tariff separately for SPPs on respective substations.

#### **4.4. EVALUATION OF FINANCIAL BID AND DECLARATION OF SUCCESSFUL BIDDERS**

**4.4.1.** From among Qualified Bidders, bucket filling methodology shall be followed for selection of Successful Bidders up to cumulative CFA equivalent capacity of approximately **1500 MW** solar projects at the most competitive tariff:

- a) Qualified Bidders quoting lowest tariff (L-1) for respective substations shall be identified. Such L-1 tariffs would remain valid up to 6 months from date of opening of Financial Bid.
- b) Such L-1 Bidder(s) for respective concerned substations shall be arranged in ascending order and following would be applied to identify Successful Bidders for cumulative CFA equivalent capacity of 1500 MW in bucket filling method:
  - a. Allocation of substations would start from lowest of L-1 rates, that is the universal L1 (UL1) rate to higher L-1 rates for respective substation;
  - b. Bidder(s) with lowest tariff for concerned substation and having financial capacity as per Financial Eligibility criteria defined under Cl. 3.14 of RfP, would be declared Successful Bidder for such substation and such Project as per RfP would be allocated to it;
  - c. If a Bidder is L-1 at multiple substations, its remaining financial capacity aligned to Cl. 3.14 would be checked every time before allocation of such substation and allocation of concerned substation to concerned Bidder would be subject to fully meeting financial capacity requirements as per Cl. 3.14 of RfP;
  - d. In case, financial capacity of an L-1 Bidder is exhausted and makes it ineligible for a concerned substation, the L-2 Bidder for such substation would be considered as the new L1 to re-prepare list of rates in ascending order. This step would be



- repeated by incorporating subsequent higher order rates (L3, L4, L5,..... ) as L1 for concerned substation, whenever financial capacity of a concerned Bidder for such substation is exhausted;
- e. All allocations would be subjected to rate reasonability in light of prevailing market conditions;
  - f. Provisions sub-bullets [b., c. and d.] above would not apply in case of Bidders participating under Self Development Mode. They would get allotment of substations if meeting provisions of sub-bullet [a.] above, i.e., being L-1 Qualified Bidder for concerned substation, subject to total bucket capacity requirement under this RfP;
- c) While applying sub-clause [b)] of Cl. 4.4.1 above, if multiple substations receive same L-1 tariff, substation with higher Project Capacity would be given priority over substation with lower Project Capacity.
- d) For Substations (s), where two or more Bidders (whether participating under Developer Mode or Self-Development Mode) quoted the same tariff or where same Bidder quotes same tariff for multiple substations, the preference shall be given in following order:
- aa) A transparent lottery system.

#### **4.5. DECISION AT THE DISCRETION OF NODAL AGENCY**

This RfP is for selection of Successful Bidders who would implement ambitious feeder solarization under component-C of PM KUSUM scheme.

- a) Notwithstanding anything contained in this RfP, Competent Authority shall have following rights without any obligation or answerability to Bidders:
  - a. decide on acceptable range of rates for Projects under this RfP,
  - b. decide on total capacity to be awarded under this RfP,
  - c. cancel or terminate tendering process at convenience without assigning any reason at any stage of tendering process.

#### **4.6. AWARD OF CONTRACT TO SUCCESSFUL BIDDER**

- a) Nodal Agency shall provide LOA to the Successful Bidder. The date of issuance of LOA shall be intimated by the Nodal Agency to the Successful Bidder.
- b) The Successful Bidder has to accept the LOA within sixty (60) days and submits PBG as per RFP as well as documents and fees related to project registration with MPNRED, failing which the Nodal Agency reserves the right to annul/ cancel the LOA of the

Successful Bidder.

- c) In case Nodal Agency cancels the LOA issued to the Successful Bidder due to its non-compliance or successful bidder fails to sign the PPA within the stipulated timeline, the capacity of such bidder will be withdrawn and bid security of the bidder will be forfeited and/or the bidder will be debarred/ blacklisted from participating in MPUVN RFPs / tenders for a period of five (5) years.
- d) Nodal Agency at its own discretion, has the right to reject any or all the Bid without assigning any reason whatsoever at any stage of tendering process.

#### **4.7. Performance Bank Guarantee:**

- a) The Successful Bidder/ RPG shall provide Performance Bank Guarantee (PBG) of Rs. 1 Lakh/ MW to Procurer within sixty (60) days from date of issue of Letter of Award.
- b) The PBGs submitted by successful bidder shall be valid for a period of twenty one (21) months from the date of issuance of LOA for the SPP. Managing Director of MPUVNL can further extend this time- line by another thirty (30) days maximum. Details of such extensions shall be informed to the Board of MPUVNL.
- c) The PBG will be returned to the power producer immediately after successful commissioning of solar power plant, after taking into account any adjustments/ recoveries, including penalties due to delay in commissioning.

#### **4.8. Signing of PPA**

- a) The signing of PPA by the power producer (s) with the Procurers shall happen within sixty (60) days of issuing the LOA on the basis of Project Capacity. Managing Director of MPUVNL can further extend this timeline by another thirty (30) days maximum. Details of such extensions shall be informed to the Board of MPUVNL. Any delay in PPA execution due to reasons attributable to Procurer or Govt. of Madhya Pradesh shall be deemed adjusted by Procurer in counting of above timelines without necessity of any formalization or regularization either by Nodal Agency or by Procurer or Govt. of MP.
- b) Preferably, individual PPA shall be signed by a Successful Bidder with Procurer for each Project at corresponding tariff discovered through competitive bidding in accordance with this RfP.

However, PPAs for a group of Projects can be executed between Procurer and concerned Successful Bidder(s) as per mutual agreement and arrangement in that behalf for ease of commercial and contractual transactions. In such cases, technical arrangement of concerned Projects shall be ensured and complied with individually.

Necessary provisions in this regard may be incorporated in PPA as relevant duly agreed between Procurer and concerned Successful Bidder(s).

- c) The selected RPG is required to sign PPA with the Procurer in line with the timeline given in the RFP. In case, the selected RPG fails to execute the PPA within the stipulated time period, except for reasons attributable to Procurer or Govt. of MP, the RPG will be penalized according to the RFP.
- d) The term of the PPA shall be in line with Article 2 of the PPA. The Procurer will be obliged to buy the power in line with Clause 4.3 of the PPA.

**4.9.** In case any PBG, BG (if available) is utilized, partly or fully, towards recovery/ adjustment of LD/ penalty, the same shall be replenished to its original value and validity period within seven (7) Days of written communication on this behalf from Nodal Agency or procurer to Power Producer.

**4.10. Innovation:** There would a single window at MPUVNL to facilitate Successful Bidders in implementation of Projects, including handholding with financial institutions, government agencies. Towards it, following is in place:

- d. Memorandum of Understanding (MoU) executed with State Bank of India (SBI) to streamline processes and procedures to provide better financing experience to RPGs (**Annexure-4**).
- e. Standard operating procedure (SOP) has been evolved in consultation with Procurer and associated Discoms to streamline processes and procedures related to metering, estimates, BOQ, approvals etc. as well as roles and responsibilities of concerned stakeholders (**Annexure-3**)

### **SECTION V – FINANCIAL BID**

To be filled submitted online only

1. Bidder shall submit levelized tariff upto three (3) decimal places in “Excel” file as provided with RfP. No other form shall be acceptable.
2. Bidder shall mention levelized tariff against ONLY those substations it wishes to place bid. For remaining substations in the list, Bidder shall leave blank or may write “NA”. Bidder will not have option to add or deleted list of substations provided in Financial Bid template provided in “Excel” file.  
[Example: If a Bidder is interested to place bid for any 5 Projects/ substations of their choice, then, levelized tariff against 5 such Projects shall be mentioned. Remaining may be left blank or Bidder may write “NA” such remaining Project/ substation].
3. Given below is a SAMPLE FORMAT in which the financial bid for each Project/ sub-station will be submitted ONLINE only (Please DO NOT fill this offline and DO NOT submit this with hard copy of bid).

Sl. no	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT	Levelized Tariff [INR per kWh)
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)
1								
2								

Request for Proposal for Grid Connected SPPs in Madhya Pradesh under feeder solarization component of PM KUSUM - C Scheme

3								
4								
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10								
11								
12								
13								
14								
15								
16								

\* This tariff to be submitted ONLINE only. This tariff shall be fixed for 25 years from commercial operation date.

**ONLINE BID PORTAL SHALL ALERT A BIDDER TO CHECK IF HE HAS SUBMITTED CORRECT ONLINE FINANCIAL BID (INR vs. Paise check and correct number of substations check). However, failure to submit correct online financial bid shall be sole responsibility of Bidder**

**SECTION VI: FORMATS TO BE SUBMITTED BY BIDDERS PARTICIPATING IN SELF DEVELOPMENT MODE**

(Relevant formats to be submitted by Individual farmers or Group of farmers or Cooperatives or panchayats or Farmer Producer Organizations (FPO) or Water User associations (WUA) or Government agricultural institute or other agriculture related institutions applying under self-development mode for KUSUM-C (feeder solarization) projects)

## CHECK LIST FOR BIDDERS PARTICIPATING UNDER SELF DEVELOPMENT MODE

Under this self-development mode, bidder will be individual farmers/ group of farmers/ cooperatives/ panchayats/ Farmer Producer Organisations (FPO)/ Water User associations (WUA)/ Government agricultural institute or other agriculture related institutions can develop the solar power plant under KUSUM – C (feeder solarization) scheme in Madhya Pradesh, on their own land, to deliver power on selected sub-station

### Checklist for ONLINE submission

Sr. No.	Particular	Format No.	Document uploaded online (Yes/ No)
1.	Covering Letter	S1	
2.	General Particulars of the Bidder	S2	
3.	Unconditional acceptance of RFP terms and conditions	S3	
4.	Undertaking for participation under Self-Development-Mode	S4	
5.	Bid Security, if applicable in the form of BG	S5	
6.	Declaration	S6	
7.	Power of Attorney; in favour of lead member	S7	
8.	Format for consortium agreement	S8	
9.	Land availability certificate from Collector (if applicable)	S9	

### 2. Checklist for OFFLINE/ HARD copy submission

Sr. No.	Particular	Format No.	Document uploaded online (Yes/ No)
1.	Bid Security, if applicable in the form of BG	S5	
2.	Pass phrase for decrypting Technical Bid and Financial Bid		

Signature of authorized signatory of Bidder

Name:

**FORMAT S1: Covering Letter**

(Applicable to Individual farmers or Group of farmers or Cooperatives or panchayats or Farmer Producer Organizations (FPO) or Water User associations (WUA) or Government agricultural institute or other agriculture related institutions applying under self-development mode)

**Ref. No.** \_\_\_\_\_ (Please insert RfP No)

**Date:**

**From:** \_\_\_\_\_ (Insert name and address of Bidder)

**Tel.:** \_\_\_\_\_

**E-mail:** \_\_\_\_\_

**To:**

Executive Engineer  
Madhya Pradesh Urja Vikas Nigam Limited  
(A Government of Madhya Pradesh Enterprise)  
Urja Bhawan, Link Road No. 2,  
Shivaji Nagar, Bhopal - 462016

Sub: Request for Proposal (RFP) for Selection of renewable power generator (RPG) setting up of Grid connected Solar based Power Plants (SPP) for feeder solarization component under PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India, for sale of power to MPPMCL.

Dear Sir,

- a) We, the undersigned \_\_\_\_\_ [insert name of the Bidder] having read, examined and understood in detail the Request for Proposal (RFP) for Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of cumulative CFA equivalent capacity of approximate **1500** MW under feeder solarization component of PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India for Sale of Solar Power to MPPMCL at the Delivery Point in each substation at various locations in the state of Madhya Pradesh, India, hereby submit our Bid comprising of Financial Bid and Technical Bid. We confirm that neither we nor any of our Affiliate (if applicable) has submitted Bid other than this Bid directly or indirectly in response to the aforesaid RFP.
- b) We give our unconditional acceptance to the RFP attached thereto, issued by Madhya Pradesh Urja Vikas Nigam Limited, as amended. As a token of our acceptance to the RFP, the same have been initialled by us and enclosed to the Bid.



We shall ensure that we execute such RFP as per the provisions of the RFP and provisions of such RFP shall be binding on us.

**c) Bid Security**

We have submitted/ enclosed Bid Security as prescribed in this RfP.

**d) Acceptance**

We hereby unconditionally and irrevocably agree and accept that the decision made by Nodal Agency in respect of any matter regarding or arising out of the RFP shall be binding on us. We hereby expressly waive any and all claims in respect of Bid process.

We confirm that there are no litigations or disputes against us, which materially affect our ability to fulfil our obligations with regard to execution of projects of capacity offered.

**e) Familiarity with Relevant Indian Laws & Regulations**

We confirm that we have studied the provisions of the relevant Indian laws and regulations as required to enable us to submit this Bid and execute the RFP, in the event of our selection as Successful Bidder. We further undertake and agree that all such factors as mentioned in RFP have been fully examined and considered while submitting the Bid.

We undertake that we have satisfied ourselves with the site conditions of the projects and our proposed financial bid takes into consideration the existing site conditions.

**f) Contact Person**

Details of the contact person are furnished as under:

Particulars	Description
Name	
Designation	
Company/ Group/ Individual	
Address	
Phone Nos.	
E-mail address	

We confirm that our bid shall remain valid for a period of one hundred and eighty (180) Days from Bid Deadline. We are enclosing herewith covering letter, processing fee and Bid Security and technical documents as per applicable containing duly signed formats as desired by you in the RFP for your consideration.

It is confirmed that our Bid is consistent with all the requirements of submission as stated in the RFP and subsequent communications from Nodal Agency. The information submitted in our Bid is complete, strictly as per the requirements stipulated in the RFP and is correct to the best of our knowledge and understanding. We would be solely responsible for any errors or omissions in our Bid. We confirm that all the terms and conditions of our Bid are valid for acceptance for a period of one hundred and eighty days, confirm that we have not taken any deviations, so as to be deemed non-responsive.

**Signature**

**Name:**

(Individual farmer or authorized Person in whose name Power of Attorney is issued in case bidder is group of farmers/ cooperatives/ panchayats/ Farmer Producer/ Organisations (FPO)/ Water User associations (WUA)/ Government agricultural institute or other agriculture)

## FORMAT S2: General Particular of Bidder

(Applicable to Individual farmers or Group of farmers or Cooperatives or panchayats or Farmer Producer Organizations (FPO) or Water User associations (WUA) or Government agricultural institute or other agriculture related institutions applying under self-development mode)

### General Particulars of Bidder

2.	Name of the Bidder						
3.	Type of Bidders (Individual farmers or Group of farmers or Cooperatives or panchayats or Farmer Producer Organizations (FPO) or Water User associations (WUA) or farmers setting up SPP in their own lands or Government agricultural institute or other agriculture related institutions)						
4.	Land ownership documents (please insert more rows, if required):						
	District	Tehsil	Village	Sub-station Name	Bidding Capacity (in kW)	Area of Land Owned (in Hectare)	Is land ownership document attached** (Yes/No)
3.1							
3.2							
3.3							
3.4							
3.5							
5.	PAN No. of Bidder (or authorised representative)- attach a copy of PAN						
6.	Aadhaar of Bidder (or authorised representative)- attach a copy of Aadhaar						
7.	Bidder's full address of communication						
8.	E-mail						
9.	Authorized Contact Person(s) with name, designation, full address and Mobile Phone No., E-mail address to whom all references shall be made.						
10.	Has the Bidder been debarred/ blacklisted as on bid submission date by any Govt. Dept./ undertaking for undertaking any work						

**\*\* Important note:** Land ownership proof may preferably be either of following documents- *khasara/khatauni*, *bhoo-adhikar pustika*, *naksa*, and/or land registry which suffice that land ownership in name of bidder is undisputed. An equivalent documentary evidence may also be considered subject to sole discretion of MPUVNL. However, at any stage during or after bidding, if land ownership status at the time of bidding is found disputed, the participation or selection as RPG may be cancelled and/or appropriate legal actions may be initiated.

(Signature of Authorized Signatory)

Name:

**FORMAT S3: Unconditional acceptance of RFP terms and conditions**

Undertaking on unconditional compliance and adherence with RfP Documents

(Applicable to Individual farmers or Group of farmers or Cooperatives or panchayats or Farmer Producer Organizations (FPO) or Water User associations (WUA) or Government agricultural institute or other agriculture related institutions applying under self-development mode)

Date: / /20\_\_

To,  
Executive Engineer,  
MP Urja Vikas Nigam Limited  
Urja Bhawan,  
Link road no-2, Shivaji Nagar,  
Bhopal- 462016

Ref.: RfP No: \_\_\_\_/\_\_\_\_/\_\_\_\_ dated \_\_\_\_

Dear sir

We have carefully read and understood terms and conditions of above referenced RFP (no. \_\_\_\_/\_\_\_\_/\_\_\_\_/\_\_\_\_ dated \_\_\_\_ ) and associated PPA and their corrigenda/ addenda/ amendments issued from time to time before bid submission end date (collectively called as "RfP Documents").

We declare and undertake to unconditionally accept and abide by terms and conditions of RfP Documents during bidding process and after award of work to us, as relevant.

(Signature of Authorized Signatory)

Name:

**FORMAT S4: Undertaking for participation under Self-Development-Mode**

(Applicable to Individual farmers or Group of farmers or Cooperatives or panchayats or Farmer Producer Organizations (FPO) or Water User associations (WUA) or Government agricultural institute or other agriculture related institutions applying under self-development mode)

To,

Executive Engineer,  
MP Urja Vikas Nigam Limited  
Urja Bhawan,  
Link road no-2, Shivaji Nagar,  
Bhopal- 462016

Ref.: RfP No: \_\_\_\_/\_\_\_\_/\_\_\_\_/\_\_\_\_ dated \_\_\_\_

Dear sir

With reference to above RFP and associate and associated PPA and their corrigenda/addenda/ amendments issued from time to time before bid submission end date (collectively called as "RfP Documents"), I/ we declare, undertake and accept the following:

1. My/ Our participation against this RfP is as individual farmer/ Group of farmers/ Cooperatives/ Panchayats/ Farmer Producer Organizations (FPO)/ Water User associations (WUA)/ Government agricultural institute or other agriculture related institutions.
2. Authorized signatory and representative for this bid is Ms./ Mr. \_\_\_\_\_
3. I/ we own full or part of land near to the sub-stations, on which solar power plant(s) for which we are bidding under this RfP, will be set-up by me/ us,
4. In case owned land is not sufficient to set-up the plant, then I/ we shall arrange necessary contiguous land in accordance with RfP provisions and implement project awarded to me/ us in accordance with conditions of power purchase agreement.
5. I/ we commit and undertake that, failure to implement project for issues related to land availability shall make us liable for suitable action, by Competent Authority, under provisions of RfP documents or under provisions of relevant laws.

(Signature of Authorized Signatory)

Name

**FORMAT S5: Bid security**

(To be stamped on non – judicial stamp paper of minimum INR 1000)

(Applicable to Individual farmers or Group of farmers or Cooperatives or panchayats or Farmer Producer Organizations (FPO) or Water User associations (WUA) or Government agricultural institute or other agriculture related institutions applying under self-development mode)

To be submitted as per format given in RfP, if applicable.

**FORMAT S6: Declaration**

(Applicable to Individual farmers or Group of farmers or Cooperatives or panchayats or Farmer Producer Organizations (FPO) or Water User associations (WUA) or Government agricultural institute or other agriculture related institutions applying under self-development mode)

(To be stamped on non – judicial stamp paper of minimum INR 1000 value)

Ref. no.: \_\_\_\_/\_\_\_\_/\_\_\_\_/\_\_\_\_ dated \_\_\_\_

I/ We have carefully read and understood the Terms and Conditions of the RFP and agree to abide by them. I/ We accept and undertake, the following statements that,

1. I/ We have carefully read and understood terms and conditions of above referenced RFP and associated PPA and their corrigenda/ addenda/ amendments issued from time to time before bid submission end date (collectively called as “RfP Documents”). In case, at any stage of bidding process or after award of work, our bid or award of work is found non-compliant with any provisions of RfP Documents or any of our undertakings/ declarations are found wrong/ unsolicited/ misrepresented/ unfulfilled, we unconditionally declare and undertake to accept, without any responsibility/ accountability/ implications/ liabilities/ obligations on anyone other than us, decision of Competent Authority as appropriate, including rejection of our bid and/ or cancellation of award of work, without prejudice to any other rights that Competent Authority may be entitled to exercise as per law or under provisions of RfP documents
2. I/ We have not been Blacklisted or debarred or otherwise for any Supply of Goods / Services / Works by any Ministry / Department / PSU of Central Government / Any of the State Government(s), anytime / anywhere in the Country or have not failed to execute any previous work of MPUVNL.
3. I/ We solemnly undertake that, the responsibility of execution of the Work as per the terms and conditions of the RFP/ Contract Agreement shall be entirely ours.
4. I/ We solemnly undertake that land utilized against eligibility for participation in Bid is in 5 km. radial distance from the concerned substation.
5. Except as required by nodal agency, we/ I have not taken support from any of the independent Consultant or Consulting Agency who is associated with Nodal Agency in any form while preparing RFP.
6. I/ We are aware that, I/ we should ensure compliance to the all MNRE's order/ rule/ guidelines pertaining to KUSUM – C till date, including but not limited to the following:
  - a) Requirement of indigenously manufactured module, cells and BOS: System specifications and quality control of projects under KUSUM-C (FLS) would be in accordance with Para 6.4.6 of MNRE's Comprehensive Guidelines for Implementation of PM KUSUM Scheme, dated 17.01.2024, and its amendments/ modifications as relevant and applicable. This requirement would be applicable for the portion of Project Capacity eligible for Central Financial Assistance (CFA).
  - b) Requirement of Approved List of Models and Manufacturers (ALMM): Bidders/ Successful Bidders would comply ALMM requirement as per ALMM order by Ministry of Power dated 09.12.2024 and it would be applicable on full Project Capacity

If this Declaration is found to be incorrect or if any RFP Condition is found violated by us, then

without prejudice ..... (Insert Bidder's Name) including our Members, shall be blacklisted/ suspended/ debarred from participating in upcoming tenders issued by any department of MP State Government for a period of 5 years from the date of default as notified by MP Urja Vikas Nigam Limited. and the Proposal to the Extent of Acceptance / anytime during Execution of Assignment may be cancelled.

(Signature of Authorized Signatory)

Name & Address:



**FORMAT S7: Power of Attorney**

(Applicable to Group of farmers or Cooperatives or panchayats or Farmer Producer Organizations (FPO) or Water User associations (WUA) or Government agricultural institute or other agriculture related institutions applying under self-development mode)

(To be stamped on non – judicial stamp paper of minimum INR 1000 value)

- a) Power of Attorney to be provided by the Bidder in favour of its representative as evidence of authorized signatory's authority.
- b) Know all men by these presents, we (name and address of the registered office of the Bidder as applicable) do hereby constitute, appoint and authorize Mr./ Ms. (name & residential address) who is presently employed with us and holding the position of \_\_\_\_\_ as our true and lawful attorney, to do in our name and on our behalf, all such acts, deeds and things necessary in connection with or incidental to submission of our Bid for Selection of Solar Power Developer for Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of cumulative CFA equivalent capacity of approximate **1500** MW for Sale of Solar Power to MPPMCL at the delivery point in each substation at various locations in the state of Madhya Pradesh, India in response to the RFP No. \_\_\_\_\_ Dated: \_\_\_\_/ \_\_\_\_/ \_\_\_\_ issued by Nodal Agency including signing and submission of the Bid and all other documents related to the Bid, including but not limited to undertakings, letters, certificates, acceptances, clarifications, guarantees or any other document which the Nodal Agency may require us to submit. The aforesaid Attorney is further authorized for making representations to the Madhya Pradesh Urja Vikas Nigam Limited and providing information / responses to Nodal Agency representing us in all matters before Nodal Agency and generally dealing with Nodal Agency in all matters in connection with Bid till the completion of the bidding process as per the terms of the above mentioned in RFP.
- c) We hereby agree to ratify all acts, deeds and things done by our said attorney pursuant to this Power of Attorney and that all acts, deeds and things done by our aforesaid attorney shall be binding on us and shall always be deemed to have been done by us.
- d) All the terms used herein but not defined shall have the meaning ascribed to such terms under the RFP.

\_\_\_\_\_  
Signed by the within named

(Insert the name of the executant)

through the hand of

Mr \_\_\_\_\_

duly authorized by the all signees to issue such Power of Attorney

Dated this \_\_\_\_\_ day of \_\_\_\_\_

Accepted

\_\_\_\_\_  
Signature of Attorney

Name:

Address:

Aadhar Card/ PAN Card Number:

Attested

\_\_\_\_\_  
(Signature of the executant)

Name:

Address of the Attorney:

Aadhar Card/ PAN Card Number:

\_\_\_\_\_  
Signature and stamp of Notary of the place of execution

Common seal of \_\_\_\_\_ has been affixed in my/ our presence pursuant to Board of Director's Resolution dated \_\_\_\_\_

WITNESS

\_\_\_\_\_  
(Signature)

Name:

Address,

Aadhar Card/ PAN Card Number:

(Signature)

Name:

Address,

Aadhar Card/ PAN Card Number:

**FORMAT S8: Format for Joint Bidding Agreement**

(Applicable to Group of farmers, Cooperatives, Panchayats, Farmer Producer Organizations (FPO), Water User associations (WUA))

**Joint Bidding Agreement Format for Participation in  
“Request for Proposal (RFP)  
For Selection of Solar Power Developer  
For**

Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of cumulative CFA equivalent capacity of approximately **1500** MW under feeder solarization component of PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India, for Sale of Solar Power to MPPMCL at the delivery point at concerned substations in Madhya Pradesh, India.

(To be stamped at non judicial stamp paper of minimum INR 1000)

THIS JOINT BIDDING AGREEMENT is entered into on this \_\_\_\_ day of \_\_\_\_\_ 20\_\_\_\_.

**AMONGST**

\_\_\_\_\_ (name of member who is assigned to power of attorney) and having its registered office/ residence at \_\_\_\_\_ (Hereinafter referred to as the “**First Part**” or “**Lead Member**” which expression shall, unless repugnant to the context include its successors and permitted assigns)

**AND**

\_\_\_\_\_ (name of all members) Having its residence/ registered office at \_\_\_\_\_. (Hereinafter referred to as the “**Second Part**” or “**Member**” which expression shall, unless repugnant to the context include its successors and permitted assigns).

The above-mentioned parties of the First and Second are collectively referred to as the “**Parties**” and each is individually referred as a “**Party**”.

**WHERE AS,**

i. Madhya Pradesh Urja Vikas Nigam Ltd. (hereinafter referred to as the “**MPUVNL**” which expression shall, unless repugnant to the context or meaning thereof, include its administrators, successors and assigns) has invited applications (the “**Applications**”) by its RFP No: ..... Dated / / for award of the rate contract/ work under “Selection of Solar Power Developer for Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of cumulative CFA equivalent capacity of approximately **1500** MW for Sale of Solar Power to MPPMCL at the delivery point in each substation at various locations in the state of Madhya Pradesh, India (hereinafter called “**Project (s)**”) and Selection of Solar Power Developer for the same.

- ii. The Parties are interested in jointly bidding for the Project as members of Group of farmers/ Cooperatives/ Panchayat/ Farmer Producer Organizations (FPO)/ Water User associations (WUA) in accordance with the terms and conditions of the RFP document and other bid documents in respect of the Project, and
- iii. It is a necessary condition under the RFP document that, the members of Group of farmers/ Cooperatives/ Panchayat/ Farmer Producer Organizations (FPO)/ Water User associations (WUA) shall enter into a joint bidding agreement and furnish a copy thereof with the Application.

**NOW IT IS HEREBY AGREED as follows:**

**Definitions and Interpretations**

In this agreement, the capitalized terms shall, unless the context otherwise require, have the Meaning ascribed thereto under the above mentioned RFP.

**1. Joint Bidding Agreement**

The Parties do hereby irrevocably constitute a joint bidding agreement (the “**Joint Bidding Agreement**”) for the purposes of jointly participating in the Bidding Process. The Parties hereby undertake to participate in the Bidding Process in a Project Group as per

FORMAT S7: Power of Attorney of this RFP, only through this Group of farmers/ Cooperatives/ Panchayat/ Farmer Producer Organizations (FPO)/ Water User associations (WUA), and not individually and/ or through any other consortium constituted for this RFP, either directly or indirectly or through any of their Affiliate(s).

**2. Role of the Members**

The Members hereby undertake to perform the roles and responsibilities as described below:

- a) The Member agree to submit bid as Group of farmers/ Cooperatives/ Panchayat/ Farmer Producer Organizations (FPO)/ Water User associations (WUA) for Projects under this RFP.
- b) First Part shall have the power of attorney from all members of Group of farmers/ Cooperatives/ Panchayat/ Farmer Producer Organizations (FPO)/ Water User associations (WUA) for conducting all business for and on behalf of the Group of farmers/ Cooperatives/ Panchayat/ Farmer Producer Organizations (FPO)/ Water User associations (WUA) during the Bidding Process and after its selection as Successful Bidder.
- c) First Part would be responsible and obligated for successful execution of all work awarded to them by MPUVNL and in no circumstances the same shall be the responsibility of Second Part. Pursuant to selection of Successful Bidder as per criteria delineated in the RFP, all obligations as per RFP shall be borne by the First Part.
- d) Second Part shall work in accordance with roles and responsibilities assigned to them by First Part as a part of their internal understanding.
- e) Members of Group of farmers/ Cooperatives/ Panchayat/ Farmer Producer Organizations (FPO)/ Water User associations (WUA) have agreed and documented clearly stated roles and responsibilities between First Part and Second Part for execution of work awarded by MPUVNL.

**3. Termination**

This Agreement shall be effective from the date hereof and shall continue in full force and effect

until the Bid Validity Period of Award and further in accordance with the LOA subsequently issued if bid arrives as successful. However, in case the Group of farmers/ Cooperatives/ Panchayat/ Farmer Producer Organizations (FPO)/ Water User associations (WUA) is either not pre-qualified for the Project or does not get selected for Award of the work, the Agreement will stand terminated in case the Applicant is not pre-qualified.

#### 4. Miscellaneous

This Joint Bidding Agreement shall be governed by laws of India. The Parties acknowledge and accept that this Agreement shall not be amended by Parties without the prior written consent of the MPUVNL. Party of First Part would decide on the representative of joint bidding agreement at MPUVNL.

IN WITNESS WHERE OF THE PARTIES ABOVE NAMED HAVE EXECUTED AND DELIVERED THIS AGREEMENT AS OF THE DATE FIRST ABOVE WRITTEN.

SIGNED, SEALED AND DELIVERED  
For and on behalf of First Part or  
Lead Member by:

SIGNED, SEALED AND DELIVERED  
For and on behalf of Second Part or  
Member:

(Signature)

(Signature)

(Name & Designation)

(Name & Designation)

(Organization Name)

(Organization Name)

(Address)

(Address)

In Presence of:

In Presence of:

Witness -1

Witness -1

Witness -2

Witness -2

**FORMAT S9: Power of attorney in favour of lead member of the joint bidding**

*(To be submitted by each member of joint bidding)*

*(To be stamped as per the stamp act of the state where the document is made, minimum INR 1000 value stamp paper)*

Whereas Madhya Pradesh Urja Vikas Nigam Ltd. (MPUVNL) has invited applications (the “Applications”) by its RFP No: ..... Dated: \_\_\_\_/ \_\_\_\_/ \_\_\_\_ for Selection of RPGs for Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of cumulative CFA equivalent capacity of **1500** MW under feeder solarization component of PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India, for Sale of Solar Power to MPPMCL at the Delivery Point in each substation (hereinafter called “Project”)

Whereas, ....., ....., and ..... (collectively the **Consortium/ JV**) being Members of the Consortium/ JV and having signed a Joint Bidding Agreement dated [●], are interested in submitting a Bid in accordance with the terms and conditions of the Request for Proposal (**RFP**) and the other Bid Documents, and

Whereas, it is necessary for the Members of the Consortium/ JV to designate one of them as the Lead Member with all necessary power and authority to do for and on behalf of the Consortium/ JV, all acts, deeds and things as may be necessary in connection with the Consortium's/ JV's bid for the Unit(s) and its execution.

**NOW, THEREFORE, KNOW ALL MEN BY THESE PRESENTS**

- a) We, ....., having our registered office at ....., and ....., having our registered office at ....., (hereinafter collectively referred to as the **Principals**) do hereby irrevocably designate, nominate, constitute, appoint and authorise ..... having its registered office at ....., being one of the Members of the Consortium/ JV, as the Lead Member and true and lawful attorney of the Consortium/ JV (hereinafter referred to as the **Attorney**). We hereby irrevocably authorize the Attorney (with power to sub-delegate) to conduct all business for and on behalf of the Consortium/

JV, and any one of us, during the Bid Process, including undertaking all acts required for the submission of the Bid in accordance with the terms and conditions of the RFP. Additionally, we also authorise the Lead Member to do any other acts or submit any information and documents related to the above Bid submission, to do on our behalf and on behalf of the Consortium/ JV, all or any of such acts, deeds or things as are necessary or required or incidental to the submission of its Bid for the Unit(s), including but not limited to signing and submission of all applications, undertakings and other documents and writings, participate in bidders and other conferences and respond to queries, if required. In the event the Consortium/ JV is awarded the Project Documents for developing the Units, we authorise the Lead Member to submit information/ documents, sign and execute contracts and undertakings consequent to acceptance of the Bid of the Consortium/ JV in relation to the incorporation of the SPV and generally to represent the Consortium/ JV in all its dealings with RUMSL, and/ or any other Government Agency or any Person, in all matters in connection with or relating to or arising out of the Consortium's/ JV's Bid for the Unit(s) and/ or upon award thereof till incorporation of the SPV.

- b) **AND** hereby agree to ratify and confirm and do hereby ratify and confirm all acts, deeds and things done or caused to be done by our said Attorney pursuant to and in exercise of the powers conferred by this Power of Attorney and that all acts, deeds and things done by our said Attorney in exercise of the powers hereby conferred shall and shall always be deemed to have been done by us/ Consortium/ JV.

IN WITNESS WHEREOF WE THE PRINCIPALS ABOVE NAMED HAVE EXECUTED THIS POWER OF ATTORNEY ON THIS ..... DAY OF ....., 202\_\_

For .....  
(Signature)

.....

Name:  
Designation:  
Organization Name:

For .....  
(Signature)

.....

Name:



Designation:

Organization Name:

(To be executed by authorized signatories of the Members of the Consortium/ JV, except the Lead Member)

Witnesses:

1.

(Signature)

Name:

Designation:

Organization Name:

2.

(Signature)

Name:

Designation:

Organization Name:

(Notarised)

Accepted

.....

(Signature of the authorized signatory of the Lead Member)

(Name, Title and Address of the Attorney)

**Instructions:**

- (1) *The mode of execution of the Power of Attorney should be in accordance with the procedure, if any, laid down by the applicable law and the charter documents of the executant(s) and when it is so required, the same should be under common seal affixed in accordance with the required procedure.*

- (2) *Also, wherever required, the Members should submit for verification the extract of the charter documents and documents such as a board or shareholders' resolution/ power of attorney in favour of the person executing this Power of Attorney for the delegation of power hereunder on behalf of the Member of the Consortium/ JV.*

**SECTION VII: FORMATS TO BE SUBMITTED BY BIDDERS PARTICIPATING IN  
DEVELOPER MODE**

Bidder should be a body corporate incorporated in India under the Companies Act, 1956 or 2013 including any amendment thereto or a Partnership Firm having executed partnership deed and registered as per sections 58 & 59 of the Partnership Act, 1932, as amended or a Limited Liability Partnership Firm (LLP) registered under section 12 of Limited Liability Partnership Act, 2008, as amended or registered Sole Proprietor.

## CHECK LIST FOR BIDDERS

Bidder should be a body corporate incorporated in India under the Companies Act, 1956 or 2013 including any amendment thereto or a Partnership Firm having executed partnership deed and registered as per sections 58 & 59 of the Partnership Act, 1932, as amended or a Limited Liability Partnership Firm (LLP) registered under section 12 of Limited Liability Partnership Act, 2008, as amended or registered Sole Proprietor.

### 1. Checklist for ONLINE submission

Sr. No.	Particular	Format No.	Document uploaded online (Yes/ No)
1.	Covering Letter	D1	
2.	General Particulars of the Bidder	D2	
3.	Shareholding certificate	D3	
4.	Bid Security, if applicable in the form of BG	D4	
5.	Power of attorney for authorized signatory on appropriate value stamp paper	D5	
6.	Financial eligibility criteria	D6	
7.	Relationship with affiliate	D7	
8.	Undertaking from Affiliate of Bidder/ Lead Member/ Member of Consortium/ JV, as applicable	D8	
9.	Consortium/ JV Agreement Format	D9	
10.	Power of attorney in favor of lead member of consortium/ JV	D10	
11.	Declaration	D11	
12.	Contract Management and Maintenance Service Charges	D12	
13.	Proof of Bid Processing Fee Submission	-	

### 2. Checklist for OFFLINE/ HARD copy submission

Sr. No.	Particular	Format No.	Document uploaded online (Yes/ No)
1.	Bid Security, if applicable	D4	

Request for Proposal for Grid Connected SPPs in Madhya Pradesh under feeder solarization component of PM KUSUM - C Scheme

Sr. No.	Particular	Format No.	Document uploaded online (Yes/ No)
	in the form of BG		
2.	Pass-phrases for decrypting Technical Bid and Financial Bid		

Signature of authorized signatory of Bidder

Name:

**FORMAT D1: Covering Letter**

**(The covering letter should be on the Letterhead of the Bidder/ Lead Member of Consortium/ JV)**

**Ref. No.** \_\_\_\_\_ (Please insert RfP No)

**Date:** \_\_\_\_\_

**From:** Insert name and address of Bidder

**Tel.:** \_\_\_\_\_

**E-mail:** \_\_\_\_\_

**To,**

Executive Engineer

Madhya Pradesh Urja Vikas Nigam Limited

(A Government of Madhya Pradesh Enterprise)

Urja Bhawan, Link Road No. 2,

Shivaji Nagar, Bhopal - 462016

Sub: Request for Proposal (RFP) for Selection of renewable power generator (RPG) setting up of Grid connected Solar based Power Plants (SPP) for feeder solarization component under PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India, for sale of power to MPPMCL.

Dear Sir,

- a) We, the undersigned \_\_\_\_\_ [insert name of the Bidder] having read, examined and understood in detail the Request for Proposal (RFP) for Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of cumulative CFA equivalent capacity of approximate **1500** MW under feeder solarization component of PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India for Sale of Solar Power to MPPMCL at the Delivery Point in each substation at various locations in the state of Madhya Pradesh, India, hereby submit our Bid comprising of Financial Bid and Technical Bid. We confirm that neither we nor any of our Affiliate (if applicable) has submitted Bid other than this Bid directly or indirectly in response to the aforesaid RFP.

- b) We give our unconditional acceptance to the RFP attached thereto, issued by

Madhya Pradesh Urja Vikas Nigam Limited, as amended. As a token of our acceptance to the RFP, the same have been initialled by us and enclosed to the Bid. We shall ensure that we execute such RFP as per the provisions of the RFP and provisions of such RFP shall be binding on us.

**c) Bid Security**

We have submitted/ enclosed Bid Security as prescribed in this RfP.

**d) Acceptance**

We hereby unconditionally and irrevocably agree and accept that the decision made by Nodal Agency in respect of any matter regarding or arising out of the RFP shall be binding on us. We hereby expressly waive any and all claims in respect of Bid process.

We confirm that there are no litigations or disputes against us, which materially affect our ability to fulfil our obligations with regard to execution of projects of capacity offered.

**e) Familiarity with Relevant Indian Laws & Regulations**

We confirm that we have studied the provisions of the relevant Indian laws and regulations as required to enable us to submit this Bid and execute the RFP, in the event of our selection as Successful Bidder. We further undertake and agree that all such factors as mentioned in RFP have been fully examined and considered while submitting the Bid.

We undertake that we have satisfied ourselves with the site conditions of the projects and our proposed financial bid takes into consideration the existing site conditions.

**f) Contact Person**

Details of the contact person are furnished as under:

Particulars	Description
Name	
Designation	
Company	
Address	
Phone Nos.	
E-mail address	

We confirm that our bid shall remain valid for a period of one hundred and eighty (180) Days from Bid Deadline. We are enclosing herewith covering letter, processing fee and Bid Security and technical documents as per applicable containing duly signed formats as desired by you in the RFP for your consideration.

Request for Proposal for Grid Connected SPPs in Madhya Pradesh under feeder solarization component of PM KUSUM - C Scheme

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It is confirmed that our Bid is consistent with all the requirements of submission as stated in the RFP and subsequent communications from Nodal Agency. The information submitted in our Bid is complete, strictly as per the requirements stipulated in the RFP and is correct to the best of our knowledge and understanding. We would be solely responsible for any errors or omissions in our Bid. We confirm that all the terms and conditions of our Bid are valid for acceptance for a period of one hundred and eighty days, confirm that we have not taken any deviations, so as to be deemed non-responsive.

Dated the \_\_\_\_\_ day of \_\_\_\_\_ 202\_\_

Thanking you,

We remain,

Yours faithfully,

(Signature of Authorized Person in whose name Power of Attorney/ Board Resolution)

**Name:**

**Designation:**

**Organization Stamp:**



**FORMAT D2: General Particulars of the Bidder**

1.	Name of the Bidder	
2.	Type of Bidders (Company/ Limited Liability Partnership (LLP) firm/ Partnership Firm/ Sole Proprietor)	
3.	Is proof for the bidder eligibility is attached (e.g. certificate of incorporation etc.)	Yes/ No
4.	Address for communication	
5.	E-mail	
6.	Website	
7.	Authorized Contact Person(s) with name, designation, Address and Mobile Phone No., E-mail address/ Fax No. to whom all references shall be made	
8.	Year of Incorporation (as applicable)	
9.	Have the Bidder/ Company debarred/ blacklisted as on bid submission date by any Govt. Dept. / undertaking for undertaking any work	Yes/ No
10.	Reference of any documentation formation attached by the Bidder other than specified in the RFP.	
11.	Whether the Bidder wishes to form a Project Company for execution of work	Yes/ No
12.	Bidder is listed in India (as applicable)	Yes/ No
13.	GSTIN No. (if Applicable)	
14.	PAN No.	
15.	Certificate of Incorporation of Bidder/ Affiliate (as applicable) enclosed	Yes/ No
16.	Partnership deed for LLPF/ Sole Proprietor registration (as applicable) enclosed	Yes/ No

\_\_\_\_\_  
(Signature of Authorized Signatory)

**Name:**

**Designation:**

**Organization Stamp:**

**FORMAT D3: Shareholding certificate for company / partner contribution in a partnership firm (as applicable)**

(To Be Issued by CA/ Statutory Auditor's on letterhead of CA/ Statutory Auditor)

**SHAREHOLDING CERTIFICATE FOR COMPANY**

<b>Name of the Equity holder</b>	<b>Type and Number of shares owned</b>	<b>% of equity holding</b>	<b>Extent of Voting rights</b>

OR

**PARTNER CONTRIBUTION IN A PARTNERSHIP FIRM**

<b>Name of Partner</b>	<b>Capital Contribution (Rs)</b>	<b>% of Ownership in the Firm</b>

\_\_\_\_\_  
(Signature of Authorized Signatory) With Stamp

\_\_\_\_\_  
(Signature of Company Secretary/ Director/ Chartered Accountant)

**FORMAT D4: Bid Security**

(To be stamped on non – judicial stamp paper of minimum INR 1000)

Ref. \_\_\_\_\_ Bank Guarantee No. \_\_\_\_\_

Date: \_\_\_\_\_

In consideration of the [Insert name of the Bidder] (hereinafter referred to as Bidder) submitting the response to RFP for Selection of Renewable Power Generators (RPGs) for Implementation of cumulative approximate \_\_\_\_ MW of Grid Connected Solar PV Systems for Sale of Solar Power to MPPMCL under feeder solarization component of PM KUSUM-C at various locations in the state of Madhya Pradesh, India in response to the RFP No. \_\_\_\_\_ Dated \_\_\_\_\_ issued by Madhya Pradesh Urja Vikas Nigam Limited (hereinafter referred to as Nodal Agency) and Nodal Agency considering such response to the RFP of [insert the name of the Bidder] as per the terms of the RFP, the [insert name & address of bank] hereby agrees unequivocally, irrevocably and unconditionally to pay to Nodal Agency at [Insert Name of the Place from the address of Nodal Agency] forthwith on demand in writing from Nodal Agency or any Officer authorized by it in this behalf, any amount upto and not exceeding Rupees [Insert amount] only, on behalf of M/s. [Insert name of the Bidder].

This guarantee shall be valid and binding on this Bank up to and including [insert date of validity in accordance with this RFP] and shall not be terminable by notice or any change in the constitution of the Bank or the term of Agreement or by any other reasons whatsoever and our liability hereunder shall not be impaired or discharged by any extension of time or variations or alternations made, given, or agreed with or without our knowledge or consent, by or between parties to the respective Agreement.

Our liability under this Guarantee is restricted to Rupees (Rupees \_\_\_\_\_ only). Our Guarantee shall remain in force until [insert date of Bid Validity in accordance with this RFP]. Only Nodal Agency shall be entitled to revoke this Guarantee till \_\_\_\_\_ [Insert date which is 30 days after the date in the preceding sentence].

The Guarantor Bank hereby agrees and acknowledges that only the Nodal Agency shall have a right to revoke this BANK GUARANTEE in part or in full, as it may deem fit.

The Guarantor Bank hereby expressly agrees that it shall not require any proof in addition

to the written demand by Nodal Agency, made in any format, raised at the above mentioned address of the Guarantor Bank, in order to make the said payment to Nodal Agency.

The Guarantor Bank shall make payment hereunder on first demand without restriction or conditions and notwithstanding any objection by [Insert name of the Bidder] and/or any other person. The Guarantor Bank shall not require Nodal Agency to justify the invocation of this BANK GUARANTEE, nor shall the Guarantor Bank have any recourse against Nodal Agency in respect of any payment made hereunder.

This BANK GUARANTEE shall be interpreted in accordance with the laws of India and the courts at Bhopal shall have exclusive jurisdiction. The Guarantor Bank represents that this BANK GUARANTEE has been established in such form and with such content that it is fully enforceable in accordance with its terms as against the Guarantor Bank in the manner provided herein.

This BANK GUARANTEE shall not be affected in any manner by reason of merger, Amalgamation, restructuring or any other change in the constitution of the Guarantor Bank.

This BANK GUARANTEE shall be a primary obligation of the Guarantor Bank and accordingly Nodal Agency shall not be obliged before enforcing this BANK GUARANTEE to take any action in any court or arbitral proceedings against the Bidder, to make any claim against or any demand on the Bidder or to give any notice to the Bidder or to enforce any security held by Nodal Agency or to exercise, levy or enforce any distress, diligence or other process against the Bidder.

Notwithstanding anything contained hereinabove, our liability under this Guarantee is restricted to Rupees \_\_\_\_\_ (Rupees \_\_\_\_\_ only) and it shall remain in force until [Date to be inserted on the basis of this RFP] with an additional claim period of thirty (30) days thereafter.

We are liable to pay the guaranteed amount or any part thereof under this Bank Guarantee only if Nodal Agency serves upon us a written claim or demand.

\_\_\_\_\_  
Power of Attorney No.

For [Insert Name of the Bank]

Banker's Stamp and Full Address

Date, this \_\_\_\_ day of \_\_\_\_ 20\_\_

**FORMAT D5: Power of Attorney**

*(To be stamped on non – judicial stamp paper of minimum INR 1000)*

- a) Power of Attorney to be provided by the Bidder in favour of its representative as evidence of authorized signatory's authority.
- b) Know all men by these presents, we (name and address of the registered office of the Bidder as applicable) do hereby constitute, appoint and authorize Mr./ Ms. (name & residential address) who is presently employed with us and holding the position of \_\_\_\_\_ as our true and lawful attorney, to do in our name and on our behalf, all such acts, deeds and things necessary in connection with or incidental to submission of our Bid for Selection of RPG for Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of cumulative CFA equivalent capacity of **1500** MW under feeder solarization component of PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India for Sale of Solar Power to MPPMCL at the delivery point in each substation at various locations in the state of Madhya Pradesh, India in response to the RFP No..... Dated: \_\_\_\_\_ issued by Nodal Agency including signing and submission of the Bid and all other documents related to the Bid, including but not limited to undertakings, letters, certificates, acceptances, clarifications, guarantees or any other document which the Nodal Agency may require us to submit. The aforesaid Attorney is further authorized for making representations to the Madhya Pradesh Urja Vikas Nigam Limited and providing information / responses to Nodal Agency representing us in all matters before Nodal Agency and generally dealing with Nodal Agency in all matters in connection with Bid till the completion of the bidding process as per the terms of the above mentioned in RFP.
- c) We hereby agree to ratify all acts, deeds and things done by our said attorney pursuant to this Power of Attorney and that all acts, deeds and things done by our aforesaid attorney shall be binding on us and shall always be deemed to have been done by us.
- d) All the terms used herein but not defined shall have the meaning ascribed to such terms under the RFP.

\_\_\_\_\_  
Signed by the within named

(Insert the name of the executant's/executant's company)

through the hand of

Request for Proposal for Grid Connected SPPs in Madhya Pradesh under feeder solarization component of PM KUSUM - C Scheme

---

Mr \_\_\_\_\_

duly authorized by the Board to issue such Power of Attorney

Dated this \_\_\_\_\_ day of \_\_\_\_\_

Accepted

\_\_\_\_\_

Signature of Attorney

Name:

Designation:

Address of the Attorney:

Attested

\_\_\_\_\_

(Signature of the executant)

Name:

Designation:

Address of the executant:

\_\_\_\_\_

Signature and stamp of Notary of the place of execution

Common seal of \_\_\_\_\_ has been affixed in my/ our presence pursuant to Board of Director's Resolution dated \_\_\_\_\_

WITNESS

\_\_\_\_\_

(Signature)

Name \_\_\_\_\_

Designation \_\_\_\_\_

Name of Organization (Stamp) \_\_\_\_\_

(Signature)

Name \_\_\_\_\_

Designation \_\_\_\_\_

Name of Organization (Stamp) \_\_\_\_\_

**FORMAT D6: Financial Eligibility Criteria Requirement**

(To be submitted on the CA/ Statutory Auditor's Letterhead, duly sealed and signed by CA/  
Statutory Auditor)

To,

Executive Engineer

Madhya Pradesh Urja Vikas Nigam Limited

(A Government of Madhya Pradesh Enterprise)

Urja Bhawan, Link Road No. 2,

Shivaji Nagar, Bhopal - 462016

Ref.: RFP No. \_\_\_\_\_ dated     /     /     and corrigenda/ addenda/ amendments thereof

Dear Sir,

Sub: Financial eligibility fulfilment in response to above referred RFP

We, M/ s \_\_\_\_\_ (*Mentioned the Name of Chartered Auditor*), Chartered Accountant (CA) and authorized by below mentioned entities to certify their net-worth or MAAT as applicable according to the clause 3.14.5, do hereby certify and state the following:

Based on latest audited annual accounts, net-worth (latest of FY24 or FY25) and MAAT (any 2 years among FY22, FY23 and FY24 or FY23, FY24 and FY25) of below mentioned entities are as mentioned in table below:

Name of Entity being evaluated (Lead Member in case of Consortium/ JV)	Name of Affiliate in case its Financial Strength being used	Financial Year	Financial Parameters	
			Net worth (INR Lakh)	Turn over (in Cr)

Consortium Member (provide details if applicable; else, leave blank)

Name of Consortium Partner	Financial Year	Financial Parameters	
		Net worth (INR Lakh)	Turn over (in Cr)

Deleted.

Note:

1. As may be required by MPUVNL during bid evaluation or subsequently, Bidder shall provide audited financial statements (balance sheets, including all related notes, and income statements) for the years utilized to meet eligibility.
2. Net worth and MAAT will be calculated as per methodology under the clause 3.14.5 of the RfP and its amendments/ corrigenda etc.
3. Audited consolidated annual accounts of the Bidder may also be used for the purpose of financial criteria provided the Bidder has at least 26% equity and control in each company whose accounts are merged in the audited consolidated accounts and provided further that the financial capability of such companies (of which accounts are being merged in the consolidated accounts) shall not be considered again for the purpose of evaluation of the Bid.

Name: \_\_\_\_\_

Registration No.: \_\_\_\_\_

Registered office: \_\_\_\_\_

Date: \_\_\_\_\_

Place: \_\_\_\_\_

Signature and stamp (on each page) of Chartered Accountant/ Statutory Auditors of Bidder



**FORMAT D7: Format for certificate of relationship of affiliate with the bidder**  
(CA/ statutory auditor's certificate to be submitted by Bidder/ Lead Member on behalf of self, as applicable)

To,

Executive Engineer,  
Madhya Pradesh Urja Vikas Nigam Limited  
Urja Bhawan, Link Road No. 2,  
Shivaji Nagar, Bhopal - 462016

Ref.: RFP no. \_\_\_\_\_ and corrigenda/ addenda/ amendments thereof

Dear Sir,

Sub: Relationship of lead member with affiliate bidder

We hereby certify that M/ s \_\_\_\_\_, M/ s \_\_\_\_\_, M/ s \_\_\_\_\_, are the Affiliate(s) of the Bidder as per the definition of Affiliate as provided in this RFP and based on details of equity holding as on seven (7) Days prior to the Bid Deadline.

The details of equity holding of the Affiliate / Bidder or vice versa as on seven (7) Days prior to the Bid Deadline are given as below:

a) In case of Bidder being Company/ LLP/ Partnership Firm/ Sole – Proprietor:

Name of Company/ LLP/ Partnership Firm/ Sole – Proprietor	Name of the Affiliate	Details of Equity Holding

OR

b) In case of Bidder being member of the Consortium/ JV

Name of Member of Consortium/ JV	Name of the Affiliate	Details of Equity Holding

Yours Faithfully

\_\_\_\_\_  
Signature of Statutory Auditor

**Name:**

**Designation:**

**Organization Stamp:**

**FORMAT D8: Undertaking Form**

Undertaking from Affiliate of Bidder/ Lead Member/ Member of Consortium/  
JV, as applicable

Name: \_\_\_\_\_

Full Address: \_\_\_\_\_

Telephone No.: \_\_\_\_\_

E-mail address: \_\_\_\_\_

To,

\_\_\_\_\_

Dear Sir,

- a) We refer to the RFP No: ..... Dated: \_\_\_\_/ \_\_\_\_/ \_\_\_\_ for Request for Proposal (RFP) for Selection of RPG for Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of cumulative CFA equivalent capacity of approximately **1500** MW under feeder solarization component of PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India for Sale of Solar Power to MPPMCL at the delivery point in each substation.
- b) We have carefully read and examined in detail the RFP regarding submission of an undertaking, as per the prescribed Format of the RFP.
- c) We confirm that M/ s \_\_\_\_\_ (Insert name of Bidder) is our Affiliate on the following basis:
- d) that M/ s (Insert name of Bidder) has been authorized by us to use our financial capability for meeting the Financial Eligibility as specified in the RFP referred to above in terms of Net worth and/ or MAAT.
- e) We have also noted the amount of the Performance Guarantees and Bid Security required to be submitted as per the RFP by (Insert the name of the Bidder) in the event of it being selected as the SPD.
- f) In view of the above, we hereby undertake to you and confirm that in the event of failure of (Insert name of the Bidder) to submit the Performance Guarantees in full or in part at any stage and Bid Security, as specified in the RFP, we shall

submit the Performance Guarantee and Bid Security not submitted by (Insert name of the Affiliate/ Consortium/ JV member of Bidder)".

- g) We also undertake that we shall maintain our relationship with M/s \_\_\_\_\_ (insert name of bidder) so that it is in accordance with principles of 'Control' and 'Affiliate' laid out in RfP No. \_\_\_\_\_ Dated: / / . **(in case of affiliate)**
- h) We have attached hereto certified true copy of the Board Resolution, whereby the Board of Directors of our Company has approved issue of this Undertaking by the Company.
- i) All the terms used herein but not defined, shall have the meaning as ascribed to the said terms under the RFP.

\_\_\_\_\_

Signature of Chief Executive Officer/ Managing Director/ Authorized Signatory

Common seal of has been affixed in my/ our presence pursuant to Board of Director's Resolution dated.

Name:

Designation:

Name of Organization:

WITNESS

\_\_\_\_\_

(Signature)

Name:

Designation:

Name of Organization:

\_\_\_\_\_

(Signature)

Name:

Designation:

Name of Organization:

**FORMAT D9: Format for Consortium/ JV Agreement for Participation  
In Request for Proposal (RFP)**

**for**

**Selection of Renewable Power Generator (RPG)**

**for**

Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of cumulative CFA equivalent capacity of approximately **1500** MW under feeder solarization component of PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India, for Sale of Solar Power to MPPMCL at the delivery point at concerned substations in Madhya Pradesh, India.

*(To be stamped as per the stamp act of the state where the document is made, on minimum INR 1000 value non judicial stamp paper)*

THIS AGREEMENT is entered into on this \_\_\_\_ day of \_\_\_\_\_ 202\_\_.

**AMONGST**

{\_\_\_\_\_, party on **First Part** of consortium/ JV}  
and having its registered its registered office at\_\_\_\_\_  
(Hereinafter referred to as the **“First Part”** or **“Lead Member”** which expression shall, unless repugnant to the context include its successors and permitted assigns)

**AND**

\_\_\_\_\_ Having its registered office at\_\_\_\_\_  
\_\_\_\_\_. (Herei  
nafter referred to as the **“Second Part”** or **“Member”** which expression shall, unless repugnant to the context include its successors and permitted assigns)

The above-mentioned parties of the First and Second are collectively referred to as the **“Parties”** and each is individually referred as a **“Party”**

**WHERE AS,**

i. Madhya Pradesh Urja Vikas Nigam Ltd. (hereinafter referred to as the

“**MPUVNL**” which expression shall, unless repugnant to the context or meaning thereof, include its administrators, successors and assigns) has invited applications (the “**Applications**”) by its RFP No: ..... Dated: \_\_\_\_\_ for award of the rate contract/ work under “Selection of solar power generator (SPG) for Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of cumulative CFA equivalent capacity of approximate **1500 MW** for Sale of Solar Power to MPPMCL at the delivery point in each substation at various locations in the state of Madhya Pradesh, India (hereinafter called “**Project (s)**”) and Selection of RPG for the same.

ii. The Parties are interested in jointly bidding for the Project as members of consortium/ JV in accordance with the terms and conditions of the RFP document and other bid documents in respect of the Project, and

iii. It is a necessary condition under the RFP document that the members of the Consortium/ JV shall enter into a Consortium/ JV agreement and furnish a copy thereof with the Application.

**NOW IT IS HEREBY AGREED as follows:**

**Definitions and Interpretations**

In this agreement, the capitalized terms shall, unless the context otherwise require, have the

Meaning ascribed thereto under the above mentioned RFP.

**1. Consortium/ Joint Venture**

The Parties do hereby irrevocably constitute a consortium/ joint venture (the “**Consortium/ JV**”) for the purposes of jointly participating in the Bidding Process. The Parties hereby undertake to participate in the Bidding Process in a Project Group as per Table 1 of this RFP, only through this Consortium/ JV and not individually and/ or through any other consortium/ JV constituted for this RFP, either directly or indirectly or through any of their Affiliate(s).

Parties do hereby irrevocably state and affirm that if consortium/ JV has referred financial credentials of its Affiliate to meet the Financial Eligibility criteria, then the same relationship with the Affiliate by the Parties shall continue at least for the period of First Operational Year (equity lock-in period).

## 2. Role of the Parties

The Parties hereby undertake to perform the roles and responsibilities as described below:

- a) The parties agree to submit bid as Consortium/ JV for Project(s)/ Substation(s) under the RFP.
- b) First Part or Second Part or both shall be evaluated for qualification against technical eligibility criteria as per RFP.
- c) First Part shall have the power of attorney from all Parties for conducting all business for and on behalf of the Consortium/ JV during the Bidding Process and after its selection as Successful Bidder.
- d) First Part would be responsible and obligated for successful execution of all work awarded to them by MPUVNL and in no circumstances the same shall be the responsibility of Second Part. Pursuant to selection of Successful Bidder as per criteria delineated in the RFP, all obligations as per RFP shall be borne by the First Part.
- e) Second Part and Third part shall work in accordance with roles and responsibilities assigned to them by First Part as a part of their internal understanding.
- f) Parties have agreed and documented clearly stated roles and responsibilities between First Part, Second Part and Third Part for execution of work awarded by MPUVNL.
- g) Subject to the terms of this agreement, the share of each Member of the Consortium/ JV in the “issued equity share capital” shall be in the following proportion: (if applicable)

Name of Member	Proposed % Equity holding
Lead Member	..... (At least 51%)
Member	

## 3. Termination

This Agreement shall be effective from the date hereof and shall continue in full force and effect until the Bid Validity Period of Award and further in accordance with the LOA subsequently issued if bid arrives as successful. However, in case the Consortium/ JV is either not pre-qualified for the Project or does not get selected for Award of the work, the Agreement will stand terminated in case the

Applicant is not pre-qualified.

#### **4. Miscellaneous**

This Joint Bidding Agreement shall be governed by laws of India. The Parties acknowledge and accept that this Agreement shall not be amended by Parties without the prior written consent of the MPUVNL. Party of First Part would decide on the representative of Consortium/ JV at MPUVNL.

IN WITNESS WHERE OF THE PARTIES ABOVE NAMED HAVE EXECUTED AND DELIVERED THIS AGREEMENT AS OF THE DATE FIRST ABOVE WRITTEN.

SIGNED, SEALED AND  
DELIVERED For and on behalf of  
Lead Member by:  
(Signature)  
(Name & Designation)  
Organization Name  
(Address)  
In Presence of:  
Witness -1  
  
Witness -2

SIGNED, SEALED AND DELIVERED  
For and on behalf of Second Part:  
  
(Signature)  
(Name & Designation)  
Organization Name  
(Address)  
In Presence of:  
Witness -1  
  
Witness -2

**FORMAT D10: Power of attorney in favour of lead member of the consortium/ JV**

*(to be submitted by each member of the Consortium/ JV)*

*(To be stamped as per the stamp act of the state where the document is made, minimum INR 1000 value stamp paper)*

Whereas Madhya Pradesh Urja Vikas Nigam Ltd. (MPUVNL) has invited applications (the "Applications") by its RFP No: ..... Dated: \_\_\_\_/ \_\_\_\_/ \_\_\_\_ for Selection of RPGs for Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of aggregate capacity of \_\_\_\_ MW under feeder solarization component of PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India, for Sale of Solar Power to MPPMCL at the Delivery Point in each substation (hereinafter called "Project")

Whereas, ....., ....., and ..... (collectively the **Consortium/ JV**) being Members of the Consortium/ JV and having signed a Joint Bidding Agreement dated [●], are interested in submitting a Bid in accordance with the terms and conditions of the Request for Proposal (**RFP**) and the other Bid Documents, and

Whereas, it is necessary for the Members of the Consortium/ JV to designate one of them as the Lead Member with all necessary power and authority to do for and on behalf of the Consortium/ JV, all acts, deeds and things as may be necessary in connection with the Consortium's/ JV's bid for the Unit(s) and its execution.

**NOW, THEREFORE, KNOW ALL MEN BY THESE PRESENTS**

- c) We, ....., having our registered office at ....., and ....., having our registered office at ....., (hereinafter collectively referred to as the **Principals**) do hereby irrevocably designate, nominate, constitute, appoint and authorise ..... having its registered office at ....., being one of the Members of the Consortium/ JV, as the Lead Member and true and lawful attorney of the Consortium/ JV (hereinafter referred to as the **Attorney**). We hereby irrevocably authorize the Attorney (with power to sub-delegate) to conduct all business for and on behalf of the Consortium/ JV, and any one of us, during the Bid



Process, including undertaking all acts required for the submission of the Bid in accordance with the terms and conditions of the RFP. Additionally, we also authorise the Lead Member to do any other acts or submit any information and documents related to the above Bid submission, to do on our behalf and on behalf of the Consortium/ JV, all or any of such acts, deeds or things as are necessary or required or incidental to the submission of its Bid for the Unit(s), including but not limited to signing and submission of all applications, undertakings and other documents and writings, participate in bidders and other conferences and respond to queries, if required. In the event the Consortium/ JV is awarded the Project Documents for developing the Units, we authorise the Lead Member to submit information/ documents, sign and execute contracts and undertakings consequent to acceptance of the Bid of the Consortium/ JV in relation to the incorporation of the SPV and generally to represent the Consortium/ JV in all its dealings with RUMSL, and/ or any other Government Agency or any Person, in all matters in connection with or relating to or arising out of the Consortium's/ JV's Bid for the Unit(s) and/ or upon award thereof till incorporation of the SPV.

- d) **AND** hereby agree to ratify and confirm and do hereby ratify and confirm all acts, deeds and things done or caused to be done by our said Attorney pursuant to and in exercise of the powers conferred by this Power of Attorney and that all acts, deeds and things done by our said Attorney in exercise of the powers hereby conferred shall and shall always be deemed to have been done by us/ Consortium/ JV.

IN WITNESS WHEREOF WE THE PRINCIPALS ABOVE NAMED HAVE EXECUTED THIS POWER OF ATTORNEY ON THIS ..... DAY OF ....., 202\_\_

For .....

(Signature)

.....

Name:

Designation:

Organization Name:

For .....

(Signature)

.....

Name:

Designation:

Organization Name:

(To be executed by authorized signatories of the Members of the Consortium/ JV, except the Lead Member)

Witnesses:

1.

(Signature)

Name:

Designation:

Organization Name:

2.

(Signature)

Name:

Designation:

Organization Name:

(Notarised)

Accepted

.....

(Signature of the authorized signatory of the Lead Member)

(Name, Title and Address of the Attorney)

Instructions:

(3) *The mode of execution of the Power of Attorney should be in accordance with the procedure, if any, laid down by the applicable law and the charter documents of the executant(s) and when it is so required, the same should be under common seal affixed in accordance with the required procedure.*

*(4) Also, wherever required, the Members should submit for verification the extract of the charter documents and documents such as a board or shareholders' resolution/ power of attorney in favour of the person executing this Power of Attorney for the delegation of power hereunder on behalf of the Member of the Consortium/ JV.*

### **FORMAT D11: Declaration**

(To be submitted on Original Letterhead of Bidder/ Lead Member of Consortium/ JV)

I/ We have carefully read and understood the Terms and Conditions of the RFP and agree to abide by them. I/ We accept and undertake, the following statements that,

1. I/ We have carefully read and understood terms and conditions of above referenced RFP (RfP no. \_\_\_\_\_/\_\_\_\_ dated \_\_/\_\_/\_\_\_\_) and associated PPA and their corrigenda/ addenda/ amendments issued from time to time before bid submission end date (collectively called as “RfP Documents”). In case, at any stage of bidding process or after award of work, our bid or award of work is found non-compliant with any provisions of RfP Documents or any of our undertakings/ declarations are found wrong/ unsolicited/ misrepresented/ unfulfilled, we unconditionally declare and undertake to accept, without any responsibility/ accountability/ implications/ liabilities/ obligations on anyone other than us, decision of competent authority as appropriate, including rejection of our bid and/ or cancellation of award of work, without prejudice to any other rights that competent authority may be entitled to exercise as per law or under provisions of RfP documents
2. I/ We have not been Blacklisted or debarred or otherwise as on bid submission date for any Supply of Goods / Services / Works by any Ministry / Department / PSU of Central Government / Any of the State Government(s), anytime / anywhere in the Country or have not failed to execute any previous work of MPUVNL.
3. I/ We solemnly undertake that, the responsibility of execution of the Work as per the terms and conditions of the RFP/Contract Agreement shall be entirely ours.
4. Except as required by nodal agency, we have not taken support from any of the independent Consultant or Consulting Agency who is associated with Nodal Agency in any form while preparing RFP.
5. I/ We are aware that, I/ we should ensure compliance to the MNRE's order/ rule/ guidelines pertaining to KUSUM-C, including but not limited to the following:
  - a) Requirement of indigenously manufactured module, cells and BOS: System specifications and quality control of projects under KUSUM-C (FLS) would be in accordance with Para 6.4.6 of MNRE's Comprehensive Guidelines for Implementation of PM KUSUM Scheme, dated 17.01.2024, and its amendments/ modifications as relevant and applicable. This requirement would be applicable for the portion of Project Capacity eligible for Central Financial Assistance (CFA).
  - b) Requirement of Approved List of Models and Manufacturers (ALMM): Bidders/ Successful Bidders would comply ALMM requirement as per ALMM order by Ministry of Power dated 09.12.2024 and it would be applicable on full Project Capacity.

If this Declaration is found to be incorrect or if any RFP Condition is found violated by us, then without prejudice ..... (*Insert Bidder's Name*) including our Members, Parent, Ultimate Parent, and our Affiliates shall be suspended/ debarred/ blacklisted from participating in upcoming tenders issued by any department of MP State Government for a

period of 5 years from the date of default as notified by MP Urja Vikas Nigam Limited. and the Proposal to the Extent of Acceptance / anytime during Execution of Assignment may be cancelled.

(Signature of Authorized Signatory)

Name (in Block Letter):

Designation & Organization Name (in Block Letter):

**Section IX: Formats for Submitting Performance Bank Guarantee (PBG) By  
Successful Bidders**

**Format for performance bank guarantee**

*(To be stamped on non – judicial stamp paper as per the stamp act of the state where the document is made)*

- a) In consideration of the *[Insert name of the Bidder]* (hereinafter referred to as (Bidder) submitting the response to Request for Proposal (RFP) for Selection of RPGs for Design, Engineering, Supply, Installation, Testing and Commissioning including construction of bay and related switchgear at sub-station along with Comprehensive Operation & Maintenance (for twenty-five (25) Operational Years of Grid Connected Solar based Power Plants (SPPs) of aggregate capacity of approximate \_\_\_\_ MW, under feeder solarization component of PM KUSUM-C scheme at various locations in the state of Madhya Pradesh, India, for Sale of Solar Power to MPPMCL at the delivery point in concerned \_\_\_\_ kV substation in Madhya Pradesh, India in response to the RFP dated \_\_\_\_\_ issued by Madhya Pradesh Urja Vikas Nigam Limited (hereinafter referred to as Nodal Agency) and Nodal Agency considering such response to the RFP of *[insert the name of the RPG]* (which expression shall unless repugnant to the context or meaning thereof include its executers, administrators, successors and assignees) and selecting the Project of the RPG and issuing LOA No. \_\_\_\_ to (Insert Name of RPG) as per terms of RFP and the same having been accepted by the selected Project Company, M/ s {a Special Purpose Vehicle (SPV) formed for this purpose}, if applicable]. As per the terms of the RFP, the *[insert name & address of bank]* hereby agrees unequivocally, irrevocably and unconditionally to pay to Nodal Agency at *[Insert Name of the Place from the address of the Nodal Agency]* forthwith on demand in writing from Nodal Agency, or any officer authorized by it in this behalf, any amount upto and not exceeding Rupees \_\_\_\_\_ [Rupees \_\_\_\_\_ (Total Value in words)] only, on behalf of M/ s *[Insert name of the SPD / Project Company]*. This guarantee shall be valid and binding on this Bank up to and including \_\_\_\_\_ and shall not be terminable by notice or any change in the constitution of the Bank or the term of Agreement or by any other reasons whatsoever and our liability hereunder shall not be impaired or discharged by any extension of time or variations or alternations made, given, or agreed with or without our knowledge or consent, by or between parties to the respective Agreement.
- b) Our liability under this Guarantee is restricted to Rupees \_\_\_\_\_ (both in numbers and words)

- c) Our Guarantee shall remain in force until Nodal Agency shall be entitled to invoke this Guarantee till \_\_\_\_\_. The Guarantor Bank hereby agrees and acknowledges that Nodal Agency shall have a right to invoke this BANK GUARANTEE in part or in full, as it may deem fit.
- d) The Guarantor Bank hereby expressly agrees that it shall not require any proof in addition to the written demand by Nodal Agency, made in any format, raised at the above mentioned address of the Guarantor Bank, in order to make the said payment to Nodal Agency.
- e) The Guarantor Bank shall make payment hereunder on first demand without restriction or conditions and notwithstanding any objection by [Insert name of the SPD. The Guarantor Bank shall not require Nodal Agency to justify the invocation of this BANK GUARANTEE, nor shall the Guarantor Bank have any recourse against Nodal Agency in respect of any payment made hereunder.
- f) This BANK GUARANTEE shall be interpreted in accordance with the laws of India and the courts at Bhopal shall have exclusive jurisdiction.
- g) The Guarantor Bank represents that this BANK GUARANTEE has been established in such form and with such content that it is fully enforceable in accordance with its terms as against the Guarantor Bank in the manner provided herein.
- h) This BANK GUARANTEE shall not be affected in any manner by reason of merger, amalgamation, restructuring or any other change in the constitution of the Guarantor Bank.
- i) This BANK GUARANTEE shall be a primary obligation of the Guarantor Bank and accordingly Nodal Agency shall not be obliged before enforcing this BANK GUARANTEE to take any action in any court or arbitral proceedings against the selected RPG / Project Company, to make any claim against or any demand on the RPG or to give any notice to the RPG / Project Company or to enforce any security held by Nodal Agency or to exercise, levy or enforce any distress, diligence or other process against the RPG / Project Company.

Notwithstanding anything contained hereinabove, our liability under this Guarantee is restricted to Rupees \_\_\_\_\_ (Rupees \_\_\_\_\_ only) and it shall remain in force until we are liable to pay the guaranteed amount or any part thereof under this Bank Guarantee only if Nodal Agency serves upon us a written claim or demand.

\_\_\_\_\_  
Signature

Name

Power of Attorney No.

For

[Insert Name of the Bank]

Banker's Stamp and Full Address.

Dated this \_\_\_\_ day of \_\_\_\_, 20\_\_

Witness:

\_\_\_\_\_

Signature

Name and Address\_\_\_\_\_

\_\_\_\_\_

Signature

Name and Address\_\_\_\_\_



**FORMAT 2: Check list for PBG**

S. No.	Details of checks	YES/ NO
1	Is the Bank Guarantee on non-judicial Stamp paper of appropriate value, as per applicable Stamp Act of the place of execution	
2	Whether date, purpose of purchase of stamp paper and name of the purchaser are indicated on the back of Stamp paper under the Signature of Stamp vendor? (The date of purchase of stamp paper should be not later than the date of execution of Bank Guarantee and the stamp paper should be purchased either in the name of the executing Bank or the party on whose behalf the Bank Guarantee has been issued. Also the Stamp Paper should not be older than six (6) Months from the date of execution of Bank Guarantee).	
3	Has the executing Officer of Bank Guarantee indicated his name, designation and Power of Attorney No./ Signing Power no. on the Bank Guarantee?	
4	Is each page of Bank Guarantee duly signed / initialled by executant and whether stamp of Bank is affixed thereon? Whether the last page is signed with full particulars including two witnesses under seal of Bank as required in the prescribed Performa?	
5	Does the Bank Guarantees compare verbatim with the Performa prescribed in the Bid Documents?	
6	Are the factual details such as Bid Document No. / Specification No., / LOA No. (if applicable) / Amount of Bank Guarantee and Validity of Bank Guarantee correctly mentioned in the Bank Guarantee	
7	Whether overwriting/ cutting if any on the Bank Guarantee have been properly authenticated under signature & seal of executant?	

**ANNEXURE -1 – List of Substations along with estimated project  
Capacity**

The Project Capacity against each substation mentioned in this annexure is indicative.  
However, no change in Delivery Point would be allowed due to such revision.

## **Central DISCOM**

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
1	Bhopal City	SAHARA	23.1485091	77.4944834	5.00	0.66	11 kV
2	Bhopal O&M	JONTALA	22.78306	78.00102	5.00	1.86	11 kV
3	Bhopal O&M	Itawakhurd	22.8125	77.0458	5.00	1.30	11 kV
4	Narmadapuram	GURANJGHAT	22°22'0.59668"	77°21'25.25872"	5.00	4.01	11 kV
5	Narmadapuram	CHOUTLAI	22°36'37.9"	77°30'56.4"	5.00	3.32	11 kV
6	Narmadapuram	TALNAGARI	22°42'39.18218"	77°36'29.7284"	8.15	5.79	11 kV
7	Narmadapuram	BICHHUA	22.6290249,	77.943632	5.00	2.94	11 kV
8	Narmadapuram	CHOUNKI PURA	22.40487	77.7845018	5.00	3.09	11 kV
9	Narmadapuram	Chilachone	22.8232035	77.8161953	10.00	4.97	11 kV
10	Narmadapuram	Malini	22.645986	78.052136	10.00	2.53	11 kV
11	Narmadapuram	Chorahat	22.7588803	78.0337504	10.00	7.40	11 kV
12	Narmadapuram	Sangakheda patni	22.788049	78.032881	5.00	1.31	11 kV
13	Narmadapuram	Chargaon	22.6569754	78.2258803	5.00	5.00	11 kV
14	Narmadapuram	Sodra	22.8162995,	78.1953853	8.15	4.52	11 kV
15	Narmadapuram	Karanpur	22.715379	78.222395	5.00	4.82	11 kV
16	Narmadapuram	Bachhwada	22.8052195	77.9767051	10.00	0.96	11 kV
17	Narmadapuram	Semritala	22.89817	78.39368	5.00	2.36	11 kV
18	Narmadapuram	Kanwar	22.78068	78.45206	10.00	5.81	11 kV
19	Narmadapuram	Posera	22.8211	78.4137	5.00	2.69	11 kV
20	Narmadapuram	Shankhni	22.84935	78.40805	5.00	4.72	11 kV
21	Narmadapuram	Pipariya(T)	22.76238	78.3434	5.00	5.00	11 kV
22	Narmadapuram	Khairikalan	22.68894	78.31712	8.15	5.79	11 kV
23	Narmadapuram	Tutadehalwada	22.73093	78.42046	10.00	7.22	11 kV
24	Narmadapuram	Piparpani	22.75143	78.59635	10.00	5.87	11 kV
25	Narmadapuram	Dehalwada	22.75997	78.57044	10.00	8.05	11 kV

## Request for Proposal for Grid Connected SPPs in Madhya Pradesh under feeder solarization component of PM KUSUM - C Scheme

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
26	Narmadapuram	Dharpura	22.86157	78.44325	5.00	0.56	11 kV
27	Narmadapuram	New Bankhedi	22.77109	78.52658	5.00	4.04	11 kV
28	Narmadapuram	Fajju Salaiya	22.9275	78.55862	10.00	4.34	11 kV
29	Narmadapuram	Malkajra	22.91172	78.44753	10.00	5.17	11 kV
30	Narmadapuram	Machhera Kalan	22.81756	78.54778	5.00	2.91	11 kV
31	Narmadapuram	Kursidhana	22.77774	78.492	5.00	2.83	11 kV
32	Narmadapuram	Nandna Paraswada	22.8569	78.56738	5.00	2.09	11 kV
33	Narmadapuram	Surelakala	22.815239	78.321322	5.00	3.27	11 kV
34	Gwalior O&M	Rairu	26.304492	78.118556	5.00	0.97	11 kV
35	Gwalior O&M	Berja	25.926421	78.174862	3.15	0.89	11 kV
36	Gwalior O&M	Aron	25.955735	77.927743	3.15	2.14	11 kV
37	Gwalior O&M	Ghatigaon	25.884903	78.367135	6.30	1.89	11 kV
38	Gwalior O&M	Par	26.042155	78.037436	8.15	4.02	11 kV
39	Gwalior O&M	Mohana	25.89439	77.776373	5.00	3.61	11 kV
40	Gwalior O&M	Dwarikapuri	25.926421	78.174862	5.00	0.30	11 kV
41	Gwalior O&M	Jakhara	26.237522	78.460158	3.15	1.91	11 kV
42	Gwalior O&M	Bahadurpur	25.926421	78.174862	5.00	0.84	11 kV
43	Gwalior O&M	Nougaon	26.132545	78.131482	5.00	1.73	11 kV
44	Gwalior O&M	Ganeshpura	25.884903	78.367135	5.00	3.33	11 kV
45	Gwalior O&M	BILLUA	25.926421	78.174862	5.00	0.54	11 kV
46	Gwalior O&M	SHYAMPUR	25.81928	78.060705	5.00	1.57	11 kV
47	Gwalior O&M	CHARKHA	25.884903	78.367135	5.00	0.69	11 kV
48	Gwalior O&M	NIVI	25.8435945	78.1703614	5.00	0.23	11 kV
49	Gwalior O&M	DONGARPUR	26.066622	78.455619	5.00	1.21	11 kV
50	Gwalior O&M	KARRA	25.847452	78.361585	5.00	0.64	11 kV
51	Ashoknagar	Derkha	24.7789	77.693732	5.00	1.91	11 kV
52	Ashoknagar	Ratikheda	24.600173	77.66692	5.00	2.04	11 kV
53	Ashoknagar	Bhaisarwas	24.551936	77.658591	5.00	1.97	11 kV

## Request for Proposal for Grid Connected SPPs in Madhya Pradesh under feeder solarization component of PM KUSUM - C Scheme

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54	Ashoknagar	Jheela	24.5525	77.519	5.00	0.74	11 kV
55	Ashoknagar	Jalapur	24.517406	77.538284	5.00	0.64	11 kV
56	Ashoknagar	Mathner	24.5215	77.591271	5.00	0.76	11 kV
57	Ashoknagar	SOBAT	24.456663	77.504065	5.00	0.06	11 kV
58	Ashoknagar	Barkheda nai	24.746228	77.585247	5.00	1.49	11 kV
59	Ashoknagar	Chhailai	24.928866	77.6707	5.00	1.34	11 kV
60	Ashoknagar	Kalabag	24.8669	77.35662	5.00	1.55	11 kV
61	Ashoknagar	Rusallabujurg	24.855513	77.8967	5.00	0.78	11 kV
62	Ashoknagar	Ajleswar	24.8121	77.43101	3.15	0.68	11 kV
63	Ashoknagar	Toomen	24.8589291	77.6153572	5.00	3.41	11 kV
64	Ashoknagar	Khajuriya kala	24.4416701	77.741148	5.00	1.95	11 kV
65	Ashoknagar	Dhakoini	24.44874	77.7318	5.00	1.51	11 kV
66	Ashoknagar	Thoobanji	24.40066	77.741148	3.15	2.10	11 kV
67	Ashoknagar	Bilehru	24.3195	78.0823	5.00	3.48	11 kV
68	Ashoknagar	Sehrai	24.565	77.971	3.15	3.15	11 kV
		Bamory					
69	Ashoknagar	Chanderi	24.578708	78.01981	5.00	0.29	11 kV
70	Ashoknagar	Bhatpura	24.434703	78.096883	5.00	1.33	11 kV
71	Ashoknagar	Barkhana	24.466753	78.251779	3.15	0.26	11 kV
72	Ashoknagar	Kukretha	24.6	77.8967	5.00	0.69	11 kV
73	Ashoknagar	Malawani	24.499294	77.837463	5.00	0.93	11 kV
74	Sheopur	Jaida	25.673232	76.67899	5.00	0.52	11 kV
75	Sheopur	LAAT	25.558459	76.712988	5.00	0.47	11 kV
76	Sheopur	NAYAGAON	25.5678	76.74826	5.00	1.09	11 kV
77	Sheopur	Dhondpur	25.616704	76.68903	5.00	0.43	11 kV
78	Sheopur	Mau jaanpura	25.616659	76.689252	5.00	0.53	11 kV
79	Sheopur	Kalarna	25.675516	76.722163	5.00	1.16	11 kV
80	Sheopur	Khirkhiri	25.440752	77.063102	5.00	0.46	11 kV

## Request for Proposal for Grid Connected SPPs in Madhya Pradesh under feeder solarization component of PM KUSUM - C Scheme

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
81	Sheopur	ChakramPura	25.329896	76.998406	5.00	1.09	11 kV
82	Sheopur	Silpuri	25.558042	77.046588	5.00	1.23	11 kV
83	Sheopur	Baragaba	25.674891	77.055907	5.00	0.96	11 kV
84	Sheopur	Sasaipura	25.541441	77.180014	5.00	0.27	11 kV
85	Sheopur	Baroda IPDS 07.12.2019	25.47359	76.686171	5.00	0.20	11 kV
86	Sheopur	Alapura	25.533944	76.572196	5.00	1.17	11 kV
87	Sheopur	Pahadli	25.507439	76.548793	5.00	1.35	11 kV
88	Sheopur	Bhurwada	25.590453	76.615501	5.00	0.35	11 kV
89	Sheopur	Suswada	25.360033	76.864352	5.00	0.30	11 kV
90	Sheopur	Ratodhan	25.425521	76.706038	5.00	0.85	11 kV
91	Sheopur	Kanapur	25.652176	76.643618	5.00	1.37	11 kV
92	Sheopur	Shyampur	26.079072	77.041515	5.00	0.81	11 kV
93	Sheopur	Gohata	26.054147	77.407618	5.00	0.87	11 kV
94	Sheopur	Dord	26.259893	77.411935	5.00	1.19	11 kV
95	Sheopur	Benipura	25.999468	77.377127	5.00	0.90	11 kV
96	Sheopur	Adwar	25.68131	76.535637	5.00	2.42	11 kV
97	Sheopur	Chakasan	25.734743	76.560013	5.00	0.67	11 kV
98	Sheopur	Dhiroly	25.883508	76.759203	5.00	1.94	11 kV
99	Sheopur	Tillidera	25.883652	76.80663	5.00	0.10	11 kV
100	Sheopur	Samarsa	25.853909	76.581874	5.00	0.06	11 kV
101	Sheopur	JAVASA	25.887416	76.646669	5.00	1.22	11 kV
102	Guna	KHERIKHATA	24.880596	77.281095	5.00	3.01	11 kV
103	Guna	SILAWATI-PATAI	24.9169	76.9556	5.00	0.60	11 kV
104	Guna	KALORA	24.7039	77.4242	5.00	0.79	11 kV
105	Guna	MANA	24.576	76.5566	5.00	0.15	11 kV
106	Guna	SINGWASA	24.651875	77.371233	5.00	0.63	11 kV
107	Guna	BEHTAGHAT	24.657885	77-48615	5.00	2.04	11 kV
108	Guna	BHADOR	24.489738	77.419825	5.00	1.47	11 kV

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109	Guna	MATAMUNDRA	24.253088	77.442408	5.00	1.58	11 kV
110	Guna	Sanai	24.23302	76.55308	5.00	0.60	11 kV
111	Guna	Kumbhraj	24.3689	77.0478	5.00	1.28	11 kV
112	Guna	Chachada	24.10956	77.01137	5.00	1.62	11 kV
113	Guna	MURADPUR	24.5689	77.1427	5.00	2.54	11 kV
114	Guna	UKAWAD	23.57199	77.15606	5.00	3.39	11 kV
115	Guna	BISHANWADA	24.996571	77.096461	5.00	1.01	11 kV
116	Guna	barkheda khurd	24.19127	77.05349	5.00	0.80	11 kV
117	Raisen	Mehgaon	23.452082	77.771127	5.00	1.60	11 kV
118	Raisen	Tulsipar	23.551889	78.426425	3.15	1.53	11 kV
119	Raisen	Simariya Bakshi	23.248232	78.464312	5.00	2.76	11 kV
120	Raisen	Airen	23.482162	77.698167	5.00	3.22	11 kV
121	Raisen	Padariya Kala	23.168188	78.2659	5.00	3.57	11 kV
122	Raisen	Pipariya Karansingh	23.04111	78.252623	5.00	2.50	11 kV
123	Raisen	THIKHAWAN	23.106143	78.413928	5.00	3.06	11 kV
124	Raisen	Dimada	22.91796	78.18921	5.00	1.27	11 kV
125	Raisen	Dhandla	22.878122	78.118848	5.00	0.88	11 kV
126	Raisen	Gugalwada	22.900075	78.076181	5.00	2.15	11 kV
127	Raisen	POLAHA	23°5'10.84578"N	77°28'53.0855"E	10.00	7.19	11 kV
128	Raisen	CHIKLOD	23°7'26.650"N	77°41'50.019"E	5.00	4.29	11 kV
129	Vidisha	BARKHEDA JAGIR	23.8897626	77.5272768	3.15	0.56	11 kV
130	Vidisha	JHIRNIYA	23.4758056	78.0352929	5.00	0.74	11 kV
131	Vidisha	KAGPUR	23.7442611	77.7985799	3.15	0.75	11 kV
132	Vidisha	KHIRIYA	23.664887	78.193773	5.00	0.48	11 kV
133	Vidisha	LASHKARPUR	23.6235569	77.7890423	5.00	3.27	11 kV
134	Vidisha	PATHARIYA PATHAR	23.542718	77.606857	3.15	1.55	11 kV
135	Vidisha	PAUANALA	23.589	77.635	5.00	1.50	11 kV
136	Vidisha	SHALAKHEDI(BARODA)	23.830027	77.499449	3.15	1.43	11 kV



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137	Vidisha	SOMWARA	23.8883429	77.7881229	5.00	2.37	11 kV
138	Vidisha	ALIGARH KOTRA	23.95072	77.340981	3.15	1.36	11 kV
139	Vidisha	BAREJ(BENDIGARH)	24.155757	77.810464	5.00	1.00	11 kV
140	Vidisha	BARWAI	24.169126	77.959407	5.00	1.09	11 kV
141	Vidisha	Devpur	24.162896	77.610921	5.00	1.34	11 kV
142	Vidisha	KAKRUA	24.04311	78.048935	5.00	0.85	11 kV
143	Vidisha	KULHAR	23.970566	78.067752	3.15	1.06	11 kV
144	Vidisha	PIPARIYA HAT	24.24583	77.627002	5.00	2.17	11 kV
145	Vidisha	SUKHNER	24.116419	77.438145	5.00	0.55	11 kV
146	SEHORE	ABIDABAD	23.04347043	77.29486277	5.00	0.69	11 kV
147	SEHORE	AMLAHA	23.12655	76.91404	5.00	2.75	11 kV
148	SEHORE	bhaukhedi	23.09607	77.00186	5.00	1.05	11 kV
149	SEHORE	KAUDIGHAR	23.18544	77.0509	5.00	1.87	11 kV
150	SEHORE	KOLAR	22.97666	77.34471	5.00	1.60	11 kV
151	SEHORE	KULAS	23.16995	77.21594	5.00	1.34	11 kV
152	SEHORE	L-PARIHAR	23.20412	77.15906	5.00	2.08	11 kV
153	SEHORE	LAUKHEDI	23.04621	76.87921	5.00	1.25	11 kV
154	SEHORE	MAGARDA	23.5711	77.19811	5.00	1.19	11 kV
155	SEHORE	MONGRARAM	23.14432	77.03977	3.15	2.07	11 kV
156	SEHORE	NAPLAKHEDI	23.16402	77.0074	5.00	2.26	11 kV
157	SEHORE	BAPCHA	22.85977	76.67267	5.00	1.68	11 kV
158	SEHORE	DABRI	23.05469	76.69889	5.00	0.98	11 kV
159	SEHORE	JAGMALPURA	22.9849	76.72532	5.00	0.88	11 kV
160	SEHORE	KARMANKHEDI(GAUKHEDI)	23.08176	76.56375	5.00	1.26	11 kV
161	SEHORE	KURAWAR	23.07373	76.59146	5.00	2.32	11 kV
162	SEHORE	LORAS KHURD	23.14214	76.73016	5.00	0.63	11 kV
163	SEHORE	NIPANIA	23.12699	76.80089	5.00	1.89	11 kV
164	rajgarh	ANDALHEDA	23.759278	77.054222	5.00	2.18	11 kV

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165	rajgarh	BAWADIKHEDA	23.510639	76.724139	5.00	5.00	11 kV
166	rajgarh	DHABLA	23.629306	76.874361	5.00	1.22	11 kV
167	rajgarh	IKLERA	23.504889	76.8145	10.00	9.04	11 kV
168	rajgarh	LASHKARPUR	23.575167	77.1005	5.00	4.45	11 kV
169	rajgarh	PIPLYA TAWAKKUL	23.532389	76.769778	5.00	4.30	11 kV
170	rajgarh	ROSLA	23.610972	76.780139	5.00	3.78	11 kV
171	rajgarh	SEEKA	23.547167	76.848667	5.00	1.14	11 kV
172	rajgarh	UMRI	23.593833	76.837917	10.00	4.52	11 kV
173	rajgarh	BALAHEDA	23.91575	76.355722	5.00	1.15	11 kV
174	rajgarh	BAMANGAON	23.888861	76.567583	5.00	1.94	11 kV
175	rajgarh	BANGPURA	24.106806	76.433083	5.00	5.00	11 kV
176	rajgarh	BATAVADA	23.831611	76.521139	5.00	4.17	11 kV
177	rajgarh	Batediya(Rajpura)	24.190139	76.40175	5.00	1.84	11 kV
178	rajgarh	DAGLIYA BAJRON	23.956056	76.450028	5.00	2.08	11 kV
179	rajgarh	DHATRAWADA	24.005306	76.28225	5.00	1.13	11 kV
180	rajgarh	JALAMPURA	24.017639	76.577028	10.00	5.67	11 kV
181	rajgarh	JETPURA	24.023889	76.462111	8.15	2.79	11 kV
182	rajgarh	KHARPA	24.04925	76.314722	5.00	1.09	11 kV
183	rajgarh	LAKHONI	24.14375	76.392639	10.00	3.19	11 kV
184	rajgarh	SABARSIYA	23.800000,	76.450889	5.00	3.49	11 kV
185	rajgarh	ZEERAPUR	24.016528	76.373278	3.15	0.17	11 kV
186	rajgarh	AKVN BILAPURA	23.706750,	76.714444	3.15	0.57	11 kV
187	rajgarh	BELAPURA	23.510639	76.724139	5.00	5.00	11 kV
188	rajgarh	BHILKHEDI	23.763167	76.632611	5.00	2.95	11 kV
189	rajgarh	BHOJPUR	24.136583	76.509194	5.00	3.11	11 kV
190	rajgarh	DAMDIYA	23.759472	76.766583	10.00	6.08	11 kV
191	rajgarh	GORIYKHEDA	23.795778	76.711194	5.00	5.00	11 kV
192	rajgarh	JHANJHADPUR	24.060972	76.769361	3.15	1.21	11 kV

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193	rajgarh	KACHNARIA	23.735361	76.693111	5.00	5.00	11 kV
194	rajgarh	KAREDI	23.93275	76.663556	10.00	3.40	11 kV
195	rajgarh	KEELA AMARGARH	24.087528	76.884806	5.00	3.30	11 kV
196	rajgarh	RAJGARH (R)	23.988167	76.73275	5.00	0.17	11 kV
197	rajgarh	ALONI	23.591444	76.660083	5.00	0.27	11 kV
198	rajgarh	ASARETA	23.594944	76.617972	10.00	8.15	11 kV
199	rajgarh	BAMLABE	23.904000,	76.836778	5.00	0.58	11 kV
200	rajgarh	BIGNODIPURA	23.619722	76.474167	5.00	4.48	11 kV
201	rajgarh	GULAWATA	23.665722	76.54525	5.00	4.05	11 kV
202	rajgarh	HASROD	23.922167	77.118139	5.00	2.35	11 kV
203	rajgarh	JAMI	23.854556	77.031389	5.00	3.41	11 kV
204	rajgarh	KHAJURIA	23.822222	76.899444	5.00	4.77	11 kV
205	rajgarh	LEEMACHOUHAN	23.752833	76.492083	10.00	5.76	11 kV
206	rajgarh	SEMLAPAR	23.853889	77.200778	3.15	0.12	11 kV
207	rajgarh	SILPATI	23.96975	77.031694	10.00	7.15	11 kV
208	rajgarh	TODI	23.916111	77.166083	8.15	6.35	11 kV
209	HARDA	Sontalai	22.3457	76.86658	5.00	0.22	11 kV
210	HARDA	Relwa	22.387587	76.975472	5.00	2.01	11 kV
211	HARDA	Kartana	22.284	77.1039	10.00	3.88	11 kV
212	HARDA	Rahatgaon	22.23874	77.22565	5.00	1.56	11 kV
213	HARDA	Rehtakalan	22.1056	77.182	5.00	4.39	11 kV
214	HARDA	Charua	22.11157	76.1118	5.00	2.42	11 kV
215	HARDA	Somgaon	22.08311	76.99527	5.00	4.82	11 kV
216	Betul	PANKHA (AMBADA)	21.858819	78.051637	10.00	5.00	11 kV
217	Betul	JAMDEHI	21.992205	78.22094	6.30	3.93	11 kV
218	Betul	RATANPUR	22.034611	77.563104	5.00	2.82	11 kV
219	Betul	SHAHPUR	22.170404	77.938668	5.00	2.89	11 kV
220	Betul	BHIMPUR	21.94376	77.53958	5.00	5.00	11 kV

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221	Betul	DAMJIPURA	21.741557	77.132068	10.00	2.53	11 kV
222	Betul	GURUWA PIPARIYA	21.91726	77.29502	5.00	1.89	11 kV
223	Betul	GONDRA	21.993148	77.778028	5.00	2.42	11 kV
224	Betul	SAKADEHI	21.986897	77.861211	5.00	2.65	11 kV
225	Betul	MARAMJHIRI	21.931752	77.887004	5.00	0.32	11 kV
226	Betul	JAMTHI	21.93722	77.870389	3.15	1.55	11 kV
227	Betul	KOSMI	21.901821	77.872669	5.00	0.41	11 kV
228	Betul	RATAMATI	21.854348	77.763811	3.15	1.56	11 kV
229	Betul	BHADUS	21.869978	77.84825	10.00	4.30	11 kV
230	Betul	BAYAWADI	21.832848	77.932565	5.00	3.87	11 kV
231	Betul	JAWRA	21.789778	78.011082	5.00	3.56	11 kV
232	Betul	GONDI GOULA	21.801469	77.95427	3.15	1.28	11 kV
233	Betul	TEMURNI	21.627457	77.998439	5.00	1.31	11 kV
234	Betul	JUNAWANI	21.76488	77.956329	8.15	2.96	11 kV
235	Betul	NAYEGAON	21.822185	77.858858	3.15	1.49	11 kV
236	Betul	GOREGAON	21.722787	77.662756	8.15	3.26	11 kV
237	Betul	BANSER KALA	21.670612	77.700587	5.00	2.44	11 kV
238	Betul	POUNI	21.72383	78.02026	10.00	4.79	11 kV
239	Betul	Bisnoor	78.02947	21.63161	10.00	5.63	11 kV
240	Betul	RAI-AMLA	21.65887	78.2044	5.00	3.40	11 kV
241	Betul	SANDIYA	21.7378	78.20172	5.00	2.48	11 kV
242	Betul	SHARDA NAGAR	21.764936	78.263318	10.00	5.42	11 kV
243	Betul	CHIKHALI KHURD	21.76844	78.35692	5.00	1.94	11 kV
244	Morena	Bahgel	26.38	77.7252	5.00	0.40	11 kV
245	Morena	Baroli	26.46173	77.85656	5.00	0.26	11 kV
246	Morena	Bhagroli	26.302837	77.718846	5.00	0.37	11 kV
247	Morena	Budhara	26.639165	78.430339	5.00	0.27	11 kV
248	Morena	Chheetriya Pura	26.409959	77.755747	5.00	1.50	11 kV

## Request for Proposal for Grid Connected SPPs in Madhya Pradesh under feeder solarization component of PM KUSUM - C Scheme

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
249	Morena	Dharsola	26.208689	77.515613	5.00	2.81	11 kV
250	Morena	Eishah	26.684501	78.10835	5.00	0.56	11 kV
251	Morena	Goonjbada	26.761035	78.162831	5.00	0.16	11 kV
252	Morena	Jigni	26.54331	78.06817	5.00	1.31	11 kV
253	Morena	Kamtari	26.65423	78.21835	5.00	0.39	11 kV
254	Morena	Lohabasai	26.318568	77.908614	5.00	0.99	11 kV
255	Morena	Mamchone	26.197989	77.559496	5.00	1.80	11 kV
256	Morena	Morena Gaon	26.48671	77.9598	5.00	2.63	11 kV
257	Morena	Nepri	26.303631	77.58612	5.00	2.07	11 kV
258	Morena	Palna	26.698533	78.316025	5.00	0.56	11 kV
259	Morena	Rachhed	26.79825	78.30163	5.00	0.16	11 kV
260	Morena	Silawali	26.4443	78.2942	5.00	0.34	11 kV
261	Morena	Sujangardi	26.371729	77.657606	5.00	0.77	11 kV
262	Morena	Tarsama	26.61643	78.38776	5.00	0.52	11 kV
263	Morena	Vijaygarh	26.784914	78.36984	5.00	0.71	11 kV
264	Shivpuri	BACHRON	78.1737254	25.192307	5.00	1.28	11 kV
265	Shivpuri	BAMOREKALA	78.1489	24.887968	3.15	1.37	11 kV
266	Shivpuri	JHALONI	78.118908	24.96595	3.15	0.27	11 kV
267	Shivpuri	KARARKHEDA	78.2207	25.280556	3.15	1.23	11 kV
268	Shivpuri	KHANIYADHANA	78.1407	25.029104	5.00	1.35	11 kV
269	Shivpuri	KHOD	77.964881	25.2335879	3.15	2.17	11 kV
270	Shivpuri	MAYAPUR	78.013868	25.12605	5.00	1.52	11 kV
271	Shivpuri	MUHARI	78.257809	25.056423	5.00	0.87	11 kV
272	Shivpuri	PADRA	78.249892	25.121175	5.00	2.90	11 kV
273	Shivpuri	PIPRODA	77.9943359	25.077818	5.00	2.15	11 kV
274	Shivpuri	RAHICHOURAHA	78.8694	25.159521	5.00	2.00	11 kV
275	Shivpuri	BANSHKHEDI	77.6353	25.33764	5.00	1.97	11 kV
276	Shivpuri	BELOKALA	77.594297	25.338585	5.00	0.88	11 kV

## Request for Proposal for Grid Connected SPPs in Madhya Pradesh under feeder solarization component of PM KUSUM - C Scheme

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277	Shivpuri	BHAISRAVAN	77.0807	25.371752	5.00	0.62	11 kV
278	Shivpuri	BHATNAWAR	77.3883	25.60516	5.00	1.32	11 kV
279	Shivpuri	CHAKRANA	77.4101605	25.5629601	5.00	0.61	11 kV
280	Shivpuri	CHHARCH	77.19734	25.41797	5.00	4.22	11 kV
281	Shivpuri	DHOLAGARH	77.7731	25.703348	3.15	0.61	11 kV
282	Shivpuri	GOVERDHAN	77.6375	25.790113	5.00	1.81	11 kV
283	Shivpuri	KHATKA	77.6375	25.935051	5.00	1.32	11 kV
284	Shivpuri	LALGARH	77.5142	25.403982	5.00	1.84	11 kV
285	Shivpuri	NOHARI	77.6719	25.487526	5.00	1.83	11 kV
286	Shivpuri	PATHKHEDA	77.9034	24.689421	5.00	0.24	11 kV
287	Shivpuri	RAJOUA	78.14822	26.024816	5.00	0.96	11 kV
288	Shivpuri	RANTHKHEDA	77.394288	25.451126	5.00	0.42	11 kV
289	Shivpuri	RASERA	77.456794	25.6572941	5.00	1.22	11 kV
290	Shivpuri	SATANWADA	77.7417	25.545355	3.15	0.43	11 kV
291	Shivpuri	SIRSOD POHARI	77.4904	25.412671	5.00	1.54	11 kV
292	Shivpuri	AKAJHIRI	77.81848	25.144359	5.00	2.21	11 kV
293	Shivpuri	AMOLPATHA	77.957638	25.557513	5.00	0.87	11 kV
294	Shivpuri	BADARWAS	77.5602	24.969066	3.15	1.32	11 kV
295	Shivpuri	BEHGWAN	78.0933	25.669282	5.00	2.47	11 kV
296	Shivpuri	BIJRONI	77.6323523	24.538207	5.00	2.37	11 kV
297	Shivpuri	DAMRON	78.2806	25.4218	5.00	1.20	11 kV
298	Shivpuri	DEHARDA	77.6036	25.142305	5.00	1.23	11 kV
299	Shivpuri	DEHARDA GANESH	77.69531	25.181867	5.00	2.07	11 kV
300	Shivpuri	DINARA	78.3399	25.479679	5.00	0.57	11 kV
301	Shivpuri	EJWARA	77.648739	25.023262	5.00	0.97	11 kV
302	Shivpuri	KAILDAR	77.521018	25.084685	5.00	0.08	11 kV
303	Shivpuri	KANKER	78.0387	25.6937	5.00	0.36	11 kV
304	Shivpuri	KARAI	78.112227	25.561426	3.15	3.15	11 kV

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305	Shivpuri	KARYA	77.4555	25.224384	5.00	1.12	11 kV
306	Shivpuri	KHARAI	77.4531	25.308085	5.00	1.10	11 kV
307	Shivpuri	KHATORA	77.7141	24.979913	5.00	1.15	11 kV
308	Shivpuri	KILAWANI	77.466398	25.363479	5.00	0.85	11 kV
309	Shivpuri	LUKWASA	77.6062	25.113022	5.00	2.24	11 kV
310	Shivpuri	MADA	77.785	25.089449	5.00	0.96	11 kV
311	Shivpuri	MADIKHEDA	77.5653	25.294853	5.00	0.77	11 kV
312	Shivpuri	MADIKHEDA DAM	77.8339826	25.559002	3.15	1.86	11 kV
313	Shivpuri	MAGROUNI	77.9208	25.683768	5.00	3.41	11 kV
314	Shivpuri	NARAOUA	78.0275	25.592292	5.00	0.08	11 kV
315	Shivpuri	NARWAR	77.9121	25.659169	5.00	5.00	11 kV
316	Shivpuri	PACHAWALI	77.658373	25.107574	5.00	0.14	11 kV
317	Shivpuri	RAI	77.544271	25.235478	5.00	1.71	11 kV
318	Shivpuri	RAMTALA	77.620937	25.235328	5.00	1.41	11 kV
319	Shivpuri	RANNOD	78.0288636	25.071394	5.00	1.63	11 kV
320	Shivpuri	SAD	78.2435	25.620187	5.00	0.02	11 kV
321	Shivpuri	SEEHORE	78.1061	25.6635	5.00	0.02	11 kV
322	Shivpuri	SHRIPUR	77.581936	25.002567	5.00	1.46	11 kV
323	Shivpuri	SIRSOD (KARERA)	78.0469	25.438939	3.15	0.89	11 kV
324	Shivpuri	SUNARI	78.1679	25.679887	5.00	2.12	11 kV
325	Shivpuri	TEELA	78.1732	25.41667	5.00	1.90	11 kV
326	Datia	Dagrai	25.630678	78.477704	5.00	2.23	11 kV
327	Datia	Sarsai	25.5907168	78.665226	5.00	0.76	11 kV
328	Datia	Bhander TV Tower	25.7438116666666.7	78.74041	5.00	0.40	11 kV
329	Datia	Salon Bharroli	25.672728	78.78235	5.00	2.97	11 kV
330	Datia	Badera Sopan	25.827236	78.795925	5.00	0.33	11 kV
331	Datia	Talgaon	25.937334	78.735547	5.00	2.83	11 kV
332	Datia	Behruka	25.804102	78.422817	5.00	1.53	11 kV

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333	Datia	Bhadona	25.841885	78.414791	5.00	1.44	11 kV
334	Datia	Badoni	25.687291	78.387532	3.15	1.23	11 kV
335	Datia	Lamkana	25.687552	78.250493	5.00	2.20	11 kV
336	Datia	Parsonda Baman	26.01209	78.76	5.00	2.84	11 kV
337	Datia	Bharroli	25.85707	78.50096	5.00	1.52	11 kV
338	Datia	Dohar	25.93652	78.58294	5.00	2.43	11 kV
339	Datia	Kherona	25.953032	78.678358	5.00	0.13	11 kV
340	BHIND	BHONPURA	26.56268	78.29609	5.00	0.83	11 kV
341	BHIND	KANAWAR	26.56234	78.97976	5.00	0.91	11 kV
342	BHIND	PIPARI	26.94904	78.89382	5.00	0.78	11 kV
343	BHIND	RAMA	26.70215	78.83263	5.00	0.46	11 kV
344	BHIND	BUDANPUR	26.70264	78.58591	5.00	1.58	11 kV
345	BHIND	MAGHARA	26.78601	78.71929	5.00	0.11	11 kV
346	BHIND	DEENPURA	26.59439	78.8142	5.00	0.94	11 kV
347	BHIND	BILAO	26.46828	78.89487	5.00	0.69	11 kV
348	BHIND	AKODA	26.5332	78.90359	5.00	0.93	11 kV
349	BHIND	LAHROLI	26.46644	78.9457	5.00	0.94	11 kV
350	BHIND	LADAMPURA	26.51398	78.67021	5.00	0.26	11 kV
351	BHIND	HEERA PURA	26.24059	78.92596	5.00	0.92	11 kV
352	BHIND	MUSTRA	26.46585	78.67676	5.00	0.86	11 kV
353	BHIND	ADOKHAR	26.33783	78.80858	5.00	1.11	11 kV
354	BHIND	KOHAR	26.44165	78.62864	5.00	0.37	11 kV
355	BHIND	KANATHAR	26.34211	78.69665	5.00	0.25	11 kV
356	BHIND	GINGARKHI	26.4837	78.52615	5.00	0.91	11 kV
357	BHIND	SITARAM KI LAWAN	26.52828	78.43798	5.00	0.96	11 kV
358	BHIND	ENDORI	26.52142	78.32152	5.00	0.94	11 kV
359	BHIND	Barahed ( Taton)	26.48466	78.26752	5.00	1.60	11 kV
360	BHIND	ANDHIYARI KALAN	26.261096	78.73049	5.00	0.92	11 kV



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361	BHIND	CHITORA	26.32154	78.47804	5.00	0.95	11 kV
362	BHIND	KATHAWA GURJAR	26.39471	78.47903	5.00	0.60	11 kV
363	BHIND	JAMUHA	26.193005	78.93529	5.00	0.25	11 kV
364	BHIND	KATHA	26.2799602	78.9371203	5.00	1.07	11 kV

## **East DISCOM**

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
1	CHHATARPUR	DHARARI	24.86297274	79.55142383	5.00	1.87	11 kV
2	CHHATARPUR	DEVPUR	24.99553722	79.51909027	5.00	2.26	11 kV
3	CHHATARPUR	NOWGONG	25.06824534	79.43312662	5.00	3.25	11 kV
4	CHHATARPUR	NAVODAY	25.03725452	79.46474501	5.00	0.40	11 kV
5	CHHATARPUR	GADIMALAHARA	25.04642958	79.67515535	5.00	5.00	11 kV
6	CHHATARPUR	ISHANAGAR	24.85558	79.38833416	5.00	0.38	11 kV
7	CHHATARPUR	PANOTHA	24.88424114	79.48212626	5.00	0.07	11 kV
8	CHHINDWARA	Bisapur	21.90840239	78.95329347	5.00	5.00	11 kV
9	CHHINDWARA	Umradh	21.93693003	79.02108924	5.00	2.06	11 kV
10	CHHINDWARA	Bhaisa-Dand	22.05005062	78.85634719	5.00	0.49	11 kV
11	DAMOH	PATHARIA	23.87737493	79.19073113	5.00	0.53	11 kV
12	DAMOH	KEOLARI	23.95046867	79.12419067	5.00	2.28	11 kV
13	DAMOH	LAKHRONI	23.92241476	79.20847736	5.00	1.03	11 kV
14	DAMOH	BILANI	23.95106621	79.2626549	5.00	0.84	11 kV
15	DAMOH	vardhari	23.83461122	79.26354681	5.00	0.87	11 kV
16	DAMOH	NARSINGARH	23.99329654	79.39514544	5.00	0.10	11 kV
17	DAMOH	BANDAKPUR	23.81956026	79.57333471	5.00	0.18	11 kV
18	DAMOH	AAMKHEDA	23.86730341	79.51580463	5.00	0.36	11 kV
19	DAMOH	HINDORIYA	23.89584942	79.56518314	5.00	1.53	11 kV
20	DAMOH	KUDAI	23.99889673	79.6097946	3.15	0.29	11 kV
21	DAMOH	BANSA	23.78966372	79.34245004	5.00	0.89	11 kV

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22	DAMOH	JABERA	23.55048625	79.68710876	3.15	0.52	11 kV
23	DAMOH	SINGRAMPUR	23.5482633	79.78649545	5.00	0.32	11 kV
24	DAMOH	PATNA KUA	23.57140814	79.84707822	5.00	0.68	11 kV
25	DAMOH	TEJGARH	23.55956886	79.544767	5.00	0.38	11 kV
26	DAMOH	HINOTI	23.5627496	79.44866719	5.00	1.81	11 kV
27	DAMOH	IMALIAGHAT	23.58404921	79.39950863	3.15	0.05	11 kV
28	DAMOH	JHALON	23.47765824	79.38540334	5.00	0.65	11 kV
29	DAMOH	TENDUKHEDA	23.39175481	79.53573404	5.00	0.95	11 kV
30	DAMOH	TARADEHI	23.28900303	79.34224595	5.00	1.03	11 kV
31	DAMOH	MURACHH	24.24160316	79.72955919	5.00	0.95	11 kV
32	DAMOH	GAISABAD	24.23871949	79.82173933	3.15	1.67	11 kV
33	DAMOH	MADHIADO	24.28237033	79.65620767	3.15	1.80	11 kV
34	DAMOH	BHILONI	24.22065042	79.60519708	3.15	0.86	11 kV
35	DAMOH	Patera	23.99270501	79.6962643	5.00	1.80	11 kV
36	DAMOH	FATEHPUR	24.20116115	79.50951184	5.00	1.33	11 kV
37	DAMOH	BANGAON	24.01496594	79.52114393	5.00	0.13	11 kV
38	DAMOH	BILAI	23.98302339	79.53316998	5.00	0.76	11 kV
39	DAMOH	ASLANA	23.93276611	79.31756	5.00	0.77	11 kV
40	DAMOH	SUHAV	23.97677389	79.28805278	5.00	1.20	11 kV
41	DAMOH	MUHLI BASTI	24.02562606	79.25898761	5.00	1.32	11 kV
42	DAMOH	FUTERA	24.0835813	79.39490291	5.00	1.95	11 kV

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43	DAMOH	MAGRON	24.14649088	79.48223507	5.00	2.06	11 kV
44	DAMOH	MAILWARA	23.97396525	79.23392488	5.00	1.13	11 kV
45	DAMOH	KUMHARI	23.89767726	79.82075904	5.00	0.07	11 kV
46	DAMOH	MAJHGUWAN HANSRAJ	23.8319276	79.8156361	3.15	0.97	11 kV
47	DAMOH	BARTLAI	24.18339432	79.59013384	5.00	0.87	11 kV
48	Narsinghpur	Dangidhana	22.90724291	79.27134128	5.00	4.06	11 kV
49	Narsinghpur	Bachai	22.8737425	79.30725633	5.00	2.42	11 kV
50	Narsinghpur	Devnagar	22.83906408	79.38251867	5.00	1.60	11 kV
51	Narsinghpur	Usari	22.76183794	79.30225558	5.00	1.56	11 kV
52	Narsinghpur	Karappaon	22.87460293	78.98417562	5.00	0.68	11 kV
53	Narsinghpur	Kareli	22.92834142	79.05996764	5.00	1.65	11 kV
54	Narsinghpur	Tindni	23.05459125	79.27029508	5.00	1.15	11 kV
55	Narsinghpur	Rani pindrai	23.00209389	79.20457556	5.00	0.04	11 kV
56	Narsinghpur	Umariya	23.0146179	79.13024681	5.00	4.15	11 kV
57	Narsinghpur	Bandhi	23.10527917	79.19616795	5.00	3.51	11 kV
58	Narsinghpur	Narwara	23.04490938	79.57375598	5.00	0.27	11 kV
59	Narsinghpur	Shrinagar	22.95475253	79.52318987	5.00	4.70	11 kV
60	Narsinghpur	Lathgaon	23.00104442	79.56511478	5.00	5.00	11 kV
61	Narsinghpur	Jhoteswar	22.95023476	79.55408591	5.00	0.01	11 kV
62	Narsinghpur	Murdai	23.07958653	79.48110078	5.00	5.00	11 kV
63	Narsinghpur	Gundrai (New)	22.97737154	79.40389172	5.00	3.15	11 kV

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64	Narsinghpur	Bagaspur	22.98496832	79.50385978	5.00	3.72	11 kV
65	Narsinghpur	Pipersara	22.96926945	79.42985944	5.00	2.82	11 kV
66	Narsinghpur	Gutori	23.14968942	78.95271849	5.00	3.54	11 kV
67	Narsinghpur	Beetli	22.99435463	78.98508197	5.00	5.00	11 kV
68	Narsinghpur	Madyshur	22.94486907	79.01602308	5.00	3.53	11 kV
69	Narsinghpur	Kashikayri	23.08113007	78.98553064	5.00	0.66	11 kV
70	Narsinghpur	Lilwani	23.00039143	78.82770376	5.00	2.38	11 kV
71	Narsinghpur	Kamti	22.91127463	78.73820985	5.00	3.39	11 kV
72	Narsinghpur	Madgula			5.00	1.75	11 kV
73	Narsinghpur	Chichli	22.84741399	78.81704712	5.00	3.64	11 kV
74	SEONI	GOPALGANJ	21.98300063	79.53066772	5.00	1.24	11 kV
75	SEONI	BADALPAR	21.92341242	79.44508569	5.00	0.88	11 kV
76	SEONI	KURAI	21.80722045	79.5071762	3.15	1.76	11 kV
77	SEONI	DHOBISARA	21.9332072	79.60370244	5.00	0.35	11 kV
78	SEONI	LONIYA	22.0976975	79.53005	5.00	0.86	11 kV
79	SEONI	PIPARDAHI	22.05654431	79.39499942	5.00	2.46	11 kV
80	SEONI	BINJAWADA	22.11511604	79.54820315	5.00	1.72	11 kV
81	SEONI	KISHANPUR	22.11789241	79.43409889	5.00	1.48	11 kV
82	SEONI	BANDOL	22.24087204	79.53688837	5.00	1.99	11 kV
83	SEONI	BAKHARI	22.32541963	79.43785619	5.00	2.34	11 kV
84	SEONI	KANHIWADA	22.2044122	79.74274837	3.15	0.40	11 kV

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
85	SEONI	KHAIRA PALARI	22.27391263	79.83355872	5.00	2.81	11 kV
86	SEONI	ALONIKHAPA	22.36692478	79.97179667	5.00	2.65	11 kV
87	SEONI	KEOLARI	22.36407362	79.90352856	5.00	4.27	11 kV
88	SEONI	BARGHAT	22.03310445	79.72306352	5.00	0.28	11 kV
89	SEONI	BHOMA	22.15857561	79.68390468	5.00	1.46	11 kV
90	SEONI	ADEGAON	22.61620181	79.49330528	5.00	5.00	11 kV
91	SEONI	SIRMANGNI	22.61051032	79.57504181	5.00	0.50	11 kV
92	SEONI	MUNGWANI	22.45500261	79.82293356	3.15	3.15	11 kV
93	SEONI	DIWARI	22.80859684	79.89846874	3.15	0.35	11 kV
94	SEONI	GANESHGANJ	22.50430458	79.58378064	5.00	1.53	11 kV
95	SEONI	SUNWARA	22.44290278	79.73909114	5.00	2.83	11 kV
96	Shahdol	Bhamraha	23.142805	81.38805667	3.15	1.39	11 kV
97	Shahdol	Budwa	24.19512838	81.39362143	5.00	1.14	11 kV
98	SINGRAULI	PARSOHAR	24.30840334	82.114025	5.00	0.05	11 kV
99	SINGRAULI	KHUTAR	24.05185464	82.53661392	5.00	1.20	11 kV
100	SINGRAULI	SAMOOD	24.02145855	82.17043084	5.00	1.89	11 kV
101	Umariya	Amarpur	23.95481891	80.89222086	5.00	0.95	11 kV
102	Umariya	GHULGHULI	23.34995417	80.84823417	3.15	3.15	11 kV
103	Anuppur	Shanti Nagar	23.11331531	81.71354422	5.00	2.59	11 kV

## **West DISCOM**



S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
1	BURHANPUR	DABHIYAKHEDA	21.47	76.52	10.00	6.96	11 kV
2	BURHANPUR	DEDTALAI	21.49	76.77	3.15	2.71	11 kV
3	BURHANPUR	BORI	21.45	76.1	5.00	2.55	11 kV
4	BURHANPUR	KHATLA	21.54	76.23	5.00	1.82	11 kV
5	BURHANPUR	BIRODA	21.31	76.14	5.00	1.75	11 kV
6	BURHANPUR	LONI	21.29	76.18	5.00	3.29	11 kV
7	SHAJAPUR	DUPADA	23.54	76.2	5.00	4.64	11 kV
8	SHAJAPUR	KANKADI	23.51	76.27	5.00	1.68	11 kV
9	SHAJAPUR	BOLAI	23.39	76.48	5.00	4.12	11 kV
10	SHAJAPUR	MADANA	23.48	76.47	10.00	5.12	11 kV
11	SHAJAPUR	SHADIPURA	23.57	76.42	5.00	0.51	11 kV
12	SHAJAPUR	DUDHANA	23.57	76.39	5.00	2.54	11 kV
13	SHAJAPUR	NAGZIRI	23.57	76.28	5.00	3.84	11 kV
14	SHAJAPUR	BARNAWAD	23.66	76.33	5.00	3.11	11 kV
15	SHAJAPUR	MOHNA	23.69	76.36	5.00	3.48	11 kV
16	SHAJAPUR	MANDODA	23.62	76.42	8.15	2.14	11 kV
17	SHAJAPUR	BIRGOD	23.26	76.34	5.00	2.61	11 kV
18	SHAJAPUR	MANGLAJ	23.54	76.56	5.00	4.91	11 kV
19	SHAJAPUR	PIPLODA	23.54	76.61	3.15	1.58	11 kV
20	SHAJAPUR	AKVN MAKSI	23.24	76.15	3.15	1.31	11 kV
21	SHAJAPUR	MAKSI	23.27	76.15	5.00	0.93	11 kV
22	SHAJAPUR	SIROLIYA	23.27	76.19	5.00	4.56	11 kV
23	SHAJAPUR	HANOTI	23.25	76.21	3.15	1.52	11 kV
24	SHAJAPUR	ZONKAR	23.25	76.17	5.00	2.34	11 kV

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
25	SHAJAPUR	TILAWAD	23.21	76.7	5.00	3.96	11 kV
26	SHAJAPUR	AMLAY PATHAR	23.23	76.32	5.00	1.89	11 kV
27	SHAJAPUR	DHABLAGHOSI	23.29	76.68	3.15	1.86	11 kV
28	SHAJAPUR	FARAD	23.24	76.9	5.00	3.72	11 kV
29	SHAJAPUR	LASULDIYA MALAK	23.21	76.89	5.00	1.31	11 kV
30	SHAJAPUR	KHAMLAY	23.15	76.87	5.00	3.23	11 kV
31	SHAJAPUR	POCHANER	23.16	76.81	10.00	5.71	11 kV
32	SHAJAPUR	RANAYAL	23.22	76.73	5.00	1.78	11 kV
33	SHAJAPUR	KALAPIPAL	23.34	76.84	5.00	4.18	11 kV
34	SHAJAPUR	BHURIYA KAJURIYA	23.29	76.61	5.00	1.32	11 kV
35	SHAJAPUR	LASUDIYA GORI	23.39	76.83	5.00	4.89	11 kV
36	SHAJAPUR	RAMDI	23.47	76.87	5.00	2.72	11 kV
37	SHAJAPUR	DADIYAKHEDI	23.31	76.88	5.00	2.65	11 kV
38	SHAJAPUR	DHABLADHEER	23.33	76.85	5.00	2.80	11 kV
39	SHAJAPUR	NANDNI	23.32	76.93	5.00	5.00	11 kV
40	SHAJAPUR	BHENSAYANAGIN	23.38	76.92	8.15	3.28	11 kV
41	SHAJAPUR	BHESHAYAGADA	23.53	76.92	5.00	1.76	11 kV
42	SHAJAPUR	AVANTIPUR -BADODIYA	23.14	76.59	5.00	5.00	11 kV
43	SHAJAPUR	PAGRAWAT KALA	23.17	76.55	5.00	2.74	11 kV
44	SHAJAPUR	MAKODI	23.33	76.63	5.00	2.27	11 kV
45	SHAJAPUR	DEVLI	23.24	76.59	5.00	1.52	11 kV
46	SHAJAPUR	POLAIKALA	23.22	76.54	10.00	8.97	11 kV
47	SHAJAPUR	BEHRAWAL	23.42	76.85	10.00	6.13	11 kV
48	SHAJAPUR	UGLI	23.45	76.81	5.00	4.65	11 kV

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
49	SHAJAPUR	HADLAIKALA	23.32	76.61	5.00	5.00	11 kV
50	SHAJAPUR	RANI BAROD	23.35	76.6	5.00	2.83	11 kV
51	SHAJAPUR	KADWALA	23.48	76.63	10.00	5.72	11 kV
52	SHAJAPUR	SHUJALPUR CITY	23.41	76.72	5.00	3.72	11 kV
53	SHAJAPUR	SHYAMPUR CHITONI	23.48	76.76	5.00	5.00	11 kV
54	SHAJAPUR	TAJPUR UKALA	23.44	76.75	5.00	1.07	11 kV
55	KHANDWA	BANGARDA	22.16	76.46	10.00	3.86	11 kV
56	KHANDWA	JALKUWA	22.12	76.54	5.00	2.47	11 kV
57	KHANDWA	DEVLA	22.13	76.36	5.00	4.39	11 kV
58	KHANDWA	KOTHI	22.22	76.11	8.15	3.10	11 kV
59	KHANDWA	BAMANGAON	21.8	76.36	3.15	1.20	11 kV
60	KHANDWA	CHHANERA	21.97	76.7	10.00	6.63	11 kV
61	KHANDWA	DAGAD KHEDI	22.08	76.83	6.30	3.98	11 kV
62	KHANDWA	KILLOD	22.18	76.78	5.00	4.47	11 kV
63	KHANDWA	JAMNIYA SARSARI	21.94	76.85	8.15	3.27	11 kV
64	KHANDWA	ROSHANI	21.88	76.93	8.15	5.40	11 kV
65	KHANDWA	GOLKHEDA	21.968702,	77.05	6.30	2.16	11 kV
66	KHANDWA	RANGAON	22.02	76.45	5.00	3.83	11 kV
67	KHANDWA	ROHNI	21.94	76.51	5.00	2.58	11 kV
68	KHANDWA	SAHEJLA	21.97	76.53	10.00	6.59	11 kV
69	KHANDWA	SATWADA	21.87	76.44	8.15	2.89	11 kV
70	KHANDWA	SENDHWAL	21.59	76.78	10.00	5.03	11 kV
71	KHANDWA	SIHADA	21.87	76.38	8.15	3.97	11 kV
72	KHANDWA	CIVIL LINE	21.83	76.38	5.00	2.22	11 kV

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
73	KHANDWA	NIHALWADI	21.73	76.15	5.00	3.15	11 kV
74	KHANDWA	TAKLIKALAN	21.68	76.36	5.00	2.86	11 kV
75	KHANDWA	CHHEGAON DEVI	21.82	76.29	5.00	3.52	11 kV
76	KHANDWA	NAVALI	21.94	76.19	8.15	1.86	11 kV
77	UJJAIN	220 KV BARNAGAR	23.07	75.36	5.00	4.08	11 kV
78	UJJAIN	BADGARA (NAVADA)	22.86	75.35	8.15	1.27	11 kV
79	UJJAIN	BANDARBELA	23.26	75.35	5.00	3.86	11 kV
80	UJJAIN	BIRYAKHEDI	23.11	75.36	5.00	3.95	11 kV
81	UJJAIN	KOTTHDI	23.21	75.61	5.00	3.86	11 kV
82	UJJAIN	MOLANA	23.08	75.4	5.00	5.00	11 kV
83	UJJAIN	BOLKHEDA NAU	23.67	75.8	5.00	3.70	11 kV
84	UJJAIN	JAGOTI	23.39	75.81	5.00	3.19	11 kV
85	UJJAIN	SAGWALI	23.58	75.59	5.00	1.88	11 kV
86	UJJAIN	BANJARI(NAGDA)	23.38	75.5	5.00	4.34	11 kV
87	UJJAIN	BHIKAMPUR	23.39	75.36	5.00	2.31	11 kV
88	UJJAIN	BORKHEDA	23.38	75.5	5.00	3.40	11 kV
89	UJJAIN	KALSI	23.52	75.4	5.00	4.26	11 kV
90	UJJAIN	MOHANA	23.47	75.49	5.00	2.93	11 kV
91	UJJAIN	RAMATALAI	23.4	75.26	5.00	2.69	11 kV
92	UJJAIN	UNHEL STATION	23.32	75.48	5.00	3.73	11 kV
93	UJJAIN	KARANJ	23.33	76.1	3.15	1.60	11 kV
94	UJJAIN	KHARPA	23.28	76.02	5.00	3.21	11 kV
95	UJJAIN	PAT	23.55	75.9	3.15	1.26	11 kV
96	UJJAIN	BANDKA INDUSTRIAL	23.31	75.82	5.00	2.74	11 kV

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97	UJJAIN	KALUHEDA	23.34	75.71	5.00	2.95	11 kV
98	UJJAIN	MADHOPURA	23.09	75.98	3.15	1.42	11 kV
99	UJJAIN	ZITARKHEDI	23.39	75.92	5.00	4.39	11 kV
100	UJJAIN	CHAKRAWADA	23.25	75.71	10.00	6.79	11 kV
101	UJJAIN	JAITHAL	23.28	75.82	10.00	6.26	11 kV
102	UJJAIN	KILODIYA	23.51	75.37	3.15	2.15	11 kV
103	JHABUA	PITOL	22.79	74.46	5.00	2.69	11 kV
104	JHABUA	TALAVALI	22.82	74.64	8.15	4.25	11 kV
105	JHABUA	BADI HIDI	22.69	74.71	5.00	1.63	11 kV
106	JHABUA	RANAPUR	22.65	74.53	8.15	7.41	11 kV
107	JHABUA	KALYANPUR	22.88	74.64	10.00	4.10	11 kV
108	JHABUA	THANDLA	23	74.58	5.00	5.00	11 kV
109	JHABUA	SUJAPURA	23.06	74.62	5.00	3.81	11 kV
110	JHABUA	PARWALIA	23.02	74.52	3.15	3.15	11 kV
111	JHABUA	KAKANWANI	23.04	74.44	8.15	8.15	11 kV
112	JHABUA	BODAYATA	23.02	74.94	5.00	2.58	11 kV
113	JHABUA	HAMIRGARH	22.96	74.92	5.00	5.00	11 kV
114	JHABUA	BOLASA	22.87	74.89	5.00	2.42	11 kV
115	JHABUA	NANPUR	22.27	74.52	10.00	6.35	11 kV
116	JHABUA	UNDWA	22.35	74.4	8.15	6.45	11 kV
117	JHABUA	DABADI	22.3	74.62	10.00	7.29	11 kV
118	JHABUA	BADI KHATTALI	22.35	74.53	5.00	5.00	11 kV
119	JHABUA	UDAIGARH	22.53	74.54	10.00	10.00	11 kV
120	JHABUA	KATTHIWADA	22.48	74.16	5.00	4.96	11 kV

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
121	JHABUA	SONDWA	22.12	74.38	8.15	6.46	11 kV
122	JHABUA	CHHAKTALA	22.09	74.18	10.00	6.58	11 kV
123	JHABUA	FULMAL	22.19	74.14	5.00	2.29	11 kV
124	JHABUA	KARAJWANI	22.04	74.19	5.00	1.42	11 kV
125	JHABUA	UMRALI	22.18	74.32	5.00	3.54	11 kV
126	BARWANI	ANJAD-T	22.04	75.04	5.00	3.24	11 kV
127	BARWANI	BADGOAN	21.98	75.19	10.00	5.25	11 kV
128	BARWANI	BARUFATAK	21.99	75.3	10.00	5.18	11 kV
129	BARWANI	BHAGSUR	21.96	75.05	10.00	8.09	11 kV
130	BARWANI	BORLAI	22.04	75.01	8.15	3.72	11 kV
131	BARWANI	DHAWALI	21.42	75.31	5.00	4.63	11 kV
132	BARWANI	GANDHAWAL	21.87	74.77	5.00	4.76	11 kV
133	BARWANI	GAWADI	21.61	75.07	5.00	1.30	11 kV
134	BARWANI	HATOLA	22.05	75.23	5.00	3.38	11 kV
135	BARWANI	JAMTHI	21.42	75.31	10.00	5.00	11 kV
136	BARWANI	KARI	22.03	74.95	5.00	2.89	11 kV
137	BARWANI	KHADKI	21.68	74.68	5.00	5.00	11 kV
138	BARWANI	KHETIYA	21.67	74.59	10.00	6.07	11 kV
139	BARWANI	KOYDIYA	22.03	75.15	3.15	3.04	11 kV
140	BARWANI	LIMBI	21.96	74.67	8.15	3.02	11 kV
141	BARWANI	MALFA	21.71	74.61	5.00	3.18	11 kV
142	BARWANI	MANKUI	21.72	74.77	10.00	5.12	11 kV
143	BARWANI	NAWALPURA	22.04	74.91	5.00	0.63	11 kV
144	BARWANI	NEW DONDWADA	21.77	75.04	8.15	6.31	11 kV

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145	BARWANI	RAKHI BUJURG	21.72	74.54	5.00	4.90	11 kV
146	BARWANI	ROSAR	21.96	74.6	5.00	1.00	11 kV
147	BARWANI	SALKHEDA	21.9	75.17	8.15	8.15	11 kV
148	BARWANI	SHAHUPURA	21.59	75.15	10.00	7.48	11 kV
149	BARWANI	SILAWAD	21.92	74.89	10.00	9.35	11 kV
150	BARWANI	SURANA	22.01	75.12	5.00	3.02	11 kV
151	BARWANI	TAALWADA BUJ.	22.01	75.04	10.00	2.53	11 kV
152	BARWANI	TALOON	22.03	74.98	5.00	4.44	11 kV
153	BARWANI	TALWADA DEB	22.07	75.19	10.00	6.19	11 kV
154	BARWANI	THIKRI	22.07	75.41	5.00	3.89	11 kV
155	BARWANI	VARLA	21.43	75.18	8.15	3.75	11 kV
156	DEWAS(O&M)	LOHANA	23.08276° N	76.0329° E	5.00	1.67	11 kV
157	DEWAS(O&M)	BAROTHA	22.85959° N	76.1702° E	5.00	2.12	11 kV
158	DEWAS(O&M)	MIRZAPUR	22.72978° N	76.1409° E	5.00	1.47	11 kV
159	DEWAS(O&M)	KHOKARIYA	22.90777° N	76.19298° E	5.00	1.78	11 kV
160	DEWAS(O&M)	ROOPAKHEDI	22.9649° N	75.96642° E	5.00	1.60	11 kV
161	DEWAS(O&M)	SINGAWDA	22.99921° N	75.99992° E	5.00	2.15	11 kV
162	DEWAS(O&M)	RAJODA	22.92966° N	76.09108° E	5.00	1.54	11 kV
163	DEWAS(O&M)	BHOUNRASA	22.9926° N	76.2117° E	5.00	2.56	11 kV
164	DEWAS(O&M)	PANDA JAGIR	22.9269° N	76.25222° E	5.00	1.36	11 kV
165	DEWAS(O&M)	NEWRI FATA	22.8599° N	76.2450° E	5.00	0.57	11 kV
166	DEWAS(O&M)	SARSODA	22.9558° N	76.2740° E	5.00	2.01	11 kV
167	DEWAS(O&M)	BHUTIYA BHUJURG	23.1549° N	76.3493° E	5.00	1.90	11 kV
168	DEWAS(O&M)	GANDHARAVPURI	23.0470° N	76.3746° E	5.00	2.52	11 kV

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169	DEWAS(O&M)	TALOD	23.0183° N	76.4216° E	5.00	0.92	11 kV
170	DEWAS(O&M)	PIPALRAWA	23.1697° N	76.4852° E	5.00	1.53	11 kV
171	DEWAS(O&M)	AGERA	22.9735° N	76.4021° E	3.15	0.26	11 kV
172	DEWAS(O&M)	TONKKHURD II	23.0981° N	76.2175° E	5.00	0.06	11 kV
173	DEWAS(O&M)	RATANKHEDI	23.1503° N	76.1001° E	5.00	2.25	11 kV
174	DEWAS(O&M)	BORKHALIYA	22.5409° N	76.3695° E	5.00	1.35	11 kV
175	DEWAS(O&M)	CHAPDA	22.7075° N	76.3218° E	5.00	1.54	11 kV
176	DEWAS(O&M)	PITAWALI	22.7581° N	76.3493° E	5.00	1.04	11 kV
177	DEWAS(O&M)	KANJAR	22.7826° N	76.4303° E	5.00	1.55	11 kV
178	DEWAS(O&M)	KARNAWAD	22.7297° N	76.2407° E	5.00	2.44	11 kV
179	DEWAS(O&M)	MANKUND	22.8599° N	76.2450° E	5.00	2.55	11 kV
180	DEWAS(O&M)	RATATALAI	22.5409° N	76.3695° E	5.00	1.25	11 kV
181	DEWAS(O&M)	PIPLANI	22.658949	76.746306	5.00	0.05	11 kV
182	DEWAS(O&M)	KUSMANIYA	22.658949	76.746306	5.00	0.25	11 kV
183	DEWAS(O&M)	EHV CAMPUS	22.658949	76.746306	5.00	0.19	11 kV
184	DEWAS(O&M)	PATRANI	22.75839	76.96687	5.00	3.54	11 kV
185	DEWAS(O&M)	POKHAR BUJURG	22.42988	76.68207	5.00	1.47	11 kV
186	DEWAS(O&M)	BHANDARIYA	22.53617	76.68445	5.00	0.75	11 kV
187	DEWAS(O&M)	SATWAS	22.59286	76.90704	5.00	1.03	11 kV
188	DHAR	AMBADA	22.21	74.86	5.00	5.00	11 kV
189	DHAR	AWALDA	22.45	74.95	5.00	2.93	11 kV
190	DHAR	BARWANIYA	22.13	74.64	5.00	2.09	11 kV
191	DHAR	BERCHA	22.54	75.46	5.00	1.82	11 kV
192	DHAR	BHAMAKHEDI	22.95	75.21	5.00	2.96	11 kV



S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
193	DHAR	BHARAWADA	22.72	74.99	5.00	1.70	11 kV
194	DHAR	BIDWAL	22.86	75.19	5.00	2.13	11 kV
195	DHAR	BILLODA	22.54	75.46	3.15	1.51	11 kV
196	DHAR	D.MADAIN	22.58	75.29	10.00	0.27	11 kV
197	DHAR	DAHI	22.28	74.92	5.00	2.82	11 kV
198	DHAR	DEVLA	22.35	75	5.00	0.79	11 kV
199	DHAR	DHOLANA	23.04	75.32	5.00	0.99	11 kV
200	DHAR	DHULET	22.6	74.87	5.00	0.71	11 kV
201	DHAR	JOLANA	22.68	75.08	5.00	2.96	11 kV
202	DHAR	KABARWA	22.27	75.02	5.00	2.31	11 kV
203	DHAR	KALIBAWADI	22.13	75.05	5.00	5.00	11 kV
204	DHAR	KALORA	22.92	75.24	5.00	1.38	11 kV
205	DHAR	KALWANI	22.13	75.05	10.00	5.74	11 kV
206	DHAR	KHACHRODA	22.84	75.41	3.15	2.00	11 kV
207	DHAR	KHAJURIYA	22.82	75.26	5.00	1.92	11 kV
208	DHAR	KHANDLAI	22.31	75.32	5.00	1.77	11 kV
209	DHAR	LABRIYA	22.59	75.12	5.00	1.52	11 kV
210	DHAR	LANGOOR	22.22	75.23	5.00	1.42	11 kV
211	DHAR	MANGOD	22.64	74.84	5.00	1.71	11 kV
212	DHAR	NAGDA	22.81	75.27	5.00	0.70	11 kV
213	DHAR	NANDLAI	22.67	74.96	3.15	1.84	11 kV
214	DHAR	NARAYANPURA	22.6	75.47	5.00	1.89	11 kV
215	DHAR	NARWALI	22.1	74.81	5.00	1.03	11 kV
216	DHAR	PADLIYA	22.55	75.32	5.00	1.26	11 kV

S. No	NAME OF CIRCLE	NAME OF SUBSTATION	LATITUDE OF S/S	LONGITUDE OF S/S	PROJECT CAPACITY (MW)	SOLAR PLANT CAPACITY OUT OF PROJECT CAPACITY ELIGIBLE FOR CFA (MW)	DELIVERY POINT
217	DHAR	PALWADA	22.81	75.34	5.00	1.56	11 kV
218	DHAR	PATADI	22.45	75.36	5.00	1.29	11 kV
219	DHAR	RAJOD	22.6	74.93	5.00	2.17	11 kV
220	DHAR	SATIPURA	22.44	75.17	5.00	5.00	11 kV
221	DHAR	SUSARI STRE	22.2	74.72	5.00	2.12	11 kV
222	DHAR	TAJPUR	22.69	75.36	3.15	1.79	11 kV
223	DHAR	TAKRAWDA	22.73	75.2	5.00	0.92	11 kV
224	DHAR	TALANPUR	22.51	74.85	5.00	1.66	11 kV
225	DHAR	TANDA	22.15	75.13	5.00	2.88	11 kV
226	DHAR	TAWLAI	22.26	75.12	10.00	3.19	11 kV
227	DHAR	TILGARA	23.02	75.24	5.00	1.68	11 kV
228	DHAR	UMARBAN	22.61	75.07	10.00	3.82	11 kV
229	DHAR	UTAWAD	22.62	75.39	5.00	1.52	11 kV
230	RATLAM	ALOT	23.76	75.55	5.00	1.78	11 kV
231	RATLAM	BARDIYA RATHORE	23.81	75.53	5.00	2.23	11 kV
232	RATLAM	BARKHEDA KALA	23.88	75.43	5.00	5.00	11 kV
233	RATLAM	BHOJAKHEDI	23.78	75.62	10.00	4.35	11 kV
234	RATLAM	DUDHAWATI	23.74	75.59	5.00	2.37	11 kV
235	RATLAM	GULBALOD	23.75	75.48	8.15	8.04	11 kV
236	RATLAM	HANUMANTIYA	23.83	75.48	5.00	5.00	11 kV
237	RATLAM	KHARWA KALA	23.73	75.04	10.00	8.86	11 kV
238	RATLAM	LASUDIYA JANGLI	23.62	75.23	5.00	3.64	11 kV
239	RATLAM	LODH	23.65	75.31	5.00	4.08	11 kV
240	RATLAM	LUNI	23.66	75.49	5.00	2.63	11 kV

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241	RATLAM	TAL	23.73	75.38	5.00	3.07	11 kV
242	RATLAM	BADAYALA CHORASI	23.57	75.08	10.00	4.60	11 kV
243	RATLAM	KHEDAWADA	23.59	74.89	5.00	3.52	11 kV
244	RATLAM	MACHUN	23.54	74.93	3.15	1.93	11 kV
245	RATLAM	MAMATKHEDA	23.67	75.08	5.00	3.89	11 kV
246	RATLAM	PANCHEWA	23.66	75.01	10.00	9.44	11 kV
247	RATLAM	RANI GAON	23.75	74.97	5.00	3.76	11 kV
248	RATLAM	ROZANA	23.68	75.14	10.00	7.48	11 kV
249	RATLAM	SEJAWATA	23.61	75.15	5.00	2.98	11 kV
250	RATLAM	UPLAI	23.58	75.15	10.00	9.26	11 kV
251	RATLAM	BIRMAWAL	23.12	75.13	10.00	8.44	11 kV
252	RATLAM	DHAMNOD	23.44	74.98	5.00	5.00	11 kV
253	RATLAM	DHOSWAS	23.41	75.07	5.00	3.34	11 kV
254	RATLAM	JADWASA	23.37	75.12	8.15	8.09	11 kV
255	RATLAM	KARAMDI	23.29	75.04	5.00	3.32	11 kV
256	RATLAM	KHETALPUR	23.33	75	5.00	1.99	11 kV
257	RATLAM	PALDUNA	23.51	75.01	5.00	2.96	11 kV
258	RATLAM	PALSODI	23.34	74.92	5.00	1.53	11 kV
259	RATLAM	PRITAM NAGAR	23.18	75.19	5.00	3.99	11 kV
260	RATLAM	RUPAKHEDA	23.23	75.12	5.00	4.76	11 kV
261	RATLAM	SARWAD	23.18	75.16	5.00	3.61	11 kV
262	RATLAM	SEMLIYA	23.45	75.1	10.00	9.84	11 kV
263	INDORE O&M	BAGANA	22.85	75.79	5.00	1.78	11 kV
264	INDORE O&M	BANEDIYA	22.85	75.57	5.00	2.86	11 kV

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265	INDORE O&M	BEGANDA	22.81	75.5	5.00	4.02	11 kV
266	INDORE O&M	GAWLA	22.66	75.69	10.00	5.64	11 kV
267	INDORE O&M	GIROTA	23.07	75.59	10.00	6.66	11 kV
268	INDORE O&M	JALODIYA PANTH	22.81	75.55	5.00	4.27	11 kV
269	INDORE O&M	LIMBODAPAR	22.86	75.47	10.00	4.20	11 kV
270	INDORE O&M	NAVDAPANTH	22.69	75.77	10.00	3.39	11 kV
271	INDORE O&M	OSRA	23.04	75.61	5.00	1.54	11 kV
272	INDORE O&M	RUNJI	22.99	75.54	5.00	0.99	11 kV
273	INDORE O&M	TALAWALI	23.02	75.54	5.00	3.65	11 kV
274	INDORE O&M	CHIKLONDA	22.77	75.56	5.00	1.38	11 kV
275	INDORE O&M	KHEDA	22.59	75.65	5.00	1.20	11 kV
276	INDORE O&M	METHWADA	22.67	75.55	5.00	3.10	11 kV
277	INDORE O&M	RANGWASA (PITHAMPUR)	22.74	75.57	5.00	1.55	11 kV
278	INDORE O&M	SAGORE	22.6	75.61	5.00	2.14	11 kV
279	INDORE O&M	JOSHIGURADIYA	22.61	75.94	5.00	2.44	11 kV
280	INDORE O&M	KADVAALI	22.95	75.58	5.00	1.63	11 kV
281	INDORE O&M	KHEDI SIHOD	22.49	75.57	5.00	2.63	11 kV
282	INDORE O&M	KHURDEE	22.37	75.65	5.00	5.00	11 kV
283	INDORE O&M	LUNERA	22.16	75.45	5.00	1.25	11 kV
284	INDORE O&M	BARLAI JAGIR	22.9	75.96	5.00	3.01	11 kV
285	INDORE O&M	BAWLIA	22.69	76.09	5.00	5.00	11 kV
286	INDORE O&M	BILODA NAYTA	23.01	75.87	5.00	1.39	11 kV
287	INDORE O&M	BUDI BARLAI	22.89	75.98	10.00	3.16	11 kV

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288	INDORE O&M	BURANA KHEDI	22.77	76.01	5.00	1.85	11 kV
289	INDORE O&M	CHANDRAWATI GANJ	23.01	75.68	10.00	4.97	11 kV
290	INDORE O&M	DAKACHYA	22.84	75.94	5.00	3.00	11 kV
291	INDORE O&M	DHARAMPURI (INDORE)	22.86	75.85	10.00	6.38	11 kV
292	INDORE O&M	DHATURIYA	22.9	75.79	5.00	4.45	11 kV
293	INDORE O&M	DUDHIYA	22.68	75.95	10.00	3.71	11 kV
294	INDORE O&M	GARIPILIYA	22.71	76.01	5.00	1.68	11 kV
295	INDORE O&M	IMLIKHEDA	22.84	75.87	5.00	0.29	11 kV
296	INDORE O&M	KASTURBAGRAM	22.74	75.86	10.00	1.36	11 kV
297	INDORE O&M	KHALKHLA	22.95	75.69	10.00	1.89	11 kV
298	INDORE O&M	KHUDEL	22.69	76.03	10.00	7.16	11 kV
299	INDORE O&M	MOROD	22.63	75.87	5.00	0.99	11 kV
300	INDORE O&M	MOROD HAAT	22.69	76.07	5.00	1.59	11 kV
301	INDORE O&M	NEW SANWER	22.98	75.9	10.00	4.54	11 kV
302	INDORE O&M	PALASIYA	22.86	75.99	5.00	2.22	11 kV
303	INDORE O&M	PANCHOLA	22.99	75.79	5.00	0.44	11 kV
304	INDORE O&M	PANOD	22.8	75.98	5.00	0.07	11 kV
305	INDORE O&M	SANWER	22.98	75.9	10.00	4.74	11 kV
306	INDORE O&M	SIVNI	22.67	76.14	10.00	6.68	11 kV
307	INDORE O&M	TARANA	22.92	75.85	10.00	5.31	11 kV
308	INDORE O&M	TODI	22.86	75.91	10.00	3.58	11 kV
309	INDORE O&M	UJJAINI	22.64	75.99	5.00	4.40	11 kV
310	KHARGONE	UMARKHALI	21.72	75.59	5.00	1.17	11 kV
311	KHARGONE	Mogaragon	21.7	75.82	5.00	2.22	11 kV

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312	KHARGONE	Sangvi	21.75	75.39	5.00	1.64	11 kV
313	KHARGONE	Lonara	21.93	75.38	5.00	1.46	11 kV
314	KHARGONE	Golwadi	21.81	75.3	5.00	1.84	11 kV
315	KHARGONE	Mohanpura	21.62319235498358	75.75	5.00	1.29	11 kV
316	KHARGONE	Dasnawal(Bilali)	21.79	75.79	5.00	3.92	11 kV
317	KHARGONE	Dodwa	22.03	76.13	10.00	1.65	11 kV
318	KHARGONE	Mitawal	21.71	76.14	3.15	0.07	11 kV
319	KHARGONE	SAIKHEDA	21.7	75.97	5.00	0.74	11 kV
320	KHARGONE	Shivna	21.77	76.03	5.00	0.47	11 kV
321	KHARGONE	JEMALPURA	22.25	76.01	5.00	1.74	11 kV
322	KHARGONE	BELSAR	22.22	76.01	3.15	1.38	11 kV
323	KHARGONE	MARDANA	22.17	75.83	5.00	0.58	11 kV
324	KHARGONE	BANJARI	22.24	75.94	5.00	0.93	11 kV
325	KHARGONE	NILKANTH	22.14	75.97	5.00	1.14	11 kV
326	KHARGONE	AMBA	22.05	75.94	5.00	0.83	11 kV
327	KHARGONE	Malgoan	22.16	75.79	5.00	1.31	11 kV
328	KHARGONE	Pipalgone	22.1	75.76	5.00	0.51	11 kV
329	KHARGONE	Khamkheda	22.04	75.74	5.00	1.00	11 kV
330	KHARGONE	Bhesawad	22.02	75.45	5.00	0.59	11 kV
331	KHARGONE	Nimchadi Main	21.95	75.63	5.00	1.67	11 kV
332	KHARGONE	Gadi	22.31	75.52	5.00	4.72	11 kV
333	KHARGONE	Bhangaon	22.03	75.67	5.00	1.07	11 kV
334	KHARGONE	TITRANIYA	75.9	21.73	5.00	0.40	11 kV

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335	KHARGONE	CHIRIYA	75.89	21.6	5.00	2.20	11 kV
336	NEEMUCH	SAWAN	24.45	75.07	8.15	6.25	11 kV
337	NEEMUCH	KHETAKHEDA	24.35	74.94	5.00	4.56	11 kV
338	NEEMUCH	INDUSTRIAL AREA	24.48	74.87	5.00	1.78	11 kV
339	NEEMUCH	HANMANTIYA PAWAR	24.4	75.04	10.00	6.46	11 kV
340	NEEMUCH	REVLII-DEVLI	24.46	74.98	5.00	5.00	11 kV
341	NEEMUCH	CHITA KHEDA	24.32	74.81	10.00	7.13	11 kV
342	NEEMUCH	DARUKHEDA	24.48	74.77	5.00	3.90	11 kV
343	NEEMUCH	DHANERIYA	24.46	74.83	5.00	3.04	11 kV
344	NEEMUCH	JAISINGH PURA	24.4	74.85	5.00	5.00	11 kV
345	NEEMUCH	KANAWATI	24.49	74.85	3.15	2.42	11 kV
346	NEEMUCH	BISALWAS KALA	24.51	74.79	8.15	4.86	11 kV
347	NEEMUCH	BHARBHADIYA	24.52	74.87	5.00	3.14	11 kV
348	NEEMUCH	NILIYA	24.64	75.07	5.00	2.89	11 kV
349	NEEMUCH	KELUKHEDA	24.61	74.91	5.00	3.92	11 kV
350	NEEMUCH	MORWAN	24.62	75	10.00	5.44	11 kV
351	NEEMUCH	SARVANIYA MAHARAJ	24.57	74.96	10.00	7.85	11 kV
352	NEEMUCH	JAWAD	24.58	74.87	10.00	8.60	11 kV
353	NEEMUCH	NAYAGAON	24.56	74.78	10.00	5.72	11 kV
354	NEEMUCH	SARODA	24.71	74.81	5.00	3.27	11 kV
355	NEEMUCH	SARWANIYA MASANI	24.61	74.81	5.00	3.02	11 kV
356	NEEMUCH	BAGHPURA	24.87	74.86	5.00	3.14	11 kV
357	NEEMUCH	KANKRIYATALAI	24.87	75.08	3.15	2.00	11 kV
358	NEEMUCH	ATHWA KALAN	24.25	74.84	3.15	3.15	11 kV

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359	NEEMUCH	FUSARIYA	24.98	75.29	10.00	4.98	11 kV
360	NEEMUCH	KADWASA	24.97	75.14	10.00	4.49	11 kV
361	NEEMUCH	LADPURA	24.99	75.17	5.00	4.60	11 kV
362	NEEMUCH	UMMED PURA	24.25	74.84	5.00	1.81	11 kV
363	NEEMUCH	BADKUA	24.65	75.23	5.00	0.60	11 kV
364	NEEMUCH	DEORI	24.37	75.15	5.00	0.69	11 kV
365	NEEMUCH	KHANKHEDI	24.35	75.28	5.00	0.69	11 kV
366	NEEMUCH	BARKHEDA	24.65	75.23	5.00	0.32	11 kV
367	NEEMUCH	DHANDERI	24.58	75.04	5.00	0.50	11 kV
368	NEEMUCH	KUKDESHWAR	24.35	75.26	10.00	0.75	11 kV
369	NEEMUCH	AMARPURA	24.53	75.45	5.00	0.59	11 kV
370	MANDSAUR	NIMTHUR-OSARNA	24.53	75.81	5.00	0.43	11 kV
371	MANDSAUR	BARODIYA CHOUKI	24.61	75.69	8.15	2.22	11 kV
372	MANDSAUR	ANTRALIYA	24.44	75.65	5.00	1.44	11 kV
373	MANDSAUR	KHARAWDA	24.37	75.54	10.00	5.28	11 kV
374	MANDSAUR	LOTHKHEDI	24.46	75.75	5.00	2.72	11 kV
375	MANDSAUR	PIPLIYA JATI	24.33	75.59	5.00	2.72	11 kV
376	MANDSAUR	SATHKHEDA	24.28	75.56	5.00	4.27	11 kV
377	MANDSAUR	BAAPCHYA	24.13	75.48	5.00	2.67	11 kV
378	MANDSAUR	BHAGUNIYA	24.13	75.48	3.15	1.42	11 kV
379	MANDSAUR	KURAWAN	24.16	75.55	5.00	2.16	11 kV
380	MANDSAUR	KHAJURI PANTH	24.21	75.71	10.00	4.40	11 kV
381	MANDSAUR	NAHARGARH	24.15	75.24	10.00	9.38	11 kV
382	MANDSAUR	LASUDIYA	23.84	75.33	5.00	4.37	11 kV



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383	MANDSAUR	MANPURA	23.89	75.36	10.00	5.99	11 kV
384	MANDSAUR	NATARAM	24.07	75.32	8.15	5.31	11 kV
385	MANDSAUR	KACHRIYA	24.07	75.42	3.15	2.13	11 kV
386	MANDSAUR	KOTDA BAHADUR	24.16	75.35	5.00	3.68	11 kV
387	MANDSAUR	SEMLI KANKAD	24.1	75.69	5.00	2.74	11 kV
388	MANDSAUR	GOVERDHANPURA	24.04	75.57	8.15	3.54	11 kV
389	MANDSAUR	LADUSA	24	75.13	8.15	4.72	11 kV
390	MANDSAUR	AMLAWAD	23.99	75.04	10.00	7.46	11 kV
391	MANDSAUR	BHALOT	24	75	5.00	3.07	11 kV
392	MANDSAUR	JAGGAKHEDI(M)	24.11	75.09	5.00	4.49	11 kV
393	MANDSAUR	KHILCHIPURA	24.04	75.07	10.00	6.64	11 kV
394	MANDSAUR	BHUNIYAKHEDI	24.11	75.04	5.00	5.00	11 kV
395	MANDSAUR	RISHIYANAND	24.07	75.03	10.00	4.37	11 kV
396	MANDSAUR	JAGGAKHEDI(N)	24.1	75.18	10.00	8.20	11 kV
397	MANDSAUR	AKIYA BIKA	24.26	75.24	3.15	2.40	11 kV
398	MANDSAUR	BILLOD	24.24	75.33	10.00	6.44	11 kV
399	MANDSAUR	HINGORIYA	24.24	75.33	5.00	2.85	11 kV
400	MANDSAUR	SANJEET	24.28	75.29	10.00	5.71	11 kV
401	MANDSAUR	TAKRAWAD	24.25	75.2	5.00	1.97	11 kV
402	MANDSAUR	KANGHATTI	24.21	74.93	8.15	5.55	11 kV

**ANNEXURE – 2 – Model PPA**

**STANDARD**

**POWER PURCHASE AGREEMENT FOR**

**PROCUREMENT OF ..... MW \_\_\_\_ POWER ON LONG TERM**

**BASIS**

**Between**

**[Name of Renewable Power Generator]**

**And**

**Madhya Pradesh Power Management Company Limited**

**[month and year]**

This Power Purchase Agreement is made on the \_\_\_\_ day of \_\_\_\_\_ of \_\_\_\_\_ at \_\_\_\_\_

Between

\_\_\_\_\_ [name of the Renewable Power Generator], \_\_\_\_\_, [details of Renewable Power Generator] (hereinafter referred to as “**Renewable Power Generator or RPG**”, which expression shall, unless repugnant to the context or meaning thereof, be deemed to include its successors and permitted assigns) as a Party of the **First Part**;

And

**Madhya Pradesh Power Management Company Limited**, a company incorporated under the Companies Act 1956, having its registered office at \_\_\_\_\_ (hereinafter referred to as “**PROCURER**”, which expression shall, unless repugnant to the context or meaning thereof, be deemed to include its successors and assignees) as a Party of the **Second Part**;

The RPG and PROCURER are individually referred to as ‘Party’ and collectively referred to as ‘Parties’.

**WHEREAS:**

- A. The Ministry of New and Renewable Energy [MNRE] has launched PM KUSUM scheme for farmers on 8th March 2019 and issued implementation guidelines subsequently;
- B. MNRE issued comprehensive guidelines for feeder level solarization under KUSUM-C scheme on 17 January 2024;
- C. As per MNRE guidelines for feeder level solarization under component-C of PM KUSUM scheme, Government of India (GoI) shall provide subsidy in the form of central financial assistance (CFA) for projects meant for feeder level solarization (FLS) of agricultural feeders. The details of CFA is provided at Article \_\_\_\_ of this PPA;
- D. Tariff for projects set up under feeder level solarization has been arrived at after factoring in the GoI subsidy from total project cost;
- E. The MNRE has accorded a sanction and allotted solarization of \_\_\_\_\_ pumps through feeder level solarization to Madhya Pradesh Urja Vikas Nigam Limited for under the said scheme on \_\_\_\_\_.20\_\_.
- F. Madhya Pradesh Urja Vikas Nigam Limited had initiated a selection process for procurement of \_\_\_\_ MW of the power generated from the Grid Connected \_\_\_\_\_ Power Project on the terms and conditions contained in the RFP No. \_\_\_\_\_ dated \_\_\_\_\_
- G. The RPG has been selected in the Process for development, generation and supply of electricity from the \_\_\_\_ MW \_\_\_\_\_ Power Project to be established by RPG at [location of proposed power plant] and electricity generated to be fed at \_\_\_\_ kV bus of \_\_\_\_ the \_\_\_\_\_ [Name and location of \_\_\_\_ kV substation];

- H. Madhya Pradesh Urja Vikas Nigam Limited has issued the Letter of Award No. \_\_\_\_\_ dated in favour of the RPG for development and establishment of the \_\_\_\_\_ MW \_\_\_\_\_ Power Project as per the terms and conditions contained in the RFP.
- I. The RPG has furnished the Performance Bank Guarantee in the sum of Rs \_\_\_\_\_ in favour of PROCURER as per the format prescribed by the PROCURER.
- J. The RPG has fulfilled the terms and conditions for signing this Power Purchase Agreement as a definitive agreement for establishing the \_\_\_\_\_ Power Project of \_\_\_\_\_ MW at \_\_\_\_\_, for generation and sale of electricity by the RPG to PROCURER at \_\_\_\_\_ kV S/ S;
- K. The parties have agreed to execute this Power Purchase Agreement in terms of the EoI/ RfS and the Letter of Award in regard to the terms and conditions for establishment of the \_\_\_\_\_ Power Project at, and for generation and supply of electricity by the RPG to PROCURER.

**Now therefore, in consideration of the premises and mutual agreements, covenants and conditions set forth herein, it is hereby agreed by and between the Parties as follows:**

## **ARTICLE 1: DEFINITIONS AND INTERPRETATION**

### **1.1 Definitions**

The terms used in this Agreement, unless as defined below or repugnant to the context, shall have the same meaning as assigned to them by the Electricity Act, 2003 and the rules or regulations framed there under, including those issued/ framed by the Appropriate Commission (as defined hereunder), as amended or re-enacted from time to time.

"Act" or "Electricity Act, 2003"	shall mean the Electricity Act, 2003 and include any modifications, amendments and substitution from time to time;
"Agreement" or "Power Purchase Agreement" or "PPA"	shall mean this Power Purchase Agreement including its recitals and Schedules, amended or modified from time to time in accordance with the terms hereof;
"Appropriate Commission"	Unless otherwise stated, Appropriate Commission shall be the commission of the state where PROCURER is situated;
"Bill Dispute Notice"	shall mean the notice issued by a Party raising a Dispute regarding a Monthly Bill or a Supplementary Bill issued by the other Party;
"Business Day"	shall mean with respect to RPG and PROCURER, a day other than Sunday or a statutory holiday, on which the banks remain open for business in the State;

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"Capacity Utilisation Factor" or "CUF"	shall have the same meaning as provided in CERC (Terms and Conditions for Tariff determination from Renewable Energy Sources) Regulations, 2009 as amended from time to time; However for avoidance of any doubt, it is clarified that the CUF shall be calculated on the Contracted Capacity; In any Contract Year, if 'X' MWh of energy has been metered out at the Delivery Point for 'Y' MW Project capacity, $CUF = (X \text{ MWh} / (Y \text{ MW} * 8766)) * 100\%$ ;
Central Financial Assistance (CFA)	shall be governed by relevant and applicable Subsidy provisions of Govt. of India and its guidelines valid at the time of bid submission date.  Details of it is provided at Article ____ of PPA .
"Change in Law"	shall have the meaning ascribed thereto in Article 12 of this Agreement;
"Commercial Operation Date (COD)"	shall mean the date on which the commissioning certificate is issued upon successful commissioning (as per provisions of this Agreement) of the project;
"Competent Court of Law"	shall mean any court or tribunal or any similar judicial or quasi- judicial body in India that has jurisdiction to adjudicate upon issues relating to this Agreement;
"Consents, Clearances and	shall mean all authorizations, licenses, approvals, registrations, permits, waivers,
"Permits"	privileges, acknowledgements, agreements, or concessions required to be obtained from or provided by any concerned authority for the purpose of setting up of the generation facilities and/ or supply of power;
"Consultation Period"	shall mean the period of ninety (90) days or such other longer period as the Parties may agree, commencing from the date of issuance of a RPG Preliminary Default Notice or PROCURER Preliminary Default Notice as provided in Article 13 of this Agreement, for consultation between the Parties to mitigate the consequence of the relevant event having regard to all the circumstances;
"Contract Year"	shall mean the period beginning from the Effective Date and ending on the immediately succeeding March 31 and thereafter each period of 12 months beginning on April 1 and ending on March 31 provided that:  (i) in the financial year in which the COD would occur, the Contract Year shall end on the date immediately before the COD and a new Contract Year shall commence once again from the COD and end on the immediately succeeding March 31, and thereafter each period of twelve (12) months commencing on April 1 and ending on March 31, and  (ii) provided further that the last Contract Year of this Agreement shall end on the last day of the Term of this Agreement
"Contracted Capacity"	shall mean [Insert capacity] MW contracted with PROCURER for supply by the RPG to PROCURER at the Delivery Point from the Power Project;

"Delivery Point"	<p>shall mean be ___ kV bus bar at the ___ kV Sub-station. Metering shall be done at this interconnection point where the power is injected into the ___ kV Sub-station. Depending upon Project Capacity, there could be multiple interconnection cum delivery points at same substation at ___ kV voltage level depending upon injection capacity of ___ kV generating feeder connecting SPP with concerned ___ kV substation</p> <p>For interconnection with grid and metering, the RPG shall abide by the relevant and applicable regulations, Grid Code notified by the State Commission and Central Electricity Authority (Installation and Operation of Meters) Regulations, 2006 as amended and revised from time to time, or orders passed thereunder by the Appropriate Commission or CEA. All charges and losses related to Transmission of power from project up to Delivery Point as notified by the Appropriate Commission shall be borne by the RPG.</p>
"Dispute"	shall mean any dispute or difference of any kind between PROCURER and the RPG, in connection with or arising out of this Agreement including but not limited to any issue on the interpretation and scope of the terms of this Agreement as provided in Article 16 of this Agreement;
"Due Date"	Due Date shall mean the forty-fifth (45th) day after a Monthly Bill (including all the relevant documents) or a Supplementary Bill is received in hard copy and duly acknowledged by the PROCURER or, if such day is not a Business Day, the immediately succeeding Business Day, by which date such Monthly Bill or a Supplementary Bill is payable by the PROCURER.
"Effective Date"	shall have the meaning ascribed thereto in Article 2.1 of this Agreement;
"Electricity Laws"	shall mean the Electricity Act, 2003 and the rules and regulations made there under from time to time along with amendments thereto and replacements thereof and any other Law pertaining to electricity including regulations framed by the Appropriate Commission;
"Event of Default"	shall mean the events as defined in Article 13 of this Agreement;
"Expiry Date"	Shall mean the date occurring twenty-five (25) years from the Commercial Operation Date subject to that the supply of power shall be limited for a period of 25 years from the COD unless extended by the Parties as per this Agreement;
"Financing Agreements"	shall mean the agreements pursuant to which the RPG has sought financing for the Power Project including the loan agreements, security documents, notes, indentures, security agreements, letters of credit and other documents, as may be amended, modified, or replaced from time to time, but without in anyway increasing the liabilities of PROCURER;
"Force Majeure" or "Force Majeure Event"	shall have the meaning ascribed thereto in Article 11 of this Agreement;
"Indian Governmental Instrumentality"	shall mean the Government of India, Governments of state of and any ministry, department, board, authority, agency, corporation, commission under the direct or indirect control of Government of India or the above state Government or both, any political sub-division of any of them including any court or Appropriate Commission or tribunal or judicial or quasi-judicial body in India;

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"Insurances"	shall mean the insurance cover to be obtained and maintained by the RPG in accordance with Article 8 of this Agreement;
"Interconnection Facilities"	shall mean the facilities on RPG's side of the Delivery Point for scheduling, transmitting and metering the electrical output in accordance with this Agreement and which shall include, without limitation, all other transmission lines and associated equipment, transformers, relay and switching equipment and protective devices, safety equipment and RTU, Data Transfer and Acquisition facilities for transmitting data subject to Article 7, the Metering System required for supply of power as per the terms of this Agreement;
"Invoice" or "Bill"	shall mean either a Monthly Bill / Supplementary Bill or a Monthly Invoice/ Supplementary Invoice raised by any of the Parties;
"Late Payment Surcharge"	shall have the meaning ascribed thereto in Article 10.3.3 of this Agreement;
"Law"	shall mean in relation to this Agreement, all laws including Electricity Laws in force in India and any statute, ordinance, regulation, notification or code, rule, or any interpretation of any of them by an Indian Governmental Instrumentality and having force of law and shall further include without limitation all applicable rules, regulations, orders, notifications by an Indian Governmental Instrumentality pursuant to or under any of them and shall include without limitation all rules, regulations, decisions and orders of the Appropriate Commissions;
"Letter of Credit" or "L/ C"	shall have the meaning ascribed thereto in Article 10.4 of this Agreement;
"Letter of Award" or "LoA"	shall mean Letter of Award issued by Madhya Pradesh Urja Vikas Nigam Limited to the RPG for the project;
"MNRE"	shall mean the Ministry of New and Renewable Energy, Government of
"Month"	shall mean a period of thirty (30) days from (and excluding) the date of the event, where applicable, else a calendar month;
"Normative Scheduled Commissioning Date" or "NSCD"	shall mean a date falling on last day of eighteenth (18th) month from date of LoA;
"Party" and "Parties"	shall have the meaning ascribed thereto in the recital to this Agreement;
"Payment Security Mechanism"	shall have the meaning ascribed thereto in Article 10.4 of this Agreement;



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“Power Project” or “Project”	shall mean the _____ power generation facility of Contracted Capacity of [Insert capacity] MW, located at _____, [Insert name of the District and State] having a separate control system, metering and separate points of injection into the grid at Delivery point of ____ kV substation.  The Project shall include all units and auxiliaries such as water supply, treatment or storage facilities, bay(s) for transmission system in the switchyard, dedicated transmission line up to the Delivery Point and all the other assets, buildings/ structures, equipment, plant and machinery, facilities and related assets required for the efficient and economic operation of the power generation facility, whether completed or at any stage of development and construction or intended to be developed and constructed for the purpose of supply of power as per this Agreement;
“Preliminary Default Notice”	shall have the meaning ascribed thereto in Article 13 of this Agreement;
“Project Capacity”	shall mean the maximum AC capacity of the Project at the point of injection on which the Power Purchase Agreement has been signed.
"Prudent Utility Practices"	shall mean the practices, methods and standards that are generally accepted internationally from time to time by electric utilities for the purpose of ensuring the safe, efficient and economic design, construction, commissioning, operation and maintenance of power generation equipment and which practices, methods and standards shall be adjusted as necessary, to take account of:  a) Operation and maintenance guidelines recommended by the manufacturers of the plant and equipment to be incorporated in the Power Project;
“Rebate”	shall have the same meaning as ascribed thereto in Article 10.3.5 of this Agreement;
"Rupees", "Rs.",	shall mean Indian rupees, the lawful currency of India;
Renewable Power Generator	Shall mean bidding Company/ Limited Liability Partnership (LLP) firm/ Partnership Firm/ Sole Proprietor or Consortium/ JV in any form submitting the Bid and is hereinafter also called Renewable Power Generator (RPG). They must participate in the selection process to be carried out by Madhya Pradesh Urja Vikas Nigam Ltd.. The successful RPG shall have to sign PPA and install the plant as per provisions of the PM KUSUM scheme guidelines and applicable rules and regulations.
“Scheduled Commissioning Date” or “SCD” of the Project	Shall mean the end date of NSCD or SSD, whichever is earlier.



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"Scheme Sunset Date" or "SSD"	shall mean a date notified by Ministry of New and Renewable Energy Govt. of India (MNRE), when overall sanction timelines of Component- (FLS) of PM KUSUM Scheme would cease to exist, which, unless modified by MNRE, is 31.03.3026
"Tariff"	Shall have the same meaning as provided for in Article 9 of this Agreement;
"Tariff Payment"	shall mean the payments to be made under Monthly Bills as referred to in Article 10 and the relevant Supplementary Bills;
"Termination Notice"	shall mean the notice given by either Parties for termination of this Agreement in accordance with Article 13 of this Agreement;
"Term of Agreement"	"Term of shall have the meaning ascribed thereto in Article 2 of this Agreement;

## **ARTICLE 2: TERM OF AGREEMENT**

### **2.1 *Effective Date***

2.1.1 This Agreement shall come into effect from date of signing of this Agreement (insert date) by the parties and such date shall be referred to as the Effective Date

### **2.2 *Term of Agreement***

2.2.1 Subject to Article 2.3 and 2.4 of this Agreement, this Agreement shall be valid for a term from the Effective Date until the Expiry Date. This Agreement may be extended for a further period at least one hundred eighty (180) days prior to the Expiry Date, on mutually agreed terms and conditions.

2.2.2 The RPG is free to operate their plants beyond the Expiry Date if other conditions like land lease / Right to Use of Land (as applicable), permits, approvals and clearances etc. allow. In such case unless otherwise agreed by the PROCURER, PROCURER shall not be obligated to procure power beyond the Expiry Date.

### **2.3 *Early Termination***

2.3.1 This Agreement shall terminate before the Expiry Date if either PROCURER or RPG terminates the Agreement, pursuant to Article 13 of this Agreement.

### **2.4 *Survival***

2.4.1 The expiry or termination of this Agreement shall not affect any accrued rights, obligations and liabilities of the Parties under this Agreement, including the right to receive penalty as per the terms of this Agreement, nor shall it affect the survival of any continuing obligations for which this Agreement provides, either expressly or by necessary implication, which are to survive after the Expiry Date or termination including those under Article 11 (Force Majeure), Article 13 (Events of Default and Termination), Article 14 (Liability and Indemnification), Article 16 (Governing Law and Dispute Resolution), Article 17 (Miscellaneous Provisions), and other Articles and Schedules of this Agreement which expressly or by their nature survive the Term or termination of this Agreement shall continue and survive any expiry or termination of this Agreement.

## **ARTICLE 3: CONDITIONS SUBSEQUENT**

3.1 The RPG agrees and undertakes to make Project Financing Arrangements for its Project and shall provide necessary documents to PROCURER in this regard **within six Months**

from Effective Date for the project but not after nine months before NSCD or SSD, whichever is earlier.

## **ARTICLE 4: CONSTRUCTION & DEVELOPMENT OF THE PROJECT**

### **4.1 *RPG's Obligations***

4.1.1 The RPG undertakes to be responsible, at RPG's own cost and risk, for:

- a) The RPG shall be solely responsible and make arrangements for Land & associated infrastructure for development of the Project and for Connectivity with the \_\_\_\_ kV sub-station for confirming the evacuation of power by the Scheduled Commissioning date or COD, whichever is earlier, and all clearances related thereto; The RPG shall furnish the necessary documents to establish possession in the name of the RPG of the required land/ Lease Agreement;
- b) Obtaining all Consents, Clearances and Permits as required and maintaining all documents.
- c) Design, Supply, Construction, Erection, Testing and Commissioning, of Solar Power Project in accordance with the applicable Law, Grid Code, as per regulations and terms & conditions of the Agreement as well as Prudent Utility Practices.
- d) The commencement of supply of power up to the Contracted Capacity to PROCURER no later than the Scheduled Commissioning Date and continuance of the supply of power throughout the term of the Agreement;
- e) Connecting the Power Project switchyard with the Interconnection Facilities at the Delivery Point. The RPG shall make adequate arrangements to connect the Power Project switchyard with the Interconnection Facilities at Interconnection / Metering / Delivery Point.
- f) Owning the Power Project throughout the Term of Agreement free and clear of encumbrances, except those expressly permitted under Article 15;
- g) Fulfilling all obligations undertaken by the RPG under this Agreement.
- h) The RPG shall be responsible to for directly coordinating and dealing with the PROCURER, and other authorities in all respects in regard to declaration of availability, scheduling and dispatch of Power and due compliance with deviation and settlement mechanism and the applicable Grid code/ State Regulations.
- i) All costs and charges including but not limited to line losses and other charges up to the point of interconnection, if applicable, associated with the evacuation arrangement shall be borne by RPG.

### **4.2 *Purchase and sale of Contracted Capacity***

4.2.1 Subject to the terms and conditions of this Agreement, the RPG undertakes to sell to PROCURER and PROCURER undertakes to pay Tariff for all the energy supplied at the Delivery Point corresponding to the Contracted Capacity.

4.2.2 The RPG shall not sell power generated from concerned Project to any buyer other than the Procurer during whole tenure of PPA. In case an RPG is found to do this under any circumstances, proportionate amount of CFA shall be refunded by such RPG (Calculation of proportionality shall be based on annual energy generation calculated at 21% CUF)

#### **4.3 *Right to Contracted Capacity & Energy***

4.3.1 Subject to Article 4.9, PROCURER, in any Contract Year shall purchase full energy generated from Project during the PPA period at the PPA tariff of that year. For any Contract Year except for the first year of operation, the RPG shall be required to achieve a minimum CUF of 15% on annual basis during the period of PPA. For the first year of operation, the above limits shall be considered on pro-rata basis. The lower limit will, however, be relaxable by PROCURER to the extent of grid non-availability for evacuation which is beyond the control of the RPG.

4.3.2 In case at any point of time, the peak of capacity reached is higher than the contracted capacity and causes disturbance in the system at the point where power is injected, the RPG will have to forego the excess generation and reduce the output to the contract capacity and shall also have to pay the penalty/ charges (if applicable) as per applicable regulations.

#### **4.4 *Extensions of Time***

4.4.1 In the event that the RPG is prevented from performing its obligations under Article 4.1 by the Scheduled Commissioning Date due to:

- a) any PROCURER Event of Default; or
- b) Force Majeure Events affecting PROCURER, or
- c) Force Majeure Events affecting the RPG,

the Scheduled Commissioning Date and the Expiry Date shall be deferred, subject to Article

4.4.5, for a reasonable period but not less than 'day for day' basis, to permit the RPG or PROCURER through the use of due diligence, to overcome the effects of the Force Majeure Events affecting the RPG or PROCURER, or till such time such Event of Default is rectified by PROCURER.

4.4.2 In case of extension due to reasons specified in Article 4.4.1(b) and (c), and if such Force Majeure Event continues even after a maximum period of three (3) months, any of the Parties may choose to terminate the Agreement as per the provisions of Article 13.5. In case neither party terminates the agreement under this clause, the agreement shall stand terminated on the expiry of twelve (12) months of the continuation of the Force majeure event unless the parties mutually agree to extend the agreement for the further period.

4.4.3 If the Parties have not agreed, within thirty (30) days after the affected Party's performance has ceased to be affected by the relevant circumstance, on the time period by which the Scheduled Commissioning Date or the Expiry Date should be deferred, any Party may raise

the Dispute to be resolved in accordance with Article 16.

4.4.4 As a result of such extension, the newly determined Scheduled Commissioning Date and newly determined Expiry Date shall be deemed to be the Scheduled Commissioning Date and the Expiry Date for the purposes of this Agreement.

4.4.5 Notwithstanding anything to the contrary contained in this Agreement, any extension of the Scheduled Commissioning Date arising due to any reason envisaged in this Agreement shall not be allowed beyond the date pursuant to Article 4.5.2.

4.4.6 Delay in commissioning of the project beyond the scheduled commissioning date for reasons other than those specified in Article 4.4.1 shall be an event of default on part of the RPG and shall be subject to the consequences specified in the Article 4.5.

#### **4.5 *Liquidated Damages not amounting to penalty for delay in Commissioning***

4.5.1 If the RPG is unable to commission the Project by the Scheduled Commissioning Date other than for the reasons specified in Article 4.4.1, the RPG shall pay to PROCURER, damages for the delay in such commissioning and making the Contracted Capacity available for dispatch by the Scheduled Commissioning Date as per the following:

Delay beyond the Scheduled Commissioning Date upto (& including) the date as on eighteen (18) months from date of LoA: The total Performance Bank Guarantee amount shall be encashed on per day basis and proportionate to the balance capacity not commissioned.

4.5.2 The maximum time period allowed for commissioning of the full Project Capacity with encashment of Performance Bank Guarantee shall be limited to twenty (20) Months from the date of LoA. In case, the Commissioning of the Project is delayed beyond twenty (20) Months from the date of LoA, it shall be considered as an RPG Event of Default and provisions of Article 13 shall apply and the Contracted Capacity shall stand reduced / amended to the Project Capacity Commissioned within twenty (20) Months from date of LOA and the PPA for the balance Capacity will stand terminated and shall be reduced from the project capacity.

4.5.3 The RPG further acknowledge that the amount of the liquidated damages fixed is genuine and reasonable pre-estimate of the damages that may be suffered by PROCURER.

#### **4.6 *Acceptance/ Performance Test***

4.6.1 Prior to synchronization of the Power Project, the RPG shall be required to get the Project certified for the requisite acceptance/ performance test as may be laid down by respective authorities.

#### **4.7 *Third Party Verification***

4.7.1 The RPG shall be further required to provide entry to the site of the Power Project free of all encumbrances at all times during the Term of the Agreement to PROCURER and a third Party nominated by any Indian Governmental Instrumentality for inspection and verification of the works being carried out by the RPG at the site of the Power Project.

4.7.2 The third party may verify the construction works/ operation of the Power Project being carried out by the RPG and if it is found that the construction works/ operation of the Power Project is not as per the Prudent Utility Practices, it may seek clarifications from RPG or require the works to be stopped or to comply with the instructions of such third party.

#### 4.8 ***Breach of Obligations***

4.8.1 The Parties herein agree that during the subsistence of this Agreement, subject to PROCURER being in compliance of its obligations & undertakings under this Agreement, the RPG would have no right to negotiate or enter into any dialogue with any third party for the sale of Contracted Capacity of power which is the subject matter of this Agreement. It is the specific understanding between the Parties that such bar will apply throughout the entire term of this Agreement.

#### 4.9 ***Generation compensation for Off-take constraints***

4.9.1 Generation Compensation in offtake constraints due to Grid Unavailability: During the operation of the plant, the grid will be unavailable to the extent **of 50 hours** in any contract year annually for maintenance except for first year of contract. The grid unavailability for the first year of operation shall be considered on pro-rata basis. However, there can be some periods where the Project can generate power but due to temporary transmission unavailability, the power is not evacuated, for reasons not attributable to the RPG. In such cases, subject to the submission of documentary evidences from the competent authority, the generation compensation shall be restricted to the following and there shall be no other claim, directly or indirectly against PROCURER:

Duration of Grid unavailability	Provision for Generation Compensation
Grid unavailability in excess of XX hours in a contract year as defined in the PPA: (only period from 8 am to 6 pm to be counted):	<p><b><i>Generation Loss = [(Average Generation per hour during the Contract Year) x (number of hours of grid unavailability during the Contract Year)]</i></b></p> <p>Where, Average Generation per hour during the Contract Year (kWh) = [Total generation in the Contract Year (kWh) / Total hours of generation in the Contract Year]</p>

The excess generation by the RPG equal to this generation loss shall be procured by PROCURER at the PPA tariff so as to offset this loss in the succeeding 3 (three) Contract Years.

4.9.2 Offtake constraints due to Backdown: The RPG and PROCURER shall follow the forecasting and scheduling process as per the regulations in this regard by the Appropriate Commission. In the eventuality of backdown, subject to the submission of documentary evidences from the competent authority, the RPG shall be eligible for a minimum generation compensation, from PROCURER, restricted to the following and there shall be no other claim, directly or indirectly against PROCURER:

Duration of Backdown	Provision for Generation Compensation
Hours of Backdown during a monthly billing cycle.	<p><i>Minimum Generation Compensation = 50% of [(Average Generation per hour during the month) X (number of backdown hours during the month)] X PPA tariff</i></p> <p>Where, Average Generation per hour during the month (kWh) = [Total generation in the month (kWh) / Total hours of generation in the month]</p>

The RPG shall not be eligible for any compensation in case the Backdown is on account of events like consideration of grid security or safety of any equipment or personnel or other such conditions. The Generation Compensation shall be paid as part of the energy bill for the successive month after JMR.

#### 4.10 Indigenous components and ALMM requirement

4.10.1 Requirement of indigenously manufactured module, cells and BOS: System specifications and quality control of projects under KUSUM-C (FLS) would be in accordance with Para 6.4.6 of MNRE's Comprehensive Guidelines for Implementation of PM KUSUM Scheme, dated 17.01.2024, and its amendments/ modifications as relevant and applicable. This requirement would be applicable for the portion of Project Capacity eligible for Central Financial Assistance (CFA).

4.10.2 Requirement of Approved List of Models and Manufacturers (ALMM): Bidders/ Successful Bidders would comply ALMM requirement as per ALMM order by Ministry of Power dated 09.12.2024 and it would be applicable on full Project Capacity.

### ARTICLE 5: SYNCHRONISATION, COMMISSIONING AND COMMERCIAL OPERATION

#### 5.1 *Synchronization, Commissioning and Commercial Operation*

5.1.1 The RPG shall give the PROCURER at least thirty (30) days' advanced preliminary written notice and at least fifteen (15) days' advanced final written notice, of the date on which it intends to synchronize the Power Project to the Grid System.

5.1.2 Subject to Article 5.1.1, the Power Project may be synchronized by the RPG to the Grid



System when it meets all the connection conditions prescribed in applicable Grid Code then in effect and otherwise meets all other Indian legal requirements for synchronization to the Grid System.

5.1.3 The synchronization equipment and all necessary arrangements / equipment including RTU for scheduling of power generated from the Project and transmission of data to the concerned authority as per applicable regulation shall be installed by the RPG at its generation facility of the Power Project at its own cost. The RPG shall synchronize its system with the Grid System only after the approval of synchronization scheme is granted by the head of the concerned substation/ and checking/ verification is made by the concerned authorities of the PROCURER.

5.1.4 The RPG shall immediately after each synchronization/ tripping of generator, inform the substation of the Grid System to which the Power Project is electrically connected in accordance with applicable Grid Code. In addition, the RPG will inject in-firm power to grid time to time to carry out operational/ functional test prior to commercial operation. For avoidance of doubt, it is clarified that Synchronization / Connectivity of the Project with the grid shall not to be considered as Commissioning of the Project.

5.1.5 The RPG shall commission the Project as per SCD. Declaration of COD shall only be done upon the successful visit by the Commissioning Committee and it shall also be informed to Madhya Pradesh Urja Vikas Nigam Limited. Further, following provisions shall take precedence in only in matters related to Commissioning of a Project:

- a) Concerned Project performs satisfactorily for two continuous months after commissioning in terms of provisions of PPA and RfP. Out of which the project achieves generation/ CUF as described at 5.1.5 (b) below for at least one month.
- b) The Project achieves minimum generation equivalent of 19% CUF, on monthly basis, for concerned Project Capacity to make it eligible for release of CFA.

5.1.6 The Parties agree that for the purpose of commencement of the supply of electricity by RPG to PROCURER, liquidated damages for delay etc., the Scheduled Commissioning Date as defined in this Agreement shall be the relevant date.

## **ARTICLE 6: DISPATCH AND SCHEDULING**

### **6.1 *Dispatch and Scheduling***

6.1.1 The RPG shall be required to schedule its power as per the applicable regulations of SERC / SLDC or any other competent agency and same being recognized by the SLDC or any other competent authority / agency as per applicable regulation/ law / direction and maintain compliance to the applicable Codes/ Grid Code requirements and directions, if any, as

specified by concerned SLDC from time to time. Any deviation from the Schedule will attract the provisions of applicable regulation / guidelines / directions and any financial implication on account of this shall be on the account of the RPG.

6.1.2 The RPG shall be responsible for directly coordinating and dealing with the PROCURER, State Load Dispatch Centers, and other authorities in all respects in regard to declaration of availability, scheduling and despatch of Power and due compliance with deviation and settlement mechanism and the applicable Grid code Regulations.

6.1.3 The RPG shall be responsible for any deviation from scheduling and for any resultant liabilities on account of charges for deviation as per applicable regulations. UI charges on this account shall be directly paid by the RPG.

6.1.4 Auxiliary power consumption will be treated as per the concerned state regulations.

## **ARTICLE 7: METERING**

### **7.1 Meters**

7.1.1 For installation of Meters, Meter testing, Meter calibration and Meter reading and all matters incidental thereto, the RPG and PROCURER shall follow and be bound by the Central Electricity Authority (Installation and Operation of Meters) Regulations, 2006, the Grid Code, as amended and revised from time to time.

7.1.2 The RPG shall bear all costs pertaining to installation, testing, calibration, Automatic Meter Reading facility, maintenance/ replacement of the meters at RPG's side of Delivery Point

7.1.3 In addition to ensuring compliance of the applicable codes, the RPG shall install Main & Check meters at the Delivery Point, along with Stand-by meter(s) as per the applicable regulations of the State where the Project is located.

### **7.2 Reporting of Metered Data and Parameters**

7.2.1 The grid connected renewable power plants will install necessary equipment for regular monitoring of required data and simultaneously for monitoring of the electric power generated from the Project.

7.2.2 Online arrangement would have to be made by the RPG for submission of above data regularly for the entire period of this Power Purchase Agreement to the PROCURER, the MNRE and concerned agency as per applicable regulation / directions.

7.2.3 Reports on above parameters on monthly basis (or as required by regulation / guidelines)

shall be submitted by the RPG to Ministry of New and Renewable Energy/ National Institute of Solar Energy through PROCURER for entire period of PPA.

## **ARTICLE 8: INSURANCES**

### **8.1 Insurance**

8.1.1 The RPG shall effect and maintain or cause to be effected and maintained, at its own cost and expense, throughout the Term of PPA, Insurances against such risks to keep the Project in good condition and shall take Industrial All Risk insurance policy covering risks against any loss or damage, with such deductibles and with such endorsements and co-insured(s), which the Prudent Utility Practices would ordinarily merit maintenance of and as required under the Financing Agreements, and under the applicable laws.

### **8.2 Application of Insurance Proceeds**

8.2.1 In case of the Project not being implemented through Financing Agreement(s), save as expressly provided in this Agreement or the Insurances, the proceeds of any insurance claim made due to loss or damage to the Power Project or any part of the Power Project shall be first applied to reinstatement, replacement or renewal of such loss or damage.

In case of the Project being financed through Financing Agreement(s), save as expressly provided in this Agreement or the Insurances, the proceeds of any insurance claim made due to loss or damage to the Power Project or any part of the Power Project shall be applied as per such Financing Agreements.

8.2.2 If a Force Majeure Event renders the Power Project no longer economically and technically viable and the insurers under the Insurances make payment on a “total loss” or equivalent basis, PROCURER shall have claim on such proceeds of such Insurance limited to outstanding dues of PROCURER against RPG.

### **8.3 Effect on liability of PROCURER**

8.3.1 Notwithstanding any liability or obligation that may arise under this Agreement, any loss, damage, liability, payment, obligation or expense which is insured or not or for which the RPG can claim compensation, under any Insurance shall not be charged to or payable by PROCURER. It is for the RPG to ensure that appropriate insurance coverage is taken for payment by the insurer for the entire loss and there is no under insurance or short adjustment etc.

## **ARTICLE 9: APPLICABLE TARIFF**

91 The RPG shall be entitled to receive the Tariff of Rs. .... / kWh, fixed for the entire term of this Agreement, with effect from the COD, for the active power sold to the PROCURER

subject to clause 4.3 as reflected in the Energy Accounts.

In case of early part commissioning, till the achievement of full commissioning of the Project or SCD, whichever is earlier, subject to the consent for such purchase by the PROCURER, PROCURER may purchase the generation at 75% (seventy five percent) of the PPA Tariff. Any energy produced and flowing into the grid before SCD shall not be at the cost of PROCURER. However, RPG may sell energy generated prior to SCD to any other entity other than PROCURER as per provisions of prevailing Regulations..

This tariff has been arrived at after giving due consideration to available GoI subsidy in the form of Central Financial Assistance (CFA) as detailed out in Article 9.6 of PPA.

9.2 The RPG shall be entitled to receive a tariff of Rs. [ • ]\*\* per kVARh, fixed for the entire term of this Agreement, with effect from the COD, for the reactive power injected/ absorbed at Delivery Point, including during non-sunshine hours in accordance with the following:

- a. For reactive power injected, in case voltage at Delivery Point is lower than 97% of Nominal Voltage.
- b. For reactive power absorbed, in case voltage at Delivery Point is higher than 103% of Nominal Voltage.

9.3 Further, the RPG shall be penalised at the rate of Rs. [ • ]\*\* per kVARh, fixed for the entire term of this Agreement, with effect from the COD, for the reactive power injected/ absorbed at Delivery Point, including during non-sunshine hours in accordance with the following:

- a. For reactive power absorbed, in case voltage at Delivery Point is lower than 97% of Nominal Voltage.
- b. For reactive power injected, in case voltage at Delivery Point is higher than 103% of Nominal Voltage.

9.4 It is clarified that in case voltage at Delivery Point is between 97% and 103% of Nominal Voltage, there would be neither compensation nor penalty for injection or absorption of reactive power.

9.5 It is additionally clarified that there would be no penalty on RPG for not injecting/ absorbing any reactive power whatsoever, for voltage management support to the grid.

9.6 The active power drawn from the grid for reactive power management during non-solar hours shall not be charged by Discoms and shall be treated as losses in the State transmission and distribution network.

**\*\* Disclaimer:** In case any approval is required from the Appropriate Commission in respect of this provision, including without limitation, any other approval required in respect of reactive power management through solar projects under PM KUSUM Scheme, then this provision (and any other

*related provisions) may be suitably amended, in accordance with approvals of Appropriate Commission, to ensure compliance with the relevant regulations or orders of the Appropriate Commission*

9.6 Subsidy from Central Govt. in the form of CFA shall be governed by following provisions:

- a) Subsidy from Govt. of India in the form of central financial assistance (CFA) for feeder level solarization (FLS) projects under component-C of PM KUSUM scheme would be in accordance with guidelines and/ or orders of Ministry of New and Renewable Energy, Govt. of India (MNRE) as applicable on bid submission end date.
- b) As per MNRE order dated 29.01.2024 read with its order dated 14. 02. 2024, CFA of INR 1.05 crore/ MW i.e. 30% of estimated project cost of INR 3.5 crore, shall be available for FLS projects under component-C of PM KUSUM scheme till any further update is announced by MNRE. This subsidy is irrespective of actual cost of project incurred by RPG.
- c) As per MNRE order dated 05.04.2024, the release of CFA shall as per manner and milestones prescribed below:

CFA release/ tranches	Milestone achieved	Activities to be completed by project developer	Release mechanism
30% of CFA as first instalment	30% of work	(i) Letter of award and signing of PPA by RPG with Procurer. (ii) Signing of EPC contract and releasing of advance to EPC contractor. (iii) Encumbrance free land available for project with either copy of land record with RPG ownership or copy of lease agreement. (iv) Bay allocation letter received from Discom. (v) Escrow agreement, if financial assistance is obtained from FI/ banks. (vi) GST invoices of solar module, inverters and	30% CFA would be released to Nodal Agency on submission of documents duly verified by Nodal Agency.  Nodal Agency shall transfer the CFA to RPG/ Developer.

CFA release/ tranches	Milestone achieved	Activities to be completed by project developer	Release mechanism
		transformer. (vii) Financial closure of project. (viii) 50% completion of preliminary civil work, including foundation for module mounting etc.	
30% of CFA as second instalment	75% of work	(i) Completion of preliminary civil work, including foundation for module mounting structure etc. (ii) Receipt of solar PV module and solar inverter at project site. (iii) 75% completion of installation work of solar PV modules.	Second instalment would be released to Nodal Agency.  Nodal Agency would transfer the fund to lender/ financier in case the project is under financing, otherwise, release to RPG/ Developer.
40% of CFA as final instalment	100% of work	(i) Instalment of 25% shall be released through Nodal Agency on completion of the plant commissioning. (ii) 15% on successful performance of the solar plants for two (2) months after the commissioning, with achievement of at least one month CUF as per the minimum CUF agreed in PPA	Final instalment would be released to Nodal Agency. Nodal Agency would transfer the fund to lender/ financier in case the project is under financing, otherwise, release to RPG/ Developer.

## ARTICLE 10: BILLING AND PAYMENT

### 10.1 **General**

10.1.1 From the commencement of supply of power, PROCURER shall pay to the RPG the monthly Tariff Payments subject to the adjustments as per provisions of this Agreement including Article 6, in accordance with Article 9. All Tariff Payments by PROCURER shall be in Indian Rupees.

10.1.2 The RPG shall be required to make arrangements and payments for import of energy (if any) as per applicable regulations.

### **10.2 *Delivery and Content of Monthly Bills/ Supplementary Bills***

10.2.1 The RPG shall issue to PROCURER hard copy of a signed Monthly Bill in 3 copies in accordance with the format provided by the PROCURER for the immediately preceding Month based on the JMR/ Energy Account along with all relevant payment receipt documents (payments made by RPG for drawl of power, payment of reactive energy charges, Metering charges or any other charges as per regulations of SERC/ SLDC, if applicable.) to respective Superintending Engineer (SE) / General Manager (GM) of the circle and after verification SE / GM will forward the verified bills to Procurer within three (03) days

Each Monthly Bill shall include all charges as per this Agreement for the energy supplied for the relevant Month based on JMR/ Energy Accounts. The Monthly Bill amount shall be the product of the energy as per Energy Accounts and the Applicable Tariff. Also, each monthly bill shall include reactive energy management compensation to RPG determined in accordance with SERC. Energy/ reactive energy drawn from the grid will be regulated as per the regulations of respective State the Project is located in.

### **10.3 *Payment of Monthly Bills***

10.3.1 PROCURER shall pay the amount payable under the Monthly Bill by the Due Date to such account of the RPG, as shall have been previously notified by the RPG.

10.3.2 All payments required to be made under this Agreement shall also include any deduction or set off for:

- i) deductions required by the Law; and
- ii) Amount claimed by PROCURER, if any, from the RPG, will be adjusted from the monthly energy payment.

The RPG shall open a bank account (the "RPG's Designated Account") for all Tariff Payments to be made by PROCURER to the RPG, and notify PROCURER of the details of such account at least sixty (60) Days before the dispatch of the first Monthly Bill.

### **10.3.3 *Late Payment Surcharge***

In the event of delay in payment of a Monthly Bill by PROCURER beyond thirty (30) days of its Due Date, a Late Payment Surcharge shall be payable to the RPG at the rate of 1.25% per month on the

outstanding amount calculated on a day to day basis. The Late Payment Surcharge shall be claimed by the RPG through the Supplementary Bill.



#### 10.3.5 ***Rebate***

For payment of any Bill on or before Due Date, the following Rebate shall be paid by the RPG to PROCURER in the following manner and the RPG shall not raise any objections to the payments made under this article.

- a) A Rebate of 2% shall be payable to the PROCURER for the payments made within a period of seven clear working days of the presentation of hard copy of Bill along with required supporting documents at PROCURER office.
- b) Any payments made after seven clear working days of the date of presentation of hard copy of the Bill along with the required supporting documents at PROCURER office up to the Due Date shall be allowed a rebate of 1 %.
- c) For the above purpose, the Zero date of Bill shall be the next Business Day of delivery of verified original copies of the Bill at PROCURER office
- d) No Rebate shall be payable on the Bills raised on account of Change in Law relating to taxes, duties, cess etc. and on Supplementary Bill.

For the above purpose date of presentation of bill shall be the same day of delivery in hard copy. However, for consideration of rebate, next business day shall be considered.

#### 10.4 ***Payment Security Mechanism***

##### **Letter of Credit (LC):**

10.4.1 PROCURER shall provide to the RPG, in respect of payment of its Monthly Bills and/ or Supplementary Bills, a monthly unconditional, revolving and irrevocable letter of credit ("Letter of Credit"), opened and maintained which may be drawn upon by the RPG in accordance with this Article.

10.4.2 Not later than one (1) Month before the start of supply, PROCURER through a scheduled bank open a Letter of Credit in favour of the RPG, to be made operative from a date prior to the Due Date of its first Monthly Bill under this Agreement. The Letter of Credit shall have a term of twelve (12) Months and shall be renewed annually, for an amount equal to:

- i) for the first Contract Year, equal to the estimated average monthly billing;
- ii) for each subsequent Contract Year, equal to the average of the monthly billing of the previous Contract Year.

10.4.3 Provided that the RPG shall not draw upon such Letter of Credit prior to the Due Date of the relevant Monthly Bill and/ or Supplementary Bill, and shall not make more than one drawal in a Month.

10.4.4 Provided further that if at any time, such Letter of Credit amount falls short of the amount



specified in Article 10.4.2 due to any reason whatsoever, PROCURER shall restore such shortfall within fifteen (15) days.

10.4.5 PROCURER shall cause the scheduled bank issuing the Letter of Credit to intimate the RPG, in writing regarding establishing of such irrevocable Letter of Credit.

10.4.6 PROCURER shall ensure that the Letter of Credit shall be renewed not later than its expiry. 10.4.7 All costs relating to opening, maintenance of the Letter of Credit shall be borne by PROCURER.

10.4.8 If PROCURER fails to pay undisputed Monthly Bill or Supplementary Bill or a part thereof within and including the Due Date, then, subject to Article 10.4.6 & 10.5.2, the RPG may draw upon the Letter of Credit, and accordingly the bank shall pay without any reference or instructions from PROCURER, an amount equal to such Monthly Bill or Supplementary Bill or part thereof, in accordance with Article 10.4.3 above, by presenting to the scheduled bank issuing the Letter of Credit, the following documents:

- i) a copy of the Monthly Bill or Supplementary Bill which has remained unpaid to RPG and;
- ii) a certificate from the RPG to the effect that the bill at item (i) above, or specified part thereof, is in accordance with the Agreement and has remained unpaid beyond the Due Date;

### **10.5 Disputed Bill**

10.5.1 If the PROCURER does not dispute a Monthly Bill or a Supplementary Bill raised by the RPG within fifteen (15) days of receiving such Bill shall be taken as conclusive.

10.5.2 If the PROCURER disputes the amount payable under a Monthly Bill or a Supplementary Bill, as the case may be, it shall pay undisputed amount of the invoice amount and it shall within fifteen (15) days of receiving such Bill, issue a notice (the "Bill Dispute Notice") to the invoicing Party setting out:

- i) the details of the disputed amount;
- ii) its estimate of what the correct amount should be; and iii) all written material in support of its claim.

10.5.3 If the RPG agrees to the claim raised in the Bill Dispute Notice issued pursuant to Article 10.5.2, the RPG shall revise such Bill and present along with the next Monthly Bill. In such a case excess amount shall be refunded along with interest at the same rate as Late Payment Surcharge, which shall be applied from the date on which such excess payment was made by

the disputing Party to the invoicing Party and up to and including the date on which such payment has been received as refund.

10.5.4 If the RPG does not agree to the claim raised in the Bill Dispute Notice issued pursuant to Article 10.5.2, it shall, within fifteen (15) days of receiving the Bill Dispute Notice, furnish a notice (Bill Disagreement Notice) to the PROCURER providing:

- i) reasons for its disagreement;
- ii) its estimate of what the correct amount should be; and iii) all written material in support of its counter-claim.

10.5.5 Upon receipt of the Bill Disagreement Notice by the PROCURER under Article

10.5.4, authorized representative(s) or a director of the board of directors/ member of board of the PROCURER and RPG shall meet and make best endeavours to amicably resolve such dispute within fifteen (15) days of receipt of the Bill Disagreement Notice.

10.5.6 If the Parties do not amicably resolve the Dispute within fifteen (15) days of receipt of Bill Disagreement Notice pursuant to Article 10.5.4, the matter shall be referred to Dispute resolution in accordance with Article 16.

10.5.7 For the avoidance of doubt, it is clarified the despite a Dispute regarding an invoice, PROCURER shall, without prejudice to its right to Dispute, be under an obligation to make payment of undisputed amount of the invoice amount in the Monthly Bill.

## **106 Quarterly and Annual Reconciliation**

10.6.1 The Parties acknowledge that all payments made against Monthly Bills and Supplementary Bills shall be subject to quarterly reconciliation within 30 days of the end of the quarter at the beginning of the following quarter of each Contract Year and annual reconciliation at the end of each Contract Year within 30 days to take into account the Energy Accounts, Tariff adjustment payments, Tariff Rebate, Late Payment Surcharge, or any other reasonable circumstance provided under this Agreement.

10.6.2 The Parties, therefore, agree that as soon as all such data in respect of any quarter of a Contract Year or a full Contract Year as the case may be has been finally verified and adjusted, the RPG and PROCURER shall jointly sign such reconciliation statement. Within fifteen (15) days of signing of a reconciliation statement, the RPG shall make appropriate adjustments in the next Monthly Bill. Late Payment Surcharge/ interest shall be payable in such a case from the date on which such payment had been made to the invoicing Party or the date on which any payment was originally due, as may be applicable. Any Dispute with regard to the above reconciliation shall be dealt with in accordance with the provisions of Article 16.

## **10.7 *Payment of Supplementary Bill***

10.7.1 RPG may raise a ("Supplementary Bill") for payment on account of:

- i) Adjustments required by the Joint Meter Reading / Energy Accounts (if applicable); or
- ii) Change in Law as provided in Article 12

And such Supplementary Bill shall be paid by the other Party.

10.7.2 PROCURER shall remit all amounts due under a Supplementary Bill raised by the RPG to the RPG's Designated Account by the Due Date, except open access charges, RLDC or scheduling charges and transmission charges (if applicable). For Supplementary Bill on account of adjustment required by energy account, Rebate as applicable to Monthly Bills pursuant to Article 10.3.5 shall equally apply. No surcharge will be applicable other than that on the monthly energy payment and associated debit and credit note.

10.7.3 In the event of delay in payment of a Supplementary Bill by either Party beyond its Due Date, a Late Payment Surcharge shall be payable at the same terms applicable to the Monthly Bill in Article 10.3.3.

## **ARTICLE 11: FORCE MAJEURE**

### **11.1 *Definitions***

11.1.1 In this Article, the following terms shall have the following meanings:

### **11.2 *Affected Party***

11.2.1 An affected Party means PROCURER or the RPG whose performance has been affected by an event of Force Majeure.

### **11.3 *Force Majeure***

11.3.1 A 'Force Majeure' means any event or circumstance or combination of events those stated below that wholly or partly prevents or unavoidably delays an Affected Party in the performance of its obligations under this Agreement, but only if and to the extent that such events or circumstances are not within the reasonable control, directly or indirectly, of the Affected Party and could not have been avoided if the Affected Party had taken reasonable care or complied with Prudent Utility Practices:

- a) Act of God, including, but not limited to lightning, drought, fire and explosion (to the extent originating from a source external to the site), earthquake, volcanic eruption, landslide, flood, cyclone, typhoon or tornado if and only if it is declared / notified by the competent state / central authority / agency (as applicable);
- b) any act of war (whether declared or undeclared), invasion, armed conflict or act of foreign enemy, blockade, embargo, revolution, riot, insurrection, terrorist or military action if and only if it is declared / notified by the competent state / central authority / agency (as applicable); or

- c) radioactive contamination or ionising radiation originating from a source in India or resulting from another Force Majeure Event mentioned above excluding circumstances where the source or cause of contamination or radiation is brought or has been brought into or near the Power Project by the Affected Party or those employed or engaged by the Affected Party.

#### **11.4 Force Majeure Exclusions**

11.4.1 Force Majeure shall not include (i) any event or circumstance which is within the reasonable control of the Parties and (ii) the following conditions, except to the extent that they are consequences of an event of Force Majeure:

- a. Unavailability, late delivery, or changes in cost of the plant, machinery, equipment, materials, spare parts or consumables for the Power Project;
- b. Delay in the performance of any contractor, sub-contractor or their agents ;
- c. Non-performance resulting from normal wear and tear typically experienced in power generation materials and equipment;
- d. Strikes at the facilities of the Affected Party;
- e. Insufficiency of finances or funds or the agreement becoming onerous to perform; and
- f. Non-performance caused by, or connected with, the Affected Party's:
  - i. Negligent or intentional acts, errors or omissions;
  - ii. Failure to comply with an Indian Law; or
  - iii. Breach of, or default under this Agreement.

#### **11.5 Notification of Force Majeure Event**

11.5.1 The Affected Party shall give notice to the other Party of any event of Force Majeure as soon as reasonably practicable, but not later than seven (7) days after the date on which such Party knew or should reasonably have known of the commencement of the event of Force Majeure. If an event of Force Majeure results in a breakdown of communications rendering it unreasonable to give notice within the applicable time limit specified herein, then the Party claiming Force Majeure shall give such notice as soon as reasonably practicable after reinstatement of communications, but not later than one (1) day after such reinstatement.

11.5.2 Provided that such notice shall be a pre-condition to the Affected Party's entitlement to claim relief under this Agreement. Such notice shall include full particulars of the event of Force Majeure, its effects on the Party claiming relief and the remedial measures proposed. The Affected Party shall give the other Party regular (and not less than monthly) reports on the progress of those remedial measures and such other information as the other Party may reasonably request about the Force Majeure Event.

11.5.3 The Affected Party shall give notice to the other Party of (i) the cessation of the relevant event of Force Majeure; and (ii) the cessation of the effects of such event of Force Majeure on

the performance of its rights or obligations under this Agreement, as soon as practicable after becoming aware of each of these cessations.

#### **11.6 Duty to Perform and Duty to Mitigate**

11.6.1 To the extent not prevented by a Force Majeure Event pursuant to Article 11.3, the Affected Party shall continue to perform its obligations pursuant to this Agreement. The Affected Party shall use its reasonable efforts to mitigate the effect of any Force Majeure Event as soon as practicable.

#### **11.7 Available Relief for a Force Majeure Event**

11.7.1 Subject to this Article 11:

- (a) no Party shall be in breach of its obligations pursuant to this Agreement except to the extent that the performance of its obligations was prevented, hindered or delayed due to a Force Majeure Event;
- (b) every Party shall be entitled to claim relief in relation to a Force Majeure Event in regard to its obligations;
- (c) For avoidance of doubt, neither Party's obligation to make payments of money due and payable prior to occurrence of Force Majeure events under this Agreement shall be suspended or excused due to the occurrence of a Force Majeure Event in respect of such Party.
- (d) Provided that no payments shall be made by either Party affected by a Force Majeure Event for the period of such event on account of its inability to perform its obligations due to such Force Majeure Event.

### **ARTICLE 12: CHANGE IN LAW**

#### **12.1 Definitions**

In this Article 12, the term Change in Law shall refer to the occurrence of any of the following events pertaining to this project only after the last date of the bid submission, including

- i the enactment of any new law; or
- ii an amendment, modification or repeal of an existing law; or
- iii the requirement to obtain a new consent, permit or license; or
- iv any modification to the prevailing conditions prescribed for obtaining an consent, permit or license, not owing to any default of the RPG; or
- v any change in the rates of any Taxes including any duties and cess or Introduction of any new tax made applicable for setting up the power project and supply of power from the Power project by the RPG Which have a direct effect on the Project.

However, Change in Law shall not include

- i any change in taxes on corporate income or

- ii any change in any withholding tax on income or dividends distributed to the shareholders of the RPG, or
- iii any change on account of regulatory measures by the Appropriate Commission.

In the event a Change in Law results in any adverse financial loss/ gain to the RPG then, in order to ensure that the RPG is placed in the same financial position as it would have been had it not been for the occurrence of the Change in Law, the RPG/ PROCURER shall be entitled to compensation by the other party, as the case may be, subject to the condition that the quantum and mechanism of compensation payment shall be determined and shall be effective from such date as may be decided by the Appropriate Commission..

In the event of any decrease in the recurring/ nonrecurring expenditure by the RPG or any income to the RPG on account of any of the events as indicated above, RPG shall file an application to the Appropriate Commission no later than sixty (60) days from the occurrence of such event, for seeking approval of Change in Law and to determine the impact on the cost of Solar PV modules / cell. In the event of the RPG failing to comply with the above requirement, in case of any gain to the RPG, PROCURER shall withhold the monthly tariff payments on immediate basis, until compliance of the above requirement by the RPG.

## **12.2 Relief for Change in Law**

12.2.1 The aggrieved Party shall be required to approach the Appropriate Commission for seeking approval of Change in Law.

12.2.2 The decision of the Appropriate Commission to acknowledge a Change in Law and the date from which it will become effective, provide relief for the same, shall be final and governing on both the Parties.

## **ARTICLE 13: EVENTS OF DEFAULT AND TERMINATION**

### **13.1 RPG Event of Default**

13.1.1 The occurrence and/ or continuation of any of the following events, unless any such event occurs as a result of a Force Majeure Event or a breach by PROCURER of its obligations under this Agreement, shall constitute an RPG Event of Default:

- (i) the failure to commence supply of power to PROCURER up to the Contracted Capacity, by the end of the period specified in Article 4, or failure to continue supply of Contracted Capacity to PROCURER after Commercial Operation Date throughout the term of this Agreement, or
- if
- a) the RPG assigns, mortgages or charges or purports to assign, mortgage or charge any of its assets or rights related to the Power Project in contravention of the provisions of this Agreement; or
  - b) the RPG transfers or novates any of its rights and/ or obligations under this

agreement, in a manner contrary to the provisions of this Agreement; except where such transfer

- is in pursuance of a Law; and does not affect the ability of the transferee to perform, and such transferee has the financial capability to perform, its obligations under this Agreement or
  - is to a transferee who assumes such obligations under this Agreement and the Agreement remains effective with respect to the transferee;
- (ii) if (a) the RPG becomes voluntarily or involuntarily the subject of any bankruptcy or insolvency or winding up proceedings and such proceedings remain uncontested for a period of thirty (30) days, or (b) any winding up or bankruptcy or insolvency order is passed against the RPG, or (c) the RPG goes into liquidation or dissolution or has a receiver or any similar officer appointed over all or substantially all of its assets or official liquidator is appointed to manage its affairs, pursuant to Law, provided that a dissolution or liquidation of the RPG will not be a RPG Event of Default if such dissolution or liquidation is for the purpose of a merger, consolidation or

reorganization and where the resulting company retains creditworthiness similar to the RPG and expressly assumes all obligations of the RPG under this Agreement and is in a position to perform them; or

- (iii) the RPG repudiates this Agreement and does not rectify such breach within a period of thirty (30) days from a notice from PROCURER in this regard; or
- (iv) except where due to any PROCURER's failure to comply with its material obligations, the RPG is in breach of any of its material obligations pursuant to this Agreement, and such material breach is not rectified by the RPG within thirty (30) days of receipt of first notice in this regard given by PROCURER.
- (v) occurrence of any other event which is specified in this Agreement to be a material breach/ default of the RPG.
- (vi) except where due to any PROCURER's failure to comply with its material obligations, the RPG is in breach of any of its material obligations pursuant to this Agreement, and such material breach is not rectified by the RPG within thirty (30) days of receipt of first notice in this regard given by PROCURER.

### **13.2 PROCURER Event of Default**

13.2.1 The occurrence and the continuation of any of the following events, unless any such event occurs as a result of a Force Majeure Event or a breach by the RPG of its obligations under this Agreement, shall constitute the Event of Default on the part of defaulting PROCURER:

- (i) PROCURER fails to pay (with respect to a Monthly Bill or a Supplementary Bill), subject to Article 10.5, for a period of ninety (90) days after the Due Date and the RPG is unable to recover the amount outstanding to the RPG through the Letter of Credit,



- (ii) PROCURER repudiates this Agreement and does not rectify such breach even within a period of sixty (60) days from a notice from the RPG in this regard; or
- (iii) except where due to any RPG's failure to comply with its obligations, PROCURER is in material breach of any of its obligations pursuant to this Agreement, and such material breach is not rectified by PROCURER within sixty (60) days of receipt of notice in this regard from the RPG to PROCURER; or

if

- PROCURER becomes voluntarily or involuntarily the subject of any bankruptcy or insolvency or winding up proceedings and such proceedings remain uncontested for a period of sixty (60) days, or
  - any winding up or bankruptcy or insolvency order is passed against PROCURER, or
  - PROCURER goes into liquidation or dissolution or a receiver or any similar officer is appointed over all or substantially all of its assets or official liquidator is appointed to manage its affairs, pursuant to Law, provided that it shall not constitute a PROCURER Event of Default, where such dissolution or liquidation of PROCURER or PROCURER is for the purpose of a merger, consolidation or reorganization and where the resulting entity has the financial standing to perform its obligations under this Agreement and has creditworthiness similar to PROCURER and expressly assumes all obligations of PROCURER and is in a position to perform them; or;
- (iv) Occurrence of any other event which is specified in this Agreement to be a material breach or default of PROCURER.

### **13.3 Procedure for cases of RPG Event of Default**

13.3.1 Upon the occurrence and continuation of any RPG Event of Default under Article 13.1, PROCURER shall have the right to deliver to the RPG, with a copy to the representative of the lenders

to the RPG with whom the RPG has executed the Financing Agreements, a notice stating its intention to terminate this Agreement (PROCURER Preliminary Default Notice), which shall specify in reasonable detail, the circumstances giving rise to the issue of such notice.

13.3.2 Following the issue of a PROCURER Preliminary Default Notice, the Consultation Period of ninety (90) days or such longer period as the Parties may agree, shall apply and it shall be the responsibility of the Parties to discuss as to what steps shall be taken with a view to mitigate the consequences of the relevant Event of Default having regard to all the circumstances.

13.3.3 During the Consultation Period, the Parties shall continue to perform their respective obligations under this Agreement.

13.3.4 Within a period of seven (7) days following the expiry of the Consultation Period unless the Parties shall have otherwise agreed to the contrary or the RPG Event of Default giving rise to the



Consultation Period shall have ceased to exist or shall have been remedied, PROCURER may terminate this Agreement by giving a written Termination Notice of sixty (60) days to the RPG.

13.3.5 Subject to the terms of this Agreement, upon occurrence of a RPG Event of Default under this Agreement, the lenders in concurrence with the PROCURER, may exercise their rights, if any, under Financing Agreements, to seek substitution of the RPG by a selectee for the residual period of the Agreement, for the purpose of securing the payments of the total debt amount from the RPG and performing the obligations of the RPG. However, in the event the lenders are unable to substitute the defaulting RPG within the stipulated period, PROCURER may terminate the PPA and may acquire the Project assets for an amount equivalent to 90% of the debt due or less as mutually agreed, failing which, the lenders may exercise their mortgage rights and liquidate the Project assets.

Provided that any substitution under this Agreement can only be made with the prior consent of PROCURER including the condition that the selectee meets the eligibility requirements of Request for Selection (RfS) issued by Madhya Pradesh Urja Vikas Nigam Limited and accepts the terms and conditions of this Agreement.

13.3.6 The lenders in concurrence with PROCURER, may seek to exercise right of substitution under Article 13.3.5 by an amendment or novation of the PPA in favour of the selectee. The RPG shall cooperate with PROCURER to carry out such substitution and shall have the duty and obligation to continue to operate the Power Project in accordance with this PPA till such time as the substitution is finalized. In the event of Change in Shareholding/ Substitution of Promoters triggered by the Financial Institutions leading to signing of fresh PPA with a new entity, an amount of Rs. 1 Lakh per MW +18% GST per transaction as facilitation fee (non-refundable) shall be deposited by the RPG to PROCURER.

13.3.7 In the event the lenders are unable to substitute the defaulting RPG within the stipulated period, PROCURER may terminate the PPA and may acquire the Project assets for an amount equivalent to 90% of the debt due, failing which, the lenders may exercise their mortgage rights and liquidate the Project assets.

13.3.8 In case of any liquidation of assets of the Project prior to completion of PPA period, the first charges shall be towards recovery of proportionate CFA, towards remaining period of PPA, granted to the Project (Calculation of proportionality shall be based on annual energy generation calculated at 21% CUF and remaining period of PPA)

#### **13.4 *Procedure for cases of PROCURER Event of Default***

13.4.1 Upon the occurrence and continuation of any PROCURER Event of Default specified in Article 13.2, the RPG shall have the right to deliver to PROCURER, a RPG Preliminary Default Notice, which notice shall specify in reasonable detail the circumstances giving rise to its issue.

13.4.2 Following the issue of a RPG Preliminary Default Notice, the Consultation Period of ninety (90) days or such longer period as the Parties may agree, shall apply and it shall be the responsibility of the Parties to discuss as to what steps shall be taken with a view to mitigate the consequences of the relevant Event of Default having regard to all the circumstances.

13.4.3 During the Consultation Period, the Parties shall continue to perform their respective obligations under this Agreement.

13.4.4 After a period of two hundred ten (210) days following the expiry of the Consultation Period and unless the Parties shall have otherwise agreed to the contrary or PROCURER Event of Default giving rise to the Consultation Period shall have ceased to exist or shall have been remedied, PROCURER under intimation to RPG shall, subject to the prior consent of the RPG, novate its part of the PPA to any third party, including its Affiliates within the stipulated period. In the event the aforesaid novation is not acceptable to the RPG, or if no offer of novation is made by PROCURER within the stipulated period, then the RPG may terminate the PPA and at its discretion require PROCURER to either (i) takeover the Project assets by making a payment of the termination compensation equivalent to the amount of the debt due and 150% (one hundred and fifty per cent) of the adjusted equity or, (ii) pay to the RPG, damages, equivalent to 6 (six) months, or balance PPA period whichever is less, of charges for its contracted capacity, with the Project assets being retained by the RPG.

Provided further that at the end of three (3) months period from the period mentioned in this Article 13.4.4, this Agreement may be terminated by the RPG.

### **13.5     *Termination due to Force Majeure***

13.5.1 If the Force Majeure Event or its effects continue to be present beyond a period as specified in Article 4.4.2, either Party shall have the right to cause termination of the Agreement. In such an event this Agreement shall terminate on the date of such Termination Notice without any further liability to either Party from the date of such termination

## **ARTICLE 14: LIABILITY AND INDEMNIFICATION**

### **14.1     *Indemnity***

14.1.1 The RPG shall indemnify, defend and hold PROCURER harmless against:

- a) any and all third-party claims against PROCURER for any loss of or damage to property of such third party, or death or injury to such third party, arising out of a breach by the RPG of any of its obligations under this Agreement; and
- b) any and all losses, damages, costs and expenses including legal costs, fines, penalties and interest actually suffered or incurred by PROCURER from third party claims arising by reason of a breach by the RPG of any of its obligations under this Agreement, (provided that

this Article 14 shall not apply to such breaches by the RPG, for which specific remedies have been provided for under this Agreement).

14.1.2 PROCURER shall indemnify, defend and hold the RPG harmless against:

- a) any and all third party claims against the RPG, for any loss of or damage to property of such third party, or death or injury to such third party, arising out of a breach by PROCURER of any of their obligations under this Agreement; and
- b) any and all losses, damages, costs and expenses including legal costs, fines, penalties and interest ('Indemnifiable Losses') actually suffered or incurred by the RPG from third party claims arising by reason of a breach by PROCURER of any of its obligations.

## 14.2 Procedure for claiming Indemnity

### 14.2.1 *Third party claims*

a Where the Indemnified Party is entitled to indemnification from the Indemnifying Party pursuant to Article 14.1.1(a) or 14.1.2(a), the Indemnified Party shall promptly notify the Indemnifying Party of such claim referred to in Article 14.1.1(a) or 14.1.2(a) in respect of which it is entitled to be indemnified. Such notice shall be given as soon as reasonably practicable after the Indemnified Party becomes aware of such claim. The Indemnifying Party shall be liable to settle the indemnification claim within thirty (30) days of receipt of the above notice. Provided however that, if:

- i) the Parties choose to refer the dispute before the Arbitrator in accordance with Article 16.3.2;  
and
- ii) the claim amount is not required to be paid/ deposited to such third party pending the resolution of the Dispute,

the Indemnifying Party shall become liable to pay the claim amount to the Indemnified Party or to the third party, as the case may be, promptly following the resolution of the Dispute, if such Dispute is not settled in favour of the Indemnified Party.

b. The Indemnified Party may contest the claim by referring to the Arbitrator for which it is entitled to be Indemnified under Article 14.1.1(a) or 14.1.2(a) and the Indemnifying Party shall reimburse to the Indemnified Party all reasonable costs and expenses incurred by the Indemnified party. However, such Indemnified Party shall not settle or compromise such claim without first getting the consent of the Indemnifying Party, which consent shall not be unreasonably withheld or delayed.

An Indemnifying Party may, at its own expense, assume control of the defence of any proceedings

brought against the Indemnified Party if it acknowledges its obligation to indemnify such Indemnified Party, gives such Indemnified Party prompt notice of its intention to assume control of the defence, and employs an independent legal counsel at its own cost that is reasonably satisfactory to the Indemnified Party.

### **14.3 *Indemnifiable Losses***

14.3.1 Where an Indemnified Party is entitled to Indemnifiable Losses from the Indemnifying Party pursuant to Article 14.1.1(b) or 14.1.2(b), the Indemnified Party shall promptly notify the Indemnifying Party of the Indemnifiable Losses actually incurred by the Indemnified Party. The Indemnifiable Losses shall be reimbursed by the Indemnifying Party within thirty (30) days of receipt of the notice seeking Indemnifiable Losses by the Indemnified Party. In case of nonpayment of such losses after a valid notice under this Article 14.3, such event shall constitute a payment default under Article 13.

### **14.4 *Limitation on Liability***

14.4.1 Except as expressly provided in this Agreement, neither the RPG nor its/ their respective officers, directors, agents, employees or affiliates (or their officers, directors, agents or employees), shall be liable or responsible to the other Party or its affiliates, officers, directors, agents, employees, successors or permitted assigns or their respective insurers for incidental, indirect or consequential damages, connected with or resulting from performance or non-performance of this Agreement, or anything done in connection herewith, including claims in the nature of lost revenues, income or profits (other than payments expressly required and properly due under this Agreement), any increased expense of, reduction in or loss of power generation or equipment used therefore, irrespective of whether such claims are based upon breach of warranty, tort (including negligence, whether of PROCURER, the RPG or others), strict liability, contract, breach of statutory duty, operation of law or otherwise.

14.4.2 PROCURER shall have no recourse against any officer, director or shareholder of the RPG or any Affiliate of the RPG or any of its officers, directors or shareholders for such claims excluded under this Article. The RPG shall have no recourse against any officer, director or shareholder of PROCURER, or any affiliate of PROCURER or any of its officers, directors or shareholders for such claims excluded under this Article.

### **14.5 *Duty to Mitigate***

14.5.1 The Parties shall endeavor to take all reasonable steps so as mitigate any loss or damage which has occurred under this Article 14.

## **ARTICLE 15: ASSIGNMENTS AND CHARGES**

### **15.1 *Assignments***

This Agreement shall be binding upon, and inure to the benefit of the Parties and their respective successors and permitted assigns. This Agreement shall not be assigned by any Party, except to the Project Lenders or Lender's Representative as security for their debt under the Financing Agreements, other than by mutual consent between the Parties to be evidenced in writing. Such assignment shall be agreed to by PROCURER subject to the compliance of provisions contained in this Agreement and more specifically to the provisions of Article 4.1.1 of this Agreement. In no case, such assignment shall be permissible prior to the declaration of COD.

Provided that, PROCURER shall permit assignment of any of RPG's rights and obligations under this Agreement in favour of the lenders to the RPG, if required under the Financing Agreements. Provided that, such consent shall not be withheld if PROCURER seeks to transfer to any transferee all of its rights and obligations under this Agreement.

The enforcement of the rights and obligation between the RPG and the PROCURER provided in this Agreement shall not be treated as an assignment but an enforcement of the terms agreed under this Agreement.

Provided further that any successor(s) or permitted assign(s) identified after mutual agreement between the Parties may be required to execute a new agreement on the same terms and conditions as are included in this Agreement. An amount of Rs. 1 Lakh per Transaction as Facilitation Fee (nonrefundable) shall be deposited by the RPG to PROCURER. Provided further that, such consent shall not be withheld by the RPG if PROCURER seeks to transfer to any affiliate all of its rights and obligations under this Agreement.

In the event of Change in Shareholding/ Substitution of Promoters triggered by the Financial Institutions leading to signing of fresh PPA with a New Entity, an amount of Rs. 1 Lakh per Transaction as Facilitation Fee (non-refundable) shall be deposited by the RPG to PROCURER.

## **15.2 Permitted Charges**

15.2.1 RPG shall not create or permit to subsist any encumbrance over all or any of its rights and benefits under this Agreement, other than as set forth in Article 15.1 and the Guidelines.

## **ARTICLE 16: GOVERNING LAW AND DISPUTE RESOLUTION**

### **16.1 Governing Law**

16.1.1 This Agreement shall be governed by and construed in accordance with the Laws of India. Any legal proceedings in respect of any matters, claims or disputes under this Agreement shall be under the jurisdiction of appropriate courts in .

### **16.2 Amicable Settlement and Dispute Resolution**

#### **16.2.1 Amicable Settlement**

- i. Either Party is entitled to raise any claim, dispute or difference of whatever nature arising under, out of or in connection with this Agreement ("Dispute") by giving a written notice (Dispute Notice) to the other Party, which shall contain:
  - (a) a description of the Dispute;
  - (b) the grounds for such Dispute; and
  - (c) all written material in support of its claim.
- ii. The other Party shall, within thirty (30) days of issue of Dispute Notice issued under Article 16.2.1(i), furnish:
  - (a) counter-claim and defenses, if any, regarding the Dispute; and
  - (b) all written material in support of its defenses and counter-claim.
- iii. Within thirty (30) days of issue of Dispute Notice by any Party pursuant to Article 16
  - (i) if the other Party does not furnish any counter claim or defense under Article 16
  - (ii) or thirty (30) days from the date of furnishing counter claims or defense by the other Party, both the Parties to the Dispute shall meet to settle such Dispute amicably. If the Parties fail to resolve the Dispute amicably within thirty (30) days from the later of the dates mentioned in this Article 16.2.1.
  - (iii) the Dispute shall be referred for dispute resolution in accordance with Article 16.3.

### **16.3 Dispute Resolution**

#### **16.3.1 Dispute Resolution by the Appropriate Commission**

- i) Where any Dispute or differences arises in relation to this agreement of any nature whatsoever including the construction, interpretation or implementation of the provisions of this agreement as well as claim made by any Party for any change in or determination of the Tariff or any matter related to Tariff or claims made by any Party which partly or wholly relate to any change in the Tariff or determination of any of such claims could result in change in the Tariff, and relates to any matter agreed to be referred to the Appropriate Commission, shall be submitted to adjudication by the Appropriate Commission. Appeal against the decisions of the Appropriate Commission shall be made only as per the provisions of the Electricity Act, 2003, as amended from time to time.
- ii) PROCURER shall be entitled to co-opt the lenders (if any) as a supporting party in such proceedings before the Appropriate Commission.

#### **16.3.2 Dispute Resolution through Arbitration**

- i) If the Dispute arising as per Article 16.2.1 is not amicably resolved & such dispute is not covered in Article 16.3.1(i), such Dispute shall be resolved by arbitration under the provisions of the Electricity Act, 2003 (as amended from time to time) as under: Proceedings as well as appointment of the arbitrator(s) shall be carried out by the Appropriate Commissions under the Electricity Act 2003 as amended from time to time.

As stipulated by the said Electricity Act 2003, the said arbitration will take place as per the provisions of the Arbitration and Conciliation Act 1996 as amended from time to time.

- ii) The place of arbitration shall be the (City where head quarter of PROCURER is located).  
The language of the arbitration shall be English.
- iii) The Arbitration Tribunal's award shall be substantiated in writing. The Arbitration Tribunal shall also decide on the costs of the arbitration proceedings and the allocation thereof.
- iv) The provisions of this Article shall survive the termination of this PPA for any reason whatsoever.
- v) The award shall be of majority decision.
- vi) PROCURER shall be entitled to co-opt the lenders (if any) as a supporting party in such arbitration proceedings.

#### **16.4 *Parties to Perform Obligations***

16.4.1 Notwithstanding the existence of any Dispute and difference referred to the Appropriate Commission and save as the Appropriate Commission may otherwise direct by a final or interim order, the Parties hereto shall continue to perform their respective obligations (which are not in dispute) under this Agreement.

### **ARTICLE 17: MISCELLANEOUS PROVISIONS**

#### **17.1 *Amendment***

17.1.1 This Agreement may only be amended or supplemented by a written agreement between the Parties.

#### **17.2 *Third Party Beneficiaries***

17.2.1 This Agreement is solely for the benefit of the Parties and their respective successors and permitted assigns and shall not be construed as creating any duty, standard of care or any liability to, any person not a party to this Agreement.

#### **17.3 *Waiver***

17.3.1 No waiver by either Party of any default or breach by the other Party in the performance of any of the provisions of this Agreement shall be effective unless in writing duly executed by an authorised representative of such Party.

17.3.2 Neither the failure by either Party to insist on any occasion upon the performance of the terms,



conditions and provisions of this Agreement nor time or other indulgence granted by one Party to the other Parties shall act as a waiver of such breach or acceptance of any variation or the relinquishment of any such right or any other right under this Agreement, which shall remain in full force and effect.

#### **17.4 Confidentiality**

17.4.1 The Parties undertake to hold in confidence this Agreement and not to disclose the terms and conditions of the transaction contemplated hereby to third parties, except:

- a) to their professional advisors;
- b) to their officers, contractors, employees, agents or representatives, financiers, who need to have access to such information for the proper performance of their activities; or
- c) disclosures required under Law, without the prior written consent of the other Party.

#### **17.5 Severability**

17.5.1 The invalidity or unenforceability, for any reason, of any part of this Agreement shall not prejudice or affect the validity or enforceability of the remainder of this Agreement, unless the part held invalid or unenforceable is fundamental to this Agreement.

#### **17.6 Notices**

17.6.1 All notices or other communications which are required to be given under this Agreement shall be in writing and in the English language.

17.6.2 If to the RPG, all notices or other communications which are required must be delivered personally or by registered post or facsimile or any other method duly acknowledged to the addresses below:

Address:

Attention:

Email:

Fax. No. :

Telephone No. :

17.6.3 If to PROCURER, all notices or communications must be delivered personally or by registered post or facsimile or any other mode duly acknowledged to the address(es) below:

Address:

Attention:

Email:

Fax. No. :

Telephone No. :



17.6.4 All notices or communications given by facsimile shall be confirmed by sending a copy of the same via post office in an envelope properly addressed to the appropriate Party for delivery by registered mail. All notices shall be deemed validly delivered upon receipt evidenced by an acknowledgement of the recipient, unless the Party delivering the notice can prove in case of delivery through the registered post that the recipient refused to acknowledge the receipt of the notice despite efforts of the postal authorities.

17.6.5 Any Party may by notice of at least fifteen (15) days to the other Party change the address and/ or addresses to which such notices and communications to it are to be delivered or mailed.

#### **17.7    *Language***

17.7.1 All agreements, correspondence and communications between the Parties relating to this Agreement and all other documentation to be prepared and supplied under the Agreement shall be written in English, and the Agreement shall be construed and interpreted in accordance with English language.

17.7.2 If any of the agreements, correspondence, communications or documents are prepared in any language other than English, the English translation of such agreements, correspondence, communications or documents shall prevail in matters of interpretation.

#### **17.8    *Restriction of Shareholders / Owners' Liability***

17.8.1 Parties expressly agree and acknowledge that none of the shareholders of the Parties hereto shall be liable to the other Parties for any of the contractual obligations of the concerned Party under this Agreement. Further, the financial liabilities of the shareholder/ s of each Party to this Agreement, shall be restricted to the extent provided in the Indian Companies Act, 2013.

#### **17.9    *Taxes and Duties***

17.9.1 The RPG shall bear and promptly pay all statutory taxes, duties, levies and cess, assessed/ levied on the RPG, contractors or their employees that are required to be paid by the RPG as per the Law in relation to the execution of the Agreement and for supplying power as per the terms of this Agreement.

17.9.2 PROCURER shall be indemnified and held harmless by the RPG against any claims that may be made against PROCURER in relation to the matters set out in Article 17.9.1.

17.9.3 PROCURER shall not be liable for any payment of, taxes, duties, levies, cess whatsoever for

discharging any obligation of the RPG by PROCURER on behalf of RPG.

**17.10 *Independent Entity***

17.10.1 The RPG shall be an independent entity performing its obligations pursuant to the Agreement.

17.10.2 Subject to the provisions of the Agreement, the RPG shall be solely responsible for the manner in which its obligations under this Agreement are to be performed. All employees and representatives of the RPG or contractors engaged by the RPG in connection with the performance of the Agreement shall be under the complete control of the RPG and shall not be deemed to be employees, representatives, contractors of PROCURER and nothing contained in the Agreement or in any agreement or contract awarded by the RPG shall be construed to create any contractual relationship between any such employees, representatives or contractors and PROCURER.

**17.11 *Compliance with Law***

Despite anything contained in this Agreement but without prejudice to this Article, if any provision of this Agreement shall be in deviation or inconsistent with or repugnant to the provisions contained in the Electricity Act, 2003, or any rules and regulations made there under, such provision of this Agreement shall be deemed to be amended to the extent required to bring it into compliance with the aforesaid relevant provisions as amended from time to time.

**17.13 *Breach of Obligations***

The Parties acknowledge that a breach of any of the obligations contained herein would result in injuries. The Parties further acknowledge that the amount of the liquidated damages or the method of calculating the liquidated damages specified in this Agreement is a genuine and reasonable pre-estimate of the damages that may be suffered by the non-defaulting party in each case specified under this Agreement.

IN WITNESS WHEREOF the Parties have caused the Agreement to be executed through their duly authorized representatives as of the date and place set forth above.

For and on behalf of  
[PROCURER]

For and on behalf of [RPG]

Name, Designation and Address    Name, Designation and Address

Signature with seal

Signature with seal

Witness:

- 1.
- 2.

Witness:

- 1.
- 2.

**ANNEXURE – 3 – Standard Operating Procedure (SOP)**

Separately attached as below.

**ANNEXURE – 4 – SOP of State Bank of India**

Separately attached as below

**ANNEXURE – 5 – RMS Specifications**

Separately attached as below

**Standard Operating Procedure**

**for**

**Ease of Doing Business**

**in**

**Implementation of Component-A and Component-C**

**of**

**PM KUSUM Scheme**

## Contents

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## 1. Identification of Solar Power Injection Capacity at 33/11 kV Substations

- i. The list of sub stations is to be updated by the discoms keeping in mind the following considerations
  - a. The A and B category agricultural feeders shall be run simultaneously during day hours and will have to cater to the peak load on the feeder.
  - b. Sub stations at the tail end of a long 33KV line should also be included since there is a chronic low voltage situation in such sub stations.

Injection at the sub stations under category (a) will be on the 11KV side subject to availability of bay space. Injection at the sub stations under category (b) will be preferably on the 11 KV side and can also be done on the 33KV side.

In case the bay space has been shown to be available in the list of substations provided by DISCOMs to MPUVNL, DISCOM should keep the bay space reserved and should not be utilized by the DISCOM elsewhere. If in any exigency, the earmarked space is used by the Discom then that should be under pre-intimation to MPUVNL so that MPUVNL updates the same in the list. In such situation, RPG would have to arrange land for bay space adjoining to concerned substations.

- ii. For KUSUM-C projects: The Solar Power injection capacity to be decided based on peak load considering simultaneous operation of A & B feeders and the applicable CFA shall be in accordance with guidelines, issued by MNRE on 17.01.2024 and subsequent amendments thereof, applicable for beneficiaries coming under KUSUM C Scheme.
- iii. Capacities identified under above criteria (a) and (b) can be installed with a ceiling of 2MW for projects under KUSUM-A. Under KUSUM-C capacities over CFA eligibility limit may also be allowed.
- iv. Solar power injection capacity at 11 kV side of PTR will be limited to 100% of PTR capacity.
- v. Procedure for selection of RPG (to be coordinated by MPUVNL).

## 2. Procedure for selection of RPG

- i. The concerned DISCOM shall prepare PTR-wise information of all connected 11 kV feeders and provide the information to MPUVNL as per Format-A. Discoms shall ensure that the information of all the PTRs having agricultural load are included.

- ii. The list of 33/11 KV sub-station as provided by DISCOM shall be segregated for KUSUM-A & C Scheme. To avoid duplication the data will be reconciled with the list of 33/11 KV sub-station which have already been considered for connectivity under A & C component.
- iii. MPUVNL shall carry-out the procedure for selection of RPG. On selection of RPG, MPUVNL shall issue LoA. The proposal with necessary documents shall be sent to MPPMCL for executing PPA with the RPG. Thereafter the RPG shall obtain connectivity at the sub-station end from respective Discom.

S.No.	Steps	Respon- sibility	Description	Timelines (Days)
1.	Selection of RPG	MPUVNL	<b>Kusum A –</b> Online application from 1st to 15th day of every month  Evaluation and Document verification	S0  S0+15
			<b>Kusum C –</b> Through Tender Process	As per Tender Timelines
2.	Issuance of LOA	RPG / MPUVNL	<b>Kusum A –</b> EMD Deposit - RPGs has to submit EMD for Rs. 1 Lakh/ MW  LOA Issuance by MPUVNL	S0+21  L1=S0+30
		MPUVNL	<b>Kusum C –</b> After Financial Opening (F0) and Rate Approval by BoD.	L1 = F0+30
3.	Tariff Adoption	MPUVNL	<b>Kusum C –</b> MPUVNL shall file a petition before Hon'ble Commission for adoption of tariff in the matter of	F0+15

			tariff discovered in KUSUM-C Scheme.	
4.	PPA Execution	RPG	<b>Kusum A &amp; C</b> – SPV formation (if any)/submission of documents as per checklist. (Annexure B)	L1+30
		MPUVNL	<b>Kusum A &amp; C</b> – Forwarding of PPA documents to MPPMCL	L1+45
		MPPMCL	After adoption of tariff by MPERC in respect of KUSUM-C the list of beneficiary shall be shared with MPPMCL for obtaining administrative approval of the Board and GoMP as per DoP of MPPMCL.	AA
		MPPMCL	<b>Kusum A &amp; C</b> – PPA signing	AA+30
5	Bank loan	RPG	<b>Kusum A &amp; C</b> – MPUVNL shall facilitate for sanction of loan	P1 = As per established norm and timeline of banks
6	Escrow agreement	RPG, Bank and MPPMCL	<b>Kusum A &amp; C</b> – After submission of request for Escrow agreement by Bank.	P1+10
7	Connectivity & Clearances	RPG / DISCOM	<b>Kusum A &amp; C</b> – DISCOM to provide connectivity to the selected RPG at the sub-station.	As per Point 4 of the SOP

			<p>List of mandatory documents/ list of clearances required from RPG is as follows:</p> <ul style="list-style-type: none"> <li>a) PPA</li> <li>b) CEIG drawing approval</li> <li>c) NOC of MP Transco, (applicable for 33 kV side of injection)</li> <li>d) Document of registration of project with MPNRED</li> </ul>	
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### 3. Technical Specifications & Documents Required.

In order to streamline and standardize the procedure for application processing and setting up of solar power plants under the scheme, the following guiding procedures are to be followed:

- i) There will be no need for a separate in-principle approval for grid connectivity.
- ii) Discoms shall prepare a standardized estimate for grid connectivity on a per KM basis, DP structure, bay and crossings. Adherence to this estimate by RPG for injection at the substations identified as per clause 1 shall constitute an in-principle approval. The RPG shall submit an application with the single line diagram for the construction of the 11 kV or 33 kV line and HT connected in the office of concerned General Manager (O&M).
- iii) The RPG shall start setting up the solar power plant, 11 kV or 33 kV line (with 11 kV or 33 kV outdoor type circuit breakers at both end of the line) and 11 kV or 33 kV bay (as applicable) as per the layout plan & material specifications and CEA (Technical Standards for construction of electrical plant and electrical lines) Regulations 2010. There should be assessment on whether the protection system in substation needs to be upgraded or properly coordinated. Such upgradation would be done by concerned Discom at their expense.
- iv) CEIG shall approve the SLD and Plant lay-out and all necessary approvals within timelines determined as per Lok Seva Pradaay Guarantee Adhiniyam 2010 (Notification-). The specimen drawing and design for a 2MW solar plant submitted by CEIG shall be made available to the SPG for adherence of the norms specified.

SPG shall be required to submit the design, drawing and completion report time to time to CEIG with scheduled fee. The specimen drawing and design are attached at Annexure-C.

- v) The RPG to give at least 3 days prior notice to concerned Dy General Manager (O&M) for required shutdown towards 11 kV or 33 kV line constructions.
- vi) The RPG to submit application at concerned Dy General Manager (O&M) apprising the completion of 11 kV or 33 kV line, 11 kV or 33 kV bay (as applicable) construction and installation of solar power plant along with copy of electrical inspector certificate and copy of the same along-with the metering plan to GM (O&M), of concerning area of Discom for approval. Discoms shall publish a list of empaneled meter manufacturers and shall update the list regularly so that the RPGs would have this information beforehand.
- vii) After completion of 50% of work at site, RPG to request concerned General Manager(O&M) for issuance of demand note for testing of metering equipment, meters i.e. 11 kV or 33 kV CT-PT Set (main and standby), as applicable and ABT meters (main, check and standby) at NABL accredited laboratory as applicable. The RPG will deposit the applicable testing and inspection fees with the concerned office.
- viii) The rating of CT-PT Set will be as per the capacity of Solar Power Plant and Voltage Level and shall be of 0.2 S accuracy class only, Annexure (D).
- ix) Meter should be of 0.2 S accuracy class and ABT compliant.
- x) The conductor size should be in accordance with the maximum loading capacity and should be selected keeping in view the transmission losses and voltage regulation. To guide broad contours of conductor size viz a viz length of line from substation to solar power plant are as per Annexure (E).

The supports used for erection of lines for power evacuation should be preferably on 9.1 meter long 280 Kg PCC pole/ H-Beam as per size of conductor and site conditions such as road crossing etc. (Schedule of lines annexed at Annexure F)

- xi) Charges for drawl of power for synchronization/auxiliary services etc. by SPG from DISCOM grid shall be levied as per HV7 of the tariff order issued by Hon'ble Commission time to time.
- xii) The solar plants installed under KUSUM-A and KUSUM-C scheme shall be of help in resolving low voltage issue, reactive power management etc. The necessary operation in this regard be incorporated at substation level.

- xiii) As per clause 4.8 (iii) of MNRE guidelines dated 17.01.2024, in case common lines has to be laid for injection at designated substation by more than one RPG, the same would be done on prerogative of Discom, A separate guidelines would be issued by MPPMCL to address the same.

#### 4. Timeline and responsibility matrix

No.	Activity	Activity owner	Timeline	
			Individual	Cumulative
1	Submission of application with single line diagram of the 11 kV or 33 kV line at the office of concerned General Manager (O&M) along with Copy of Power Purchase Agreement (PPA) and letter of award (LoA) requesting sanction for construction of connecting 11 kV or 33 kV line and 11 kV or 33 kV Bay at the concerned 33/11 kV Sub-station and towards drawl of power from the grid for synchronization etc.	RPG	-	E1 (Day 1)
2	Verification of distance of the proposed solar power plant from concerned 33/11 kV Sub-station, feasibility of 11 kV or 33 kV bay construction at 33/11 kV Sub-station and proposed 11 kV or 33 kV line route	Jointly by Concerned Manager (O&M) and RPG	7 days	E1 + 8 days

No.	Activity	Activity owner	Timeline	
3	Preparation, approval and issuance of sanction to RPG towards the estimate for 11 kV or 33 kV line, 11 kV or 33 kV bay with applicable Grid Connectivity Charges ( <i>if any</i> ) and issuance of demand note towards supervision charges.	<b>Concerned Competent O&amp;M authority (through Manager (O&amp;M))</b>	15 days	E1 + 23 days
4	Deposit of applicable Grid connectivity charges and/or supervision charges ( <i>if any</i> ) at Manager (O&M) office	RPG	2 days	E1 + 25 days
5	<b><i>Planning, Designing, Installation work by RPG for 11 kV or 33 kV line (connecting the Solar Power Plant and concerned 33/11 kV Sub-station) and 11 kV or 33 kV bay at Sub-station and solar power plant.</i></b>			
6	Request letter to RPG for deposit of applicable inspection charges AND applicable charges for testing of CT-PT Set and Meters at NABL Accredited Laboratory	Concerned Manager (O&M)	2 days	T1 + 2 days
7	Deposit of requisite inspection charges AND testing charges for CT-PT Set & Meters at concerned Manager (O&M) office	RPG	3 days	T1 + 5 days
8	Request to GM (O&M) of Discom to depute inspection officer(s) for inspection of power evacuation work by Dy. General Manager(O&M)/	Concerned DGM (O&M)/construction and RPG	5 day	T1 + 10 days

No.	Activity	Activity owner	Timeline	
	construction for i.e. Line, Bay work & Solar plant installation work			
9	<b><i>Delivery of CT-PT Set and ABT meters by RPG at site.</i></b>			
10	Letter to SE (Meter Testing) for testing of meters with copy to concerned GM (O&M) and Dy Manager (O&M)	RPG	7 days	T1 +17 days
11	Testing of ABT meters at GM (Meter testing) and handover of meter to concerned GM (O&M)/ O&M wing	Discom's	10 days	T1 + 27 days
12	Installation of tested CT-PT Meters (Testing of CT PT by NABL Lab) and meters at site in the presence of officer(s) of Discom's meter testing wing and concerned Manager (O&M)	RPG	3 days	T1 + 30 days
13	<b><i>After 100 % work completion at site, RPG to get the solar power plant, 11 kV or 33 kV line, 11 kV or 33 kV bay at Discom's Sub-station, transformers and other protective equipment inspected by Electrical Inspector and get the required compliance certificate in respect of electrical installation to CEA (Technical Standard for Connectivity of the Distributed Generation Resources) Regulations 2013 with amendments thereof and CEA (Measures relating to safety and electric supply) Regulations 2010 with amendments thereof and submit a copy of all documents to concern Manager(O&amp;M) and DGM(O&amp;M) .</i></b>			
14	Intimation-cum-request letter to GM (O&M), under intimation to corporate	RPG	1 day	F1 (Day 1)



No.	Activity	Activity owner	Timeline	
	office of Discom, for connectivity, commissioning & synchronization of the solar power plant, 11 kV or 33 kV line and transformers with copy to concerned Manager (O&M) along with the copy of approval from CEIG.			
15	Constitute committee for connectivity, synchronization & commissioning to the Solar power plant, 11 kV or 33 kV line and transformers	GM(O&M)	3 day	F1 + 4 Days
16	Site visit by the committee and submission of connectivity, synchronization and commissioning report, joint meter reading report to GM(O&M) with copy to concerned Manager (O&M) office	Committee	5 days	F1 + 9 days
17	Submission of final Joint Meter Reading (JMR) report of each month to GM (O&M), with copy to Commercial (Non-Conventional) MPPMCL and RPG	Concerned GM (O&M) / Manager (O&M)	Monthly basis	

The JMR of all the solar plant under KUSUM-A & C schemes will be provided to SLDC upto third of every month for inclusion in SEA.

## 5. Review of SOP

1. Standard operating procedure (SOP) can be periodically reviewed and amended by MPUVNL after getting concurrence of Discoms and MPPMCL, if need be.

Annexure-A

Format for estimation of capacity of plant under KUSTUM C Scheme

Circle	S.No.	S/s Name	Latitude of Location of S/s	Longitude of Location of S/s	Power Transformer ID, Name	PTR Capacity in MVA	Feeder names	Type of Feeder	Pump details (Latest)				Energy consumption of FY 2023-24 (feeder wise, in lakh units)	Energy consumption of FY 2022-23 (feeder wise, in lakh units)	Energy consumption of FY 2021-22 (feeder wise, in lakh units)	Annual Peak Load (Ampere)	Bay/ Bay Space availability data	
									Number of pumps upto 7.5hp		Number of pumps above 7.5hp						at 11kV side	at 33kV side
									Permanent connection	Temporary connection	Permanent connection	Temporary connection						
1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18	19
Ashoknagar	1	Kolua	aaaaaaa	bbbbbbbbb	S122	5	A1	IRR	400	20	500	20	60	55	50			
		Kolua	aaaaaaa	bbbbbbbbb	S122	5	B1	IRR	401	20	501	20	59	54	49			
		Kolua	aaaaaaa	bbbbbbbbb	S122	5	C1	IRR	402	20	502	20	58	53	48			
		Kolua	aaaaaaa	bbbbbbbbb	S123	3.15	A2	IRR	403	20	503	20	57	52	47			
		Kolua	aaaaaaa	bbbbbbbbb	S123	3.15	B2	MIX	404	20	504	20	56	51	46			

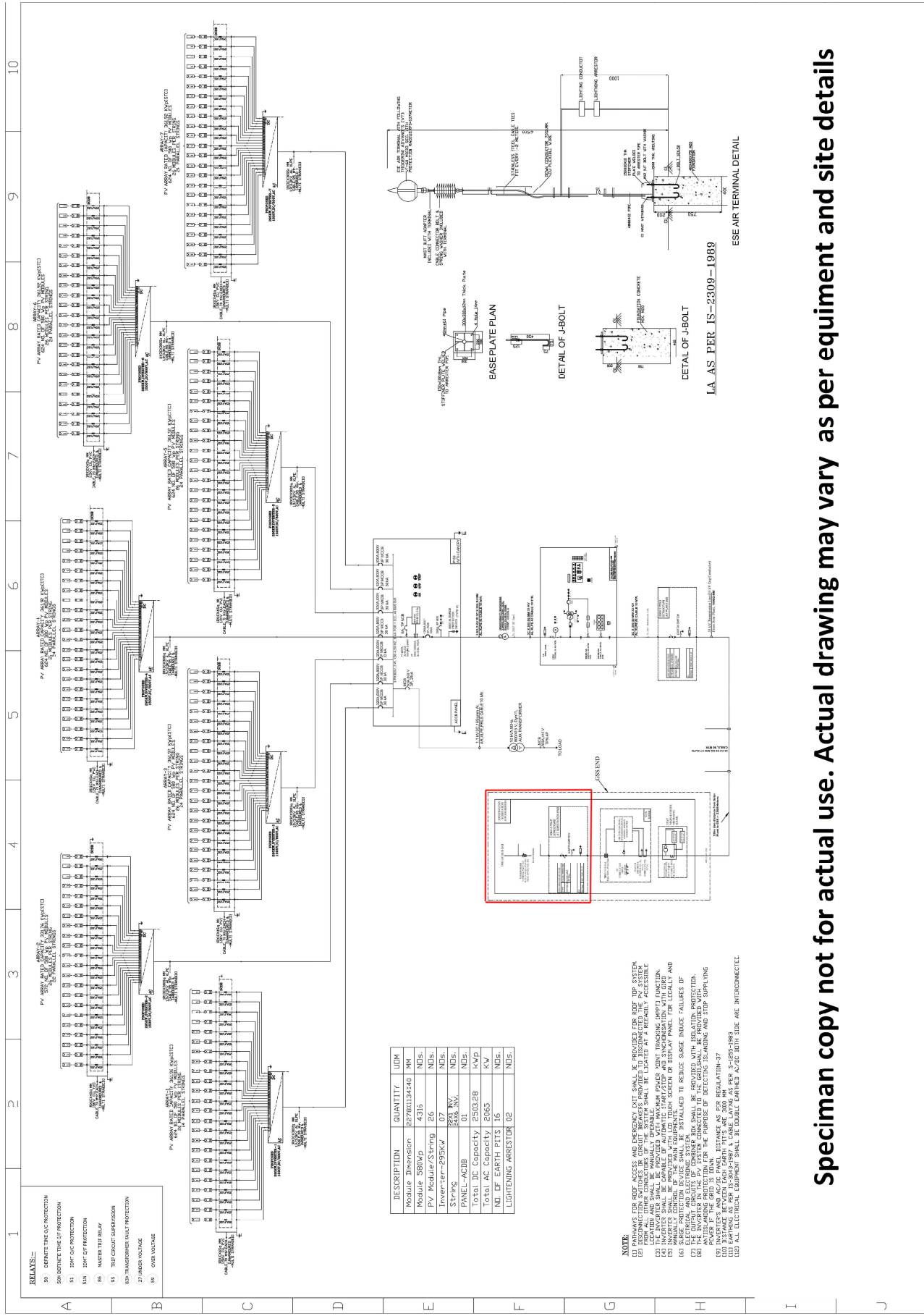
## Annexure B

(I) The checklist of documents to be furnished along with SPV (where applicable) is as here under:-

Sr No.	Particular
1	Incorporation certificate of the SPV company
2	All the successful bidders under Kusum C and SPV formed for execution under Kusum A have to submit the GST certificate before connectivity and commissioning of plant.
3	Power of attorney of the SPV company along with certified true copy of Board resolution of SPV company for authorizing for execution of PPA
4	Self-attested copy of LoA & PBG acceptance letter issued by this office
5	AOA & MoA of the SPV company with at-least holding 51% shareholding by the RPG (i.e. successful bidder) in the SPV company and the memorandum of association (MoA) / articles of association (AoA) of the SPV highlighting the relevant provision which highlights the objects relating to solar power plant development as per guidelines.
6	Undertaking for maintaining minimum 51% shareholding in project company (i.e. SPV company) on N.J.S of Madhya Pradesh State worth of Rs.1000/-
7	ID proof of all Directors of the SPV company
8	Bank A/c details of the SPV company

(II) The checklist of documents to be furnished along with PPA is as here under: -

<b>Sr No</b>	<b>Particular</b>
1	Copy of LoA with covering letter
2	SPV certificate of Incorporation (If applicable)
3	Performance Bank Guarantee (PBG)
4	In case of Private Limited Company- Board Resolution in Favour of signing authority along with IDs of all parties including signing authority.
5	In case of partnership/Proprietorship firm- Duly notarized letter of authorization on Non-judicial stamp paper in favour of signing authority along with partnership deed of all parties including signing authority. In case proprietor himself wants to sign PPA, only firm's registration certificate in proprietor's name and his/her ID is required.
6	Two Copies of Draft Power Purchase Agreement as per MNRE guidelines along with 2 Non-notarized Non-Judicial Stamp Papers of Rs.1000/-
7	PPA Annexure as provided by MPPMCL



Speciman copy not for actual use. Actual drawing may vary as per equipment and site details



**Actual drawing may vary as per equipments and site**





**Annexure D**

<b>Voltage Level</b>	<b>Solar Power Capacity (MW)</b>	<b>Rating of CT-PT Set</b>
11 kV	Upto 1 MW	100/5 Amp
	Above 1 MW - Upto 2 MW	150/5 MW
	Above 2 MW – Upto 3 MW	200/5 Amp
	Above 3 MW - 4 MW	250/5 Amp
	Above 4 MW - 5 MW	300/5 Amp
33 kV	Upto 5 MW	100/5 Amp
	Above 5 MW	As per technical considerations



## Annexure E

The conductor size should be in accordance with the maximum loading capacity to maintain Voltage Regulation within 3% and should be selected keeping in view to minimize the transmission losses. To guide broad contours of conductor size viz a viz length of line from substation to solar power plant are as under: -

### (a) 11 kV Lines

S No	Length of 11 kV line (in Km)	Solar power injection capacity (in MW)	ACSR Conductor size	Support
1.	< 2 km	Up to 4 MW	75 sq mm (Raccoon)	PCC pole 280 kg, 9.1 m
		Above 4 MW	100 sq mm (Dog)	H-Beam
2.	2 to 4 km	Up to 4 MW	75 sq mm (Raccoon)	PCC pole 280 kg, 9.1 m
		Above 4 MW	100 sq mm (Dog)	H-Beam
3.	Above 4 km	Up to 4 MW	75 sq mm (Raccoon)	H-Beam
		Above 4 MW	100 sq mm (Dog)	H-Beam

### (b) 33 kV line

S No	Length of 33 kV line (in Km)	Solar power injection capacity (in MW)	ACSR Conductor size	Support
1.	-	Above PTR capacity (generally >5 MW)	100 sq mm (Dog)	H-Beam

1. The Road crossing should be on 13 Mtr H-Beam
2. DP structure on each 1 km line apart from turning and tapings as per current practice
3. Average span of 11 kV line shall be maximum 60 mtr and after every one km of line a DP structure should be provided.

Current Schedule of rates (SoR) shall be applied for cost estimation.

## COST SCHEDULE - C-2.1 (Modified)

## 1 KM OF 11 KV LINE ON 13 Mtr H-BEAM with ACSR Dog Conductor maximum Span 70 Mtrs

Sl. No.	Item Code	Particulars	Unit	FoR Rate	HSN or SAC Code	Qty.	Total Amt. (Rs.) using F.O.R. rates Rate	Erection rates	Total Amt. of Erection
1	2	3	4	5	6	7	8	9	10
1	M-0501066	H-Beams 152 X 152 mm., 37.1 Kg./Mtr.-13 mtr. Long = 482.3 kg	no.	33110	7216	14	463539	2768	38752
	M-0501067	H-Beams 152 X 152 mm., 37.1 Kg./Mtr.-11 mtr. Long = 408.1 kg for STUD	No.	29122	7216	1	29122	2149	2149
2	M-0502010	11 KV 'V' cross-arms angle type (65x65x6 mm angle)	No.	1128	7216	14	15797	135	1890
3	M-0502019	Back clamps (65x8 mm flat) for H-Beam	No.	175	7216	30	5252	0	0
4	M-0502367	11 KV Single pole cut point fitting 100x50x6 mm channel	Set	3153	7216	1	3153	509	509
5	M-0502185	11 KV Side cross arm 75x40x6 mm Channel	No.	3232	7216	0	0	175	0
6	M-0403096	Earthing Coil ( coil of 115 turns of 50 mm.dia. and 2.5 Mtrs. lead of 4.0 mm. G.I wire)	No.	116	7217	14	1618	0	0
7	M-0602002	11 KV Pin insulator Polymer Composite (5KN) FRP dia 24mm	No.	169	8546	42	7118	34	1428
8	M-0401002	ACSR Dog conductor 0.10 sq. inch (100 sq.mm. Al.Eq.), (6/4.72 + 7/1.57 mm)	Km.	87862	7614	3.1	272372	12000	37200
9	M-0404231	Jointing Sleeves suitable for 100 Sq. mm.Al. Eq. AAAC conductor	No.	186	7308	6	1115	261	1566
10	M-0502231	Painted Stay set 20 mm. complete with turn buckles	Nos.	1093	7217	5	5464	677	3385
11	M-0403014	Stay wire 7/4mm. kg per stay for H-Beam / PCC Pole 280 Kg. 9 m @ 7.5, 11 m @ 8.50, 13 m @ 10, 15 m @ 12	kg	82	7217	50	4082	0	0
12	M-0502261	Clamp suitable for 152 X 152 mm., 37.1 Kg./mtr H-Beam	Set	292	7216	5	1461	0	0
13	P-0702056	Stone Block/Pre cast block for base pedding 450x450x75mm	No.	281	99541	14	3930	0	0
14	P-0001037	Concreting (1:3:6) <b>0.36 Cmt</b> for [H-Beam - 7 m, 9 m & RSJ 9.3 m, PCC Pole DP / TP/4P/6P of 140 kg. 8 m 200 Kg. 9 m 280 Kg. 9 m], <b>0.56 Cmt</b> for 11 m, <b>0.60 Cmt</b> for 13 m, <b>0.67 Cmt</b> for 15 m Per Pole including muffing with Pole Pit digging by Hydra M/c.	Cmt. (1:3:6)	4729	99541	8.4	39720	630	5292
15	P-0001037	Concreting of stay @ 0.3 cmt. per stay	Cmt. (1:3:6)	4729	99541	1.5	7093	630	945
16	M-1214001	Red oxide paint	Ltr.	94	3208	20	1871	270	5400
17	M-1214002	Aluminium paint	Ltr.	198	3208	20	3951	192	3840
18	M-0403016	Anti climbing devices	No.	306	7313	15	4592	40	600
19	M-0502429	Danger Boards Enamalled Type 11KV	No.	69	8310	14	970	29	406
20	M-0404370	Binding wire and tape	Kg.	332	7605	14	4643	0	0
21	M-0403208	M.S.Nuts and Bolts	Kg.	82	7318	20	1640	0	0
		<b>Total</b>					<b>878503</b>		<b>103362</b>
		<b>Dismanteling &amp; return Area store</b>							<b>0</b>
22		<b>Total Cost using F.O.R Rate + Erection cost</b>					<b>981865</b>		
23		<b>Grand Total Cost using F.O.R Rate including 18 % GST</b>					<b>1158601</b>		
		<b>Returnable material</b>							
		Conductor scrap	Kgs.	103	7605	0	0		
		Steel scrap	Kgs.	17	7228	0	0		
		<b>Total</b>					<b>0</b>		
		<b>Cost per Km. using F.O.R. Rate</b>					<b>1158601</b>		

Note:-The erection rates mentioned "0" against various items are included in its related main material erection charges. For details refer the guide line of SOR .

**COST SCHEDULE - C-9.4**  
**11 KV D.P.STRUCTURE ON H-Beam 13 mtr long FOR STRAIGHT LINE**  
**(TO BE SUPPLEMENTED TO EVERY 1 KMS. OF 11 K.V. LINE)**

Sl. No.	Item Code	Particulars	Unit	F.O.R. Rate	HSN or SAC Code	Qty.	Total Amt. (Rs.) using F.O.R. rates Rate	Erection rates	Total Amt. of Erection
1	2	3	4	5	6	7	8	9	10
1	M-0501066	H-Beams 152 X 152 mm., 37.1 Kg./Mtr.-13 mtr. Long = 482.3 kg	no.	33110	7216	2	66220	2768	5536
	M-0502108	D.C. Cross arms 4 ft centre to centre (100X50x6 mm.) channel	Set	4880	7216	1	4880	884	884
2	M-0502104	D.C.cross- arm of ISMC channel of 100 X 50, suitable for 8' centre	Set	5149	7216	0	0	884	0
3	M-0502261	Clamp suitable for H-Beam ( each weight 3.2 kg ms flat 65x8mm)	Set	292	7216	2	584	0	0
4	M-0602007	11 KV (45KN) 16mm FRP with 25mm per KV creepage Disc Insulator Polymer	No.	117	8546	6	702	126	756
5	M-0404210	11KV Strain hard ware fitting	No.	122	7308	6	729	0	0
6	M-0602002	11 KV Pin insulator Polymer Composite (5KN) FRP dia 24mm	No.	169	8546	2	339	34	68
	M-0502390	Horizontal and cross bracing 4' centre	Set	4117	7216	1	4117	353	353
7	M-0502395	Horizontal and cross bracing 8' centre	Set	5878	7216	0	0	954	0
8	M-0502019	Back Clamp suitable for H-Beam (MS Flat 65x8 mm)- each weight 1.92 Kg	No.	175	7216	4	700	0	0
9	M-0502231	Painted Stay set 20 mm. complete with turn buckles	Nos.	1093	7217	4	4371	677	2708
10	M-0403014	Stay wire 7/4mm. kg per stay for H-Beam / PCC Pole 280 Kg, 9 m @ 7.5, 11 m @ 8.50, 13 m @ 10, 15 m @ 12	kg	82	7217	40	3266	0	0
11	M-0502261	Clamp suitable for H-Beam ( each weight 3.2 kg ms flat 65x8mm)	Set	292	7216	4	1169	0	0
12	P-0702056	Stone Block/Pre cast block for base pedding 450x450x75mm	No.	281	99541	2	561	0	0
13	P-0001037	Concreting (1:3:6) <b>0.36 Cmt</b> for [H-Beam - 7 m, 9 m & RSJ 9.3 m, PCC Pole DP / TP/4P/6P of 140 kg. 8 m 200 Kg. 9 m 280 Kg. 9 m], <b>0.56 Cmt</b> for 11 m, <b>0.60 Cmt</b> for 13 m, <b>0.67 Cmt</b> for 15 m Per Pole including muffing with Pole Pit digging by Hydra M/c.	Cmt.	4729	99541	1.2	5674	630	756
14	P-0001037	Concreting of stay @ 0.3 cmt. per stay	Cmt. (1:3:6)	4729	99541	1.2	5674	630	756
15	M-0403096	Earthing Coil ( coil of 115 turns of 50 mm.dia. and 2.5 Mtrs. lead of 4.0 mm. G.I wire)	No.	116	7217	2	231	0	0
16	M-1214001	Red oxide paint	Ltr.	94	3208	2.6	243	270	702
17	M-1214002	Aluminium paint	Ltr.	198	3208	2.6	514	192	499.2
18	M-0403016	Anti climbing devices	No.	306	7313	2	612	40	80
19	M-0502429	Danger Boards Enamalled Type 11KV	No.	69	8310	1	69	29	29
20	M-0403208	M.S.Nuts and Bolts	Kg.	82	7318	6	492	0	0
		<b>Total</b>					<b>101147</b>		<b>13127</b>
		<b>Dismanteling &amp; return Area store</b>							<b>0</b>
7		<b>Total Cost using F.O.R Rate + Erection cost</b>					<b>114274</b>		
8		<b>Grand Total Cost using F.O.R Rate including 18 % GST</b>					<b>134844</b>		
		<b>Returnable material</b>							
		Conductor scrap	Kgs.	103	7605	0	0		
		Steel scrap	Kgs.	17	7228	0	0		
		<b>Total</b>					<b>0</b>		
		<b>Cost per No. using F.O.R. Rate</b>					<b>134844</b>		

NOTE:—The erection rates mentioned “0” against various items are included in its related main material erection charges. For details refer the guide line of SOR .

## COST SCHEDULE - C-1.5 (Modified)

## 1 KM OF 11 KV LINE ON 280 KG 9.1 Mtr PCC Pole Using Raccoon Conductor maximum Span 60 Mtrs IN RURAL AREA

Sl. No.	Item Code	Particulars	Unit	FoR Rate	HSN or SAC Code	Qty.	Total Amt. (Rs.) using F.O.R. rates Rate	Erection rates	Total Amt. of Erection
1	2	3	4	5	6	7	8	9	10
1	M-0501010	280 Kg.,9.1 Mtrs. long PCC pole	Number	3597	6810	17	61149	2839	48263
2	M-0502001	33 KV V cross-arms 75x75x6 mm angle (Each weight 24.60 Kg)	Number	2249	7216	17	38233	135	2295
3	M-0502023	Back Clamp suitable for 280 Kg PCC Pole (MS Flat 65x8 mm) - each wt 1.92 Kg	Nos.	175	7216	34	5952	0	0
4	M-0502055	33 KV Top clamps 75x75x6 mm Angle	Number	293	7216	17	4981	49	833
	M-0502364	33 KV Single Pole Cut Point Channal (100x50x6mm MS Channel) 1.65 mtr Long	Set	3660	7216	1	3660	509	509
	M-0502185	11 KV Side cross arm 75x40x6 mm Channel	No.	3232	7216	0	0	175	0
5	M-0403096	Earthing Coil ( coil of 115 turns of 50 mm.dia. and 2.5 Mtrs. lead of 4.0 mm. G.I wire)	No.	116	7217	17	1964	0	0
6	M-0602002	11 KV Pin insulator Polymer Composite (5KN) FRP dia 24mm	No.	169	8546	51	8643	34	1734
7	M-0401003	ACSR Raccoon conductor 0.075 sq. inch (80 sq.mm. AL.Eq.), (6/4.09 + 1/4.09 mm)	Kilometer	69149	7614	3.1	214362	9900	30690
8	M-0404233	Jointing Sleeves suitable for 55 Sq. mm.AL. Eq. AAAC conductor	No.	94	7308	7	659	0	0
9	M-0502230	Painted Stay set 16 mm. complete turn buckles	No.	568	7217	7	3973	594	4158
10	M-0403019	Stay wire 7/3.15 mm. kg per stay for PCC Pole 140 kg 8 m @ 5.5, 200 Kg. 9 m @ 6.5, RSJ 9.3 m.@ 6.5	kg	76	7217	45.5	3471	0	0
11	M-0502260	Clamp suitable for 280 Kg. 9.1 mtr. long PCC Pole (3.04 kg each)	Set	278	7216	7	1943	0	0
12	M-0601036	Stay insulator	No.	16	8546	7	113	0	0
13	M-0001001	Back filling of poles with boulders.	No.	171	9954	17	2909	0	0
14	M-0403012	G.I. Wire 4.0 mm. (8 SWG)-Earthing for PCC Pole	Kgs.	73	7217	11.2	813	7	78
15	P-0702056	Stone Block/Pre cast block for base pedding 450x450x75mm	No.	281	99541	17	4772	0	0
16	P-0001037	Concreting of stay @ 0.2 cmt. per stay	Cmt. (1:3:6)	4729	99541	1.8	8512	630	1134
17	M-1214001	Red oxide paint	Ltr.	94	3208	3.4	318	270	918
18	M-1214002	Aluminium paint	Ltr.	198	3208	3.4	672	192	653
19	M-0403016	Anti climbing devices	No.	306	7313	17	5204	40	680
20	M-0502429	Danger Boards Enamalled Type 11KV	No.	69	8310	17	1178	29	493
21	M-0404370	Binding wire and tape	Kg.	332	7605	4	1327	0	0
22	M-0403208	M.S.Nuts and Bolts	Kg.	82	7318	20	1640	0	0
		<b>Total</b>					<b>376448</b>		<b>92438</b>
		<b>Dismanteling &amp; return Area store</b>							<b>0</b>
24		<b>Total Cost using F.O.R Rate + Erection cost</b>					<b>468886</b>		
25		<b>Grand Total Cost using F.O.R Rate including 18 % GST</b>					<b>553285</b>		
		<b>Returnable material</b>							
		Conductor scrap	Kgs.	103	7605	0	0		
		Steel scrap	Kgs.	17	7228	0	0		
		<b>Total</b>					<b>0</b>		
		<b>Cost per Km. using F.O.R. Rate</b>					<b>553285</b>		

NOTE:-The erection rates mentioned "0" against various items are included in its related main material erection charges. For details refer the guide line of SOR .



## **MEMORANDUM OF UNDERSTANDING (MoU)**

This Memorandum of Understanding (MOU) is executed at BHOPAL on 21/11/2024.

**BETWEEN  
MADHYA PRADESH URJA VIKAS NIGAM LIMITED (MPUVNL)  
AND  
STATE BANK OF INDIA (SBI)**

### **PREAMBLE**

This Memorandum of Understanding ("the MoU") between Madhya Pradesh Urja Vikas Nigam Limited, a company incorporated under Companies Act, 1956 / 2013 and promoted by the Government of Madhya Pradesh and having its Head Office at Urja Bhawan, Link Road No-2, Shivaji Nagar Bhopal, which expression shall unless repugnant to the context or meaning thereof, be deemed to include its successors in business, legal representatives and permitted assigns of the first part (hereinafter referred to as "MPUVNL");

And

State Bank of India, a body corporate constituted under the State Bank of India Act, 1955 and having its Corporate Centre at Mumbai, which expression shall unless repugnant to the context or meaning thereof, be deemed to include its successors and permitted assigns of the other part (hereinafter referred to as "SBI").

WHEREAS, individually, MPUVNL and/ or SBI shall be referred as "Party" and collectively as "Parties", as the context and relevance may require for the purpose of this MoU.

WHEREAS, the Cabinet Committee on Economic Affairs, Government of India had approved the Pradhan Mantri Kisan Urja Surksha Evam Utthan Mahaabhiyan Scheme ("PM-KUSUM SCHEME") in its meeting dated 19.2.2019. Subsequently, detailed guidelines for implementation of different components of PM KUSUM Scheme were issued by Ministry of New and Renewable Energy, Govt. of India (hereinafter, "MNRE") vide OM 32/645/2017-SPV Division dated 22.07.2019 and its various amendments. The PM-KUSUM SCHEME consists of three components i.e., the Component-A for installation of Decentralized Ground Mounted Grid Connected Renewable Power Plants, Component-B for installation of standalone Solar Powered Agriculture Pumps and Component-C for solarization of the grid connected agriculture pumps.

WHEREAS, in suppression of MNRE's guidelines for implementation of PM KUSUM scheme issued vide OM 32/645/2017-SPV Division dated 22.07.2019 and its various amendments, it issued revised comprehensive guidelines dated 17.01.2024 for implementation of PM KUSUM Scheme, encompassing all above components under the scheme (hereinafter, "PM KUSUM- New Guidelines").

WHEREAS, PM KUSUM- New Guidelines have country level targets against different components of PM KUSUM scheme and contain guiding principles for implementation of these components.

WHEREAS, Madhya Pradesh Urja Vikas Nigam Limited (MPUVNL) is the State implementing Agency (SIA) for implementation of different components of PM KUSUM scheme. The guidelines prescribe responsibilities of SIA, which includes, among others, coordinate with Banks/FIs to provide loan facilities and handhold farmer/ renewable power generators (RPGs) in such matters. WHEREAS, MPUVNL receives targets from MNRE from time to time under different components of PM KUSUM scheme. These projects are executed by Renewable Power Generators (RPGs)/ vendors selected through transparent competitive process aligned to PM KUSUM- New Guidelines and relevant orders of MNRE in this behalf issued from time to time.

WHEREAS, projects under component-C (feeder level solarization) and component-A of PM KUSUM scheme are executed, operated and maintained for project life by RPGs. An RPG enters clearly identified contractual arrangements with Madhya Pradesh Power Management Company Limited (MPPMCL) to sell electricity generated from concerned project to MPPMCL as per detailed terms and conditions of power purchase agreement (PPA) executed between MPPMCL and concerned RPG. This ensures revenue stream as well as bankability of concerned project under KUSUM-C (FLS).

WHEREAS, an RPG may require debt from prominent banks/ FIs to implement concerned project in financially prudent manner. To safeguard repayment of such debts in defined timeframe as per terms and conditions of financing agreement, an escrow agreement is executed between



concerned RPG, MPPMCL and concerned bank/ FI as per detailed terms and conditions delineated therein.

WHEREAS, projects under component-B of PM KUSUM scheme are implemented by vendors empanelled through competitive bidding. These projects require contribution of farmers, which may be done by availing debt from banks/ FIs. The debt is paid back by farmers through its means and sources.

WHEREAS, in the interest of scheme implementations, it is decided between the Parties to endeavour to facilitate implementation of projects under different components of PM KUSUM through streamlining and standardization of processes, procedures, documentation and checklist of necessary for sanctioning and disbursal of loan to as well as remittance of loan repayment.

WHEREAS, in the interest of scheme implementations, it is decided between Parties to endeavour to carve out facilitative and coordinative roles to be anchored by MPUVNL involving SBI, RPG and MPPMCL.

NOW THEREFORE, the Parties align and actuate the following:

1. Roles and responsibilities of SBI which shall be subject to internal & regulatory guidelines/instructions.

- i. Streamline and standardize processes, procedures, documentation, compliances and checklist meant for initiation, approval, disbursal and repayment of debt pertaining to KUSUM-C (FLS) projects
- ii. Keep MPUVNL updated and involved in key or critical matters pertaining to an RPG or a project or updated in its mandate to finance projects under KUSUM-C (FLS).
- iii. Identify point of contact for coordination between MPUVNL and SBI for matters related to different components of PM KUSUM scheme.
- iv. Ensure that all debt processing- initiation, approvals and disbursal, happens at its headquarters in Bhopal, to facilitate borrowers under PM KUSUM scheme.

2. Roles and responsibilities of MPUVNL

- i. Shall work for competency building of stakeholders, including RPGs, about terms and conditions of debt to be provided by SBI as per Annexure I and Annexure II to this MoU.
- ii. Shall keep SBI informed about RPG/ project specific initiation of process for availing Central Financial Assistance (CFA) from MNRE.
- iii. Shall facilitate in execution of tripartite Escrow Agreement among RPG, MPPMCL and SBI but MPUVNL shall not be held liable or responsible for the financial obligations, repayment, or enforcement of such escrow agreements.
- iv. Shall act as single point of contact (SPOC) for any coordination or solutioning involving RPG, MPPMCL and SBI related to debt repayment, grievance redressal or communication gaps.

3. Liabilities:

The Parties undertake in the performance of their duties, as laid down in the present MoU, to proceed with utmost care. However, neither of the Parties will take over or assume responsibility and/or liability whatsoever for the acts, deeds or actions of the personnel of the other Parties. MPUVNL shall not assume or bear any responsibility for financial obligations, debt servicing, or repayment liabilities of RPGs. All financial obligations related to loans taken by RPGs from SBI or any other financial institution shall solely be the responsibility of the RPG.

4. Force Majeure:

- i. Neither of the Parties shall be held in default, in the performance of obligations under this MoU, in circumstances of Force Majeure which shall include, but without limitation to war, civil commotion, riots, acts of God, Government action, pandemic situation. In the event of Force Majeure, the Parties undertake to consult each other and proceed according to the prevailing situation to be recorded in writing.
- ii. In case of persistence of such force majeure for more than 3 continuous months, the Parties may mutually decide to exit from the MoU, subject to amicable settlement/ discharge of respective obligations arising up to a date before/ during such period of 3 months.



- i. Amicable settlement  
Parties shall preferably endeavour to settle any issues amicably, where decision of Managing Director, MPUVNL shall be final and binding.
- ii. Jurisdiction  
The Contract shall be governed by and interpreted in accordance with the laws in force in India. The Courts of Bhopal shall have exclusive jurisdiction in all matters arising under the contract.

6. Confidentiality:

- i. Parties shall treat as strictly confidential any documentation and information in connection with activities performed on the basis of the present MoU, save and except for certain information which are in public domain and other exceptions.
- ii. Confidentiality or disclosure, as applicable, of information or documentation shall be subjected to relevant laws or lawful requirement of enforcement/regulatory agencies/authorities.

7. Validity, Duration and Amendments:

- i. This MoU shall enter into force as from the date of signing by the Parties and will remain in force for 2 years extendable on mutually agreed terms and conditions based upon the evaluation of performance and outcome. Either Party may terminate this MoU at any time, with or without cause, by providing 30 days' written notice to the other Party. Termination of this MoU will not affect any obligations or liabilities accrued prior to termination, and no penalties or liabilities shall arise from the termination.
- ii. This MoU may be amended, upon mutual written consent of the Parties in advance, to serve the basic purpose of it.
- iii. Upon termination of this MoU, provisions related to confidentiality, notices, and dispute resolution shall continue to be in effect, unless mutually agreed otherwise in writing by the Parties.

8. Non-Financial Agreement

This MoU does not involve any financial obligations or transactions between the Parties. Each Party will bear its own costs and expenses associated with the activities under this MoU, and no reimbursement or compensation shall be sought or provided by either Party.

9. Indemnity Clause

Each Party agrees to indemnify, defend, and hold harmless the other Party, its officers, employees, and agents from and against any and all claims, liabilities, losses, damages, costs, and expenses (including reasonable attorney's fees) arising out of or in connection with any breach of this MoU, negligent act, or omission, or any third-party claim related to the actions of the indemnifying Party.

10. MPUVNL's Liability

MPUVNL's liability, if any, arising under this MoU shall be limited to the extent of direct damages only, and in no event shall MPUVNL be liable for any indirect, consequential, incidental, special, or punitive damages, including but not limited to loss of profit, revenue, or anticipated savings.

11. General

- i. This MoU shall be governed and construed in accordance with the laws of India. The competent courts at Bhopal, India shall have the sole and exclusive jurisdiction over any dispute that arises in relation to this Agreement.
- ii. The individuals executing this MoU represent and warrant that they are empowered and duly authorized execute this MoU on behalf of the Parties they represent.



- iii. Each Party represents and warrants to the other Party that it is authorised to execute this MoU and is competent to discharge the obligations under this MoU.
- iv. Nothing in this MoU will be construed to create a partnership, joint venture, franchise, fiduciary, employment, or agency relationship between the parties. Neither Party has any express or implied authority to assume or create any obligations on behalf of the other or to bind the other to any contract, agreement or undertaking with any third party. Neither Party has any authority to act as an agent for the other Party or to bind the other Party to any obligations or liabilities with any third parties. This MoU is for the purpose of facilitation and coordination only.
- v. This MoU is non-exclusive, and nothing in this MoU shall restrict MPUVNL from entering into similar agreements with other banks, financial institutions, or third parties for the facilitation of debt financing for projects under the PM-KUSUM scheme.
- vi. This MoU is non-binding and is intended solely for the purpose of facilitating collaboration between the Parties. The terms and obligations of this MoU do not constitute a legally enforceable agreement, and no rights or claims shall arise from the execution of this MoU unless specifically formalized by further agreements or contracts.
- vii. It is explicitly stated that renewable power generators (RPGs) are not under any obligation to seek financing from SBI. SBI is one of the available options for debt financing, and RPGs are free to choose any bank or financial institution at their discretion. Similarly, SBI shall not be under any obligation to extend loans to all RPGs applying for financial assistance.
- viii. If any provision of this MoU shall be held by a court of competent jurisdiction to be illegal, invalid or unenforceable, the remaining provisions shall remain in full force and effect. In such cases, any performance or activity undertaken or anchored by Parties attributable to them and its larger implications shall be to the account of the Parties at their risk and cost, whenever such judgments are pronounced or finally effected/ enforced/ arise.

## 12. Notices

All communications required to be given by a Party to the other Party under or pursuant to this MoU shall be in English, in writing and shall be deemed to have been given when hand delivered by messenger or courier or sent by registered post or speed post or facsimile or email to the other Party at the following address or to such other address as either Party may from time to time notify to the other.

M.P. Urja Vikas Nigam Mr./ Ms. Ajay Shukla  
Limited

Address: Link Road No.2, 5 No. Bus Stop, Near Durga Petrol  
Pump, Shivaji Nagar, Bhopal.

Email: mpnred.wind@gmail.com  
Mobile: +91 9425107325

State Bank of India

1. Mr. Rajeev Kumar (AGM SME CPC)  
Address: SBI LHO Hoshangabad Road Bhopal

Email: agmsmecpc.lhobho@sbi.co.in  
Mobile: 8889825554

2. Mr Shashank Kumar ( AGM AGRI BUSINESS UNIT)  
Address: SBI LHO Hoshangabad Road Bhopal

Email: agmagricpt@sbi.co.in  
Mobile: 9414077149





In witness thereof, the organizations have signed the present MoU in duplicate in the English language.

Signed




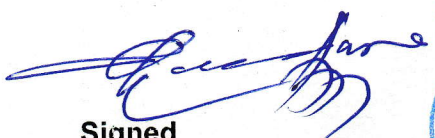
For State Bank of India (SBI)  
Shri Rama Chandra Mishra  
DGM SME, LHO Bhopal

Signed



For M.P. Urja Vikas Nigam Limited  
(MPUVNL) Head Office, Bhopal  
Shri Ajay Shukla  
Executive Engineer, MPUVNL, Bhopal

Signed



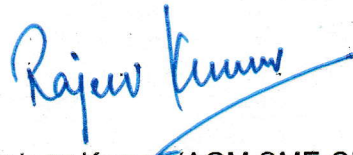
For State Bank of India (SBI)  
Shri Dharmnanda Banai  
DGM ABU, LHO Bhopal

Date: 21/11/2024

Place: Bhopal

Witness:

1. Sign



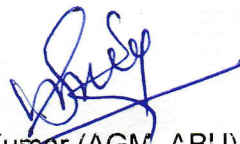
Shri Rajeev Kumar (AGM SME CPC)  
SBI LHO Hoshangabad Road Bhopal

1. Sign



Shri Umesh Kumar Lodhi  
MP Urja Vikas Nigam Limited, Bhopal

2. Sign



Shri Shashank Kumar (AGM, ABU)  
SBI LHO Hoshangabad Road Bhopal

2. Sign



Ms. Shalu Pasi  
MP Urja Vikas Nigam Limited, Bhopal

## ANNEXURE-I (FOR FARMERS )

### PM KUSUM COMPONENT 'A' UNDER AGRI SEGMENT:

SL No.	Parameter	Particulars
1.	Scheme	Pradhan Mantri Kisan Urja Suraksha Evam Utthan Mahabhiyan - (PM-KUSUM) Component-A
2.	Objective	The Scheme has been launched to achieve the GOI's ambitious target of 100 GW of Solar Power generation by 2022 and also to provide the farmers an opportunity to increase their income by utilizing their barren and uncultivable land for solar or other renewable energy based power plants.
3.	Target group/Eligibility	Individual farmers/ Group of farmers/ Cooperatives/ Panchayats/ Farmer Producer Organizations (FPO)/ Water User associations (WUA).
4.	Purpose	Financing solar or other renewable energy based power plants (REPP) of capacity 500 kW to 2 MW on Barren / uncultivable land backed by PPA (Power Purchase Agreement) with Distribution Companies (DISCOM).
5.	Activity	Installation of solar power or other Renewable Energy based Power Plants (REPP) on barren/fallow land, pasturelands and Marshlands or in stilt fashion on agriculture land owned by farmer. The entire parcel of land required for the project should be in the possession of the farmer/applicant. <b>Agricultural land is also permitted under the scheme provided that solar plants are installed in stilt fashion (i.e. raised structure for installation of Solar panels) and with adequate spacing between panel rows for ensuring that farming activity is not affected.</b> Diversion of land is not necessary in agri segment.
6.	Quantum of finance	Max. 70% of the project cost. Max. Ceiling – Rs.10 Cr.
7.	Moratorium Period	Maximum 12 months post COD.
8.	Pricing/Interest rate	Interest Rate to be based on CRA of the unit/borrower as per Circular No. CCO/CPDINT/123/2017-18 (SI.No.1418/2017-18) dated 01.03.2018 or further revisions thereof. - Interest would be charged at monthly intervals.
9.	Repayment	Maximum period of 15 years including moratorium period.
10.	Security	<b>Primary Security:</b> (i) Mortgage of Project Land and Building (except forest land). (ii) Hypothecation of Plant & Machinery (iii) Hypothecation of Receivables based on Tripartite Agreement with DISCOM and farmer backed by ESCROW arrangement under firm PPA. <b>Collateral Security:</b> (i) Assignment of PPA (ii) 100% cash margin for BG facility Personal Guarantees: Personal guarantee of the promoters to be obtained. <b>CGTMSE:</b> The borrower can avail the benefit of credit guarantee package (CGTMSE) by registering as MSME. In case, the borrower is availing the facility under CGTMSE, he has to comply with all the relevant guidelines.
11.	Debt Service Reserve Account (DSRA)	Equivalent to 3 months principal and interest (Minimum) in the form of FDR/TDR.
12.	Subsidy & Subvention	<b>The scheme is now covered under AIF as per guidelines issued by Department of Agriculture &amp; Farmers Welfare, Government of India in Sep-2024.</b>



13.	Power Purchase Agreement (PPA)	PPA with Long term off take arrangement of 25 years with a DISCOM and should be legally vetted by our law department/ empaneled advocate to safeguard the Bank's interest.
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**PM KUSUM COMPONENT 'B & C' UNDER AGRI SEGMENT:**

SL No.	Parameter	Particulars
1.	Scheme	MC-ATL PM KUSUM Component B & C.
2.	Purpose	Component "B": Individual farmers will be supported to install standalone solar Agriculture pumps of capacity up to 7.5 HP for replacement of existing diesel Agriculture pumps / irrigation systems in off grid areas, where grid supply is not available. Component "C": Individual farmers having grid connected agricultural pump will be supported to solarize pumps. Solar PV capacity up to two times of pump capacity in kW is allowed under this scheme. DISCOMs will purchase excess power from the farmer at the rate decided by the respective State / SERC.
3.	Target group/Eligibility	Farmers - Individuals/ Joint borrowers who are owner cultivators. Preference should be given to farmers using Micro irrigation systems or covered under Micro Irrigation Schemes or who opt for Micro irrigation systems.
4.	Margin	Farmer contribution: 10% of benchmark cost of pump set. (Margin money should be brought in upfront before disbursement).
5.	Activity	Pump set – Irrigation
6.	Quantum of finance	1. Minimum loan limit: Rs.25, 000/- 2. Maximum loan limit: Rs.10.00 Lakh.
7.	Moratorium Period	For Installation: Maximum 12 Months * For North Eastern States, Sikkim, J&K, HP, Uttarakhand, Lakshadweep and A & N Islands: Maximum 15 months
8.	Pricing/Interest rate	The rate of interest will be linked to 1-Year MCLR of the Bank (reset annually) + 350 bps, i.e., present effective rate of 12.15% p.a.
9.	Repayment	120 months including moratorium. Half-Yearly (HY) installments. Maximum of 120 months including moratorium
10.	Security Norms	(a). <u>Loan limit below Rs.1.60 lakhs</u> : Primary Security: Hypothecation of assets to be created out of bank finance. Collateral Security: NIL (b). <u>Loan limit above Rs.1.60 lakhs</u> : Primary Security: Hypothecation of assets to be created out of banks' finance. Collateral Security: Mortgage of land is waived for loan limits up to Rs. 3.00 lakhs in the States where banks have the facility of online creation of charge on the digital land records (e-circular Sl. No. NBG/ABU/PDM-KCC/8/2018-19 dated 27.06.2018). A printout of the lien/ charge, before and after creation of charge, as an evidence should be kept with the loan documents for the purpose of audit and record. Equitable Mortgage/ Registered Mortgage of agricultural land/ immovable property, the value of which is 100% of the loan amount.
12.	Subsidy	* Central Financial Assistance (CFA): 30% of the benchmark cost or the tender cost, whichever is lower of the stand-alone solar Agricultural pump. * State Government: 30% Farmer contribution: 10% Bank finance: 30% Subsidy for North Eastern States



		Assistance (CFA): 50% of the benchmark cost or the tender cost, whichever is lower of the stand-alone solar Agricultural pump. State Government: 30%; Farmer contribution: 10%; Bank finance: 10%. <b>The scheme is now covered under AIF as per guidelines issued by Department of Agriculture &amp; Farmers Welfare, Government of India in Sep-2024.</b>
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**PM KUSUM COMPONENT 'C' (FEEDER SOLARIZATION) UNDER AGRI SEGMENT:**

SL No.	Parameter	Particulars
1.	Scheme	Pradhan Mantri Kisan Urja Suraksha Evam Utthan Mahabhiyan - (PM-KUSUM) Component-A
2.	Objective	The Scheme has been launched to achieve the GOI's ambitious target of 100 GW of Solar Power generation by 2022 and also to provide the farmers an opportunity to increase their income by utilizing their barren and uncultivable land for solar or other renewable energy based power plants.
3.	Target group/Eligibility	Individual farmers/ Group of farmers/ Cooperatives/ Panchayats/ Farmer Producer Organizations (FPO)/ Water User associations (WUA).
4.	Purpose	Financing solar or other renewable energy based power plants (REPP) of capacity 500 kW to 2 MW on Barren / uncultivable land backed by PPA (Power Purchase Agreement) with Distribution Companies (DISCOM).
5.	Activity	Installation of solar power or other Renewable Energy based Power Plants (REPP) on barren/fallow land, pasturelands and Marshlands or in stilt fashion on agriculture land owned by farmer. The entire parcel of land required for the project should be in the possession of the farmer/applicant. <b>Agricultural land is also permitted under the scheme provided that solar plants are installed in stilt fashion (i.e. raised structure for installation of Solar panels) and with adequate spacing between panel rows for ensuring that farming activity is not affected.</b> Diversion of land is not necessary in agri segment.
6.	Quantum of finance	Max. 70% of the project cost. Max. Ceiling – Rs.10 Cr.
7.	Moratorium Period	Maximum 12 months post COD.
8.	Pricing/Interest rate	Interest Rate to be based on CRA of the unit/borrower as per Circular No. CCO/CPDINT/123/2017-18 (Sl.No.1418/2017-18) dated 01.03.2018 or further revisions thereof. - Interest would be charged at monthly intervals.
9.	Repayment	Maximum period of 15 years including moratorium period.
10.	Security	Primary Security: (i) Mortgage of Project Land and Building (except forest land). (ii) Hypothecation of Plant & Machinery (iii) Hypothecation of Receivables based on Tripartite Agreement with DISCOM and farmer backed by ESCROW arrangement under firm PPA. Collateral Security: (i) Assignment of PPA (ii) 100% cash margin for BG facility Personal Guarantees: Personal guarantee of the promoters to be obtained. CGTMSE: The borrower can avail the benefit of credit guarantee package (CGTMSE) by registering as MSME. In case, the borrower is availing the facility under CGTMSE, he has to comply with all the relevant guidelines.
11.	Debt Service Reserve	Equivalent to 3 months principal and interest (Minimum) in the form of FDR/TDR.

12.	Subsidy & Subvention	Subsidy proposed under the scheme.
13.	Power Purchase Agreement (PPA)	PPA with Long term off take arrangement of 25 years with a DISCOM and should be legally vetted by our law department/ empaneled advocate to safeguard the Bank's interest.

**Other suggestions:**

1. A piece of land on which project to be installed not to be **land-locked** and also the chain of title should be clear.
2. Source of margin must be ensured before the allotment of LOA.
3. Quantum of loan depends upon the projected cash flow generated by the plant that's why please advise the applicant to hire the experienced & well known EPC contractor for the installation of the project. Quality of solar plates, transformer, proper caballing of wires and Grid connectivity etc. play a vital role for the successful project.
4. After allotment of LOA, a detailed session/meeting should be conducted between the URJA Vibhag officials, applicant and bank officials.

*DL* *ms*



# ANNEXURE-II ( FOR DEVELOPERS )

SNO	DOCUMENT REQUIRED FROM DEVELOPER	Details
1	KYC	<ul style="list-style-type: none"> <li>- PAN/Aadhar/Passport of Promoter/ Director/Guarantor/ Partner</li> <li>- AOA/MOA/Certificate of Incorporation (In Case of Company)</li> <li>- Partnership Deed/Registration with Registrar of Firms (In Case of Partnership Firm)</li> <li>- Udyam Registration Number</li> <li>- Legal Entity Identifier ( LEI)</li> </ul>
2	Detailed Project Report	<ul style="list-style-type: none"> <li>- Cost of Project</li> <li>- Supplier Details</li> <li>- Quotations</li> <li>- Source of funds (Equity/USL)</li> <li>- Power Purchase Agreement (PPA)</li> <li>- Letter of Award issued by M.P. Urja Vikas Nigam Limited</li> </ul>
3	Provisions to be included in PPA	<ul style="list-style-type: none"> <li>- Must Run Status - The power generated shall be evacuated to the maximum extent subject to Grid stability (Must Run) and shall not be subjected to merit order dispatch principles</li> <li>- Assignment - The agreement shall not be assigned by any party except to the financing parties under financing documents or by mutual consent between the parties to be evidenced in writing.</li> <li>- Designated Bank Account with SBI- The payment of revenue towards sale of power by developer may be deposited or paid in the designated bank account with SBI</li> <li>- Payment Security – The procurer shall open revolving LC equivalent to one month's billing in favour of developer, which shall be renewed annually.</li> <li>- Force Majeure Clause –The developer is relieved of its obligations in case of Force Majeure covering the events beyond the control of developer as listed in PPA</li> <li>- Change in Law or Taxes – The developer shall be able to pass on the escalation in rates of Taxes and Duties, etc. to offtaker.</li> <li>- Generation Compensation for offtake constraints – provision for generation compensation due to transmission infrastructure not complete / grid unavailability and Backdown by DISCOMs should be clearly spelt out</li> </ul>
4	Land	<ul style="list-style-type: none"> <li>- If leased, then must contain mortgageable clause.</li> <li>- Accessible/Demarcated /Marketable</li> </ul>
5	Approval and Clearance (Indicative)	<ul style="list-style-type: none"> <li>- Environmental Clearances- Environmental and Forest clearances to be in place wherever applicable.</li> <li>- Project approval from State Agency for setting up the plant.</li> <li>- NOC from Pollution Control Board</li> <li>- Grid Connectivity Agreement with the authority concerned.</li> <li>- Approval from DISCOM/State Electricity Board, as the case may be.</li> </ul>
6	Operation and Maintenance (O & M)	<ul style="list-style-type: none"> <li>- Details of operation and management of the project after implementation.</li> </ul>

Parameter	Benchmark
Debt/Equity	70:30
Equity	50 % Upfront
Average Gross DSCR	1.20
Sensitivity analysis	<p>Average Gross DSCR should not be below 1.10 with following changes:</p> <ul style="list-style-type: none"> <li>- Decrease in tariff by 5%</li> <li>- Decrease in Plant Load Factor (PLF)/ Generation by 10%</li> <li>- Increase in O&amp;M cost by 10%</li> <li>- Increase in interest rate by 2%</li> </ul>
FACR	<ul style="list-style-type: none"> <li>- FACR: 1.10 (minimum) throughout the tenure of the loan.</li> </ul>
Interest Coverage Ratio	-1.50 (minimum)
Net Debt (Long Term Debt)/ EBITDA (Max)	<ul style="list-style-type: none"> <li>- 6.2:1 for initial 3 years.</li> <li>- Below 6 from 4th year onwards Long-term debt is Project Debt provided by Banks / FIs only</li> </ul>
Loan Tenor (Max)	<ul style="list-style-type: none"> <li>- Door to Door tenor up to 20 years or Construction period plus 80% of PPA tenure from COD, whichever is lower.</li> </ul>
Moratorium	<ul style="list-style-type: none"> <li>- Maximum 12 months post Date of Commencement of Commercial operation (DCCO).</li> </ul>
Generation Estimates	<ul style="list-style-type: none"> <li>- Generation Estimate should be at P 90 level only.</li> <li>- DSCR should be calculated on a P 90 estimate of generation level subject to other parameters of the proposal being met.</li> </ul>
Primary Security	<ul style="list-style-type: none"> <li>- Equitable Mortgage of Project Land and Building- except forest land <b><u>(In respect of Primary Security Registered mortgage of Lease Hold rights can be obtained wherever EM/RM is not possible).</u></b></li> <li>- Hypothecation of Plant &amp; Machinery</li> <li>- Hypothecation of Receivables</li> </ul>
Collateral Security	<ul style="list-style-type: none"> <li>- Collateral security may be required on a case-to-case basis where it is felt necessary as a risk mitigant and/or where it is forthcoming. (Collateral security results in better internal rating which is linked with improved pricing)</li> <li>- Pledge of 51 % (minimum) of Promoter's Shares in SPV</li> </ul>



				<ul style="list-style-type: none"> <li>- First Charge on Escrow Account.</li> </ul>
			Guarantee	<ul style="list-style-type: none"> <li>- Personal guarantee of the promoters and Guarantors will be obtained.</li> </ul>
			Technical Parameters	<ul style="list-style-type: none"> <li>- Project should comply with technical specification, standards and certifications, including amendments or addition in future by MNRE</li> </ul>
			Debt Service Reserve Account (DSRA)	<ul style="list-style-type: none"> <li>- Provision for DSRA Equivalent to ensuing 3 month's Principal and Interest (Minimum) to be made in the form of FDR/TDR.</li> </ul>
8	Pricing		<p>ECRA/CRA based, with 10 bps concession on account of RE across the board, in case offered at Card Rate, subject to effective rate of interest not going below the MCLR. Additional incentive may be offered on completion of project as per schedule/declared DCCO, with the approval of the competent authority. All term loans are subject to annual review based on the audited financials. Wherever rating has deteriorated, interest rates would be reset, and spread shall be charged as per the current rating, with effect from the date of the audited financials</p>	
9	External Credit Rating(ECR)		<ul style="list-style-type: none"> <li>- Applicable where total banking exposure is Rs 50.00 Crore and above.</li> </ul>	







# Specifications for Remote Monitoring System- PM KUSUM Component A, C

## Disclaimer

- This report has been prepared on the basis set out in KPMG's contract for 'Service Provider for Supporting Structural Reforms in the Indian Power Sector' with the Secretary of State for International Development at the Department for International Development ("the Client").
- Nothing in this report constitutes a valuation or legal advice.
- KPMG has not verified the reliability or accuracy of any information obtained in the course of its work, other than in the limited circumstances set out in the Services Contract.
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## Specifications for Remote Monitoring System – Grid Connected Solar Pumps

1. State Implementing Agency (SIA) will have a common SWPS (Solar Water Pumping System) Management platform for monitoring of operation and performance of SWPS installed under PM KUSUM Scheme.
2. Remote Monitoring System (RMS) of SWPS should have following minimum features or modules
  - a. Solar System Performance: DC Voltage, DC current, AC output Current, Power, Energy, Inverter Status, Drive Frequency etc.
  - b. Pump Performance and Protections: Parameters such as Running Hours, Water Discharge (Output), Voltage, Current, Power, Energy of pump as well as protections required for “On Grid Systems” such as Over Voltage, Under Voltage, Voltage Un Balance, Overload, Short Circuit, Earth Leakage protection etc.
  - c. Net Metering:
    - i. As per CEA guidelines, on grid solar plant will require minimum Two energy meters mainly:
      - Bi-Directional Grid Interface Meter
      - Solar Generation Audit Meter.
    - ii. Remote Monitoring System should have provision to integrate both energy meters on DLMS communication protocol on RS232 ports
    - iii. Important electrical parameters of Bi-Directional Grid Interface Meter such as Imported Energy, Exported Energy, Net Energy, Solar Generation Energy, Voltage, Power (Import or Export)
    - iv. Important electrical parameters of Solar Generation such as Voltage, Current, PF, Power, Energy etc.
  - d. Billing Data Management: Remote Monitoring System should provide Billing parameters from Bi-Directional Grid Interface meter required by DISCOMS
  - e. RMS Performance: %Device Connectivity, %Data Availability etc.
  - f. Events and Notifications: Faults related to Pump Operation, Solar generation, inverter fault, Controller/Drive faults like overload, dry run, short circuit etc.
  - g. Consumer Management: Name, Agriculture details, Service No, Contact Details etc.
  - h. Asset Management: Ratings, Serial Number, Make, Model Number of Pump, Panel and Controller, IMEI number (of communication module) and ICCID (of SIM) etc.
  - i. Complaint and Ticket Management
  - j. Consumer Mobile Application: Generation, Running Hours, Water Discharge, Complaint logging, etc.
3. Remote Monitoring System (RMS) provided by all bidders should connect to State Level Solar Energy Data Management platform, which will have interface with National level Solar Energy Data Management platform.
4. Communication Architecture between SWPS and RMS should be as per following:
  - a. **Communication Connectivity:**
    - i. **Field Device Connectivity:** Communication between RMS and Pump Controller / Inverter should be on RS485 MODBUS RTU protocol to ensure interoperability irrespective of make and manufacturer
    - ii. **Remote Connectivity:** RMS of SWPS should be using GSM/GPRS/2G/3G/4G cellular connectivity

- iii. **Local Connectivity:** Ethernet/Bluetooth/Wi-Fi connectivity to configure parameters, notifications, communication interval, set points etc. or to retrieve locally stored data
- iv. **Sensor Connectivity:** RMS should have provision for at least four Analog inputs with 0.1% accuracy to address the requirement of local sensors connectivity if required by SIA/Consumer for applications such as irradiation, flow meter for water discharge, moisture sensor for micro irrigation etc. and four digital inputs.
- v. RMS should have provision of relay or contactors of suitable ratings for remote pump operations with multiple modes such as farmer mobile app based operations / configurable schedule based operations / sensor based operations
- b. **Communication Modes:**
  - i. Push Data on Event/Notification: such as pump on, pump off, protection operated etc.
  - ii. Push Data Periodically: important parameters of solar pump (as mentioned in tender) should be pushed to central server on configurable interval. Interval should be configurable in multiple of 1 minute.
  - iii. Command On Demand: It should be possible to send commands via GSM or GPRS to RMS either to control pump operations or to update configuration
- c. **Communication Protocol:**
  - i. RMS should provide data on MQTT Protocol to establish communication with thousands of systems.
- d. **Security:**
  - i. Communication between RMS and Server should be secured and encrypted using TLS/SSL/X.509 certificate etc.
  - ii. As a part of IoT protocol, Authentication and Authorization should be implemented using token/password mechanism
- e. **Message Format:**
  - i. RMS should provide data in a JSON message format as required by respective SNA
- f. **Data Storage:**
  - i. In case of unavailability of cellular network, RMS should store data locally and on availability of network it should push data to central server. Local data storage should be possible for at least one year in case of unavailability of cellular network.
- g. **Configuration Update Over-The-Air:** Configuration update over the air of multiple parameters such as IP, APN, Data Logging Interval, Set Points etc. is essential.

5. EMI/EMC Certifications:

1	Surge Immunity Test (IEC 61000-4-5)	A
2	Electrical Fast Transient (IEC 61000-4-4)	A
3	Electrostatic Discharge (IEC 61000-4-2)	A
4	Radiated Electromagnetic Field Test (IEC 61000-4-3)	A

<b>5</b>	Power Frequency Magnetic Field (IEC 61000-4-8)	A
<b>6</b>	Conducted Disturbances induced by radio frequency (IEC 61000-4-6)	A
<b>7</b>	Voltage Dips, short interruptions (IEC 61000-4-11)	A
<b>8</b>	Dry Heat test (IEC 60068-2-2), continuous operations @ 55 deg. C	O
<b>9</b>	Damped Heat Test (IEC 60068-2-78), @ 95% RH and 40 deg. C	O

Note: Passing Criteria

A: Temporary degradation or loss of function or performance which is self-recoverable

O: Normal performance within the specified limits

## Specifications for Remote Monitoring System – Decentralised Grid Connected Solar Plants

1. State Implementing Agency (SIA) will have a common SWPS (Solar Water Pumping System) Management platform for monitoring of operation and performance of SWPS and decentralised solar plants installed under PM KUSUM Scheme.
2. Remote Monitoring System (RMS) of SWPS should have following minimum features or modules
  - a. Solar System Performance: DC Voltage, DC current, AC output Current, Power, Energy, Status of Inverter & String Combiner Box etc.
  - b. Net Metering:
    - i. As per CEA guidelines, grid connected solar plant will require minimum Two energy meters mainly:
      - Bi-Directional Grid Interface Meter
      - Solar Generation Audit Meter.
    - ii. Remote Monitoring System should have provision to integrate both energy meters on DLMS communication protocol on RS232 ports
    - iii. Important electrical parameters of Bi-Directional Grid Interface Meter such as Imported Energy, Exported Energy, Net Energy, Solar Generation Energy, Voltage, Power (Import or Export)
    - iv. Important electrical parameters of Solar Generation such as Voltage, Current, PF, Power, Energy etc.
  - c. Billing Data Management: Remote Monitoring System should provide Billing parameters from Bi-Directional Grid Interface meter required by DISCOMS
  - d. RMS Performance: %Device Connectivity, %Data Availability etc.
  - e. Events and Notifications: Faults related to solar generation, inverter fault/alarms, Breaker status change such as on/off/trip etc.
  - f. Asset Management: Ratings, Serial Number, Make, Model Number of Inverter, String combiner Box, IMEI number (of communication module) and ICCID (of SIM) etc.
  - g. Complaint and Ticket Management
3. Remote Monitoring System (RMS) provided by all bidders should connect to State Level Solar Energy Data Management platform, which will have interface with National level Solar Energy Data Management platform.
4. Communication Architecture between SWPS and RMS should be as per following:
  - a. **Communication Connectivity:**
    - i. **Field Device Connectivity:** Communication between RMS and Inverter / String Combiner Box should be on RS485 MODBUS RTU protocol to ensure interoperability irrespective of make and manufacturer
    - ii. **Remote Connectivity:** RMS of SWPS should be using GSM/GPRS/2G/3G/4G cellular connectivity
    - iii. **Local Connectivity:** Ethernet/Bluetooth/Wi-Fi connectivity to configure parameters, notifications, communication interval, set points etc. or to retrieve locally stored data
    - iv. **Sensor Connectivity:** RMS should have provision for at least four Analog inputs with 0.1% accuracy for applications such as breaker & transformer health etc. and four digital inputs for breaker status
  - b. **Communication Modes:**
    - i. Push Data on Event/Notification: Faults related to solar generation, inverter fault/alarms, Breaker status change



- ii. Push Data Periodically: important parameters of inverter, string combiner box and energy meter should be pushed to central server on configurable interval. Interval should be configurable in multiple of 1 minute.
  - iii. Command On Demand: It should be possible to send commands via GSM or GPRS to RMS either to update configuration
- c. **Communication Protocol:**
  - i. RMS should provide data on MQTT Protocol to establish communication with thousands of systems.
- d. **Security:**
  - i. Communication between RMS and Server should be secured and encrypted using TLS/SSL/X.509 certificate etc.
  - ii. As a part of IoT protocol, Authentication and Authorization should be implemented using token/password mechanism
- e. **Message Format:**
  - i. RMS should provide data in a JSON message format as required by respective SNA
- f. **Data Storage:**
  - i. In case of unavailability of cellular network, RMS should store data locally and on availability of network it should push data to central server. Local data storage should be possible for at least one year in case of unavailability of cellular network.
- g. **Configuration Update Over-The-Air:** Configuration update over the air of multiple parameters such as IP, APN, Data Logging Interval, Set Points etc. is essential.

5. EMI/EMC Certifications:

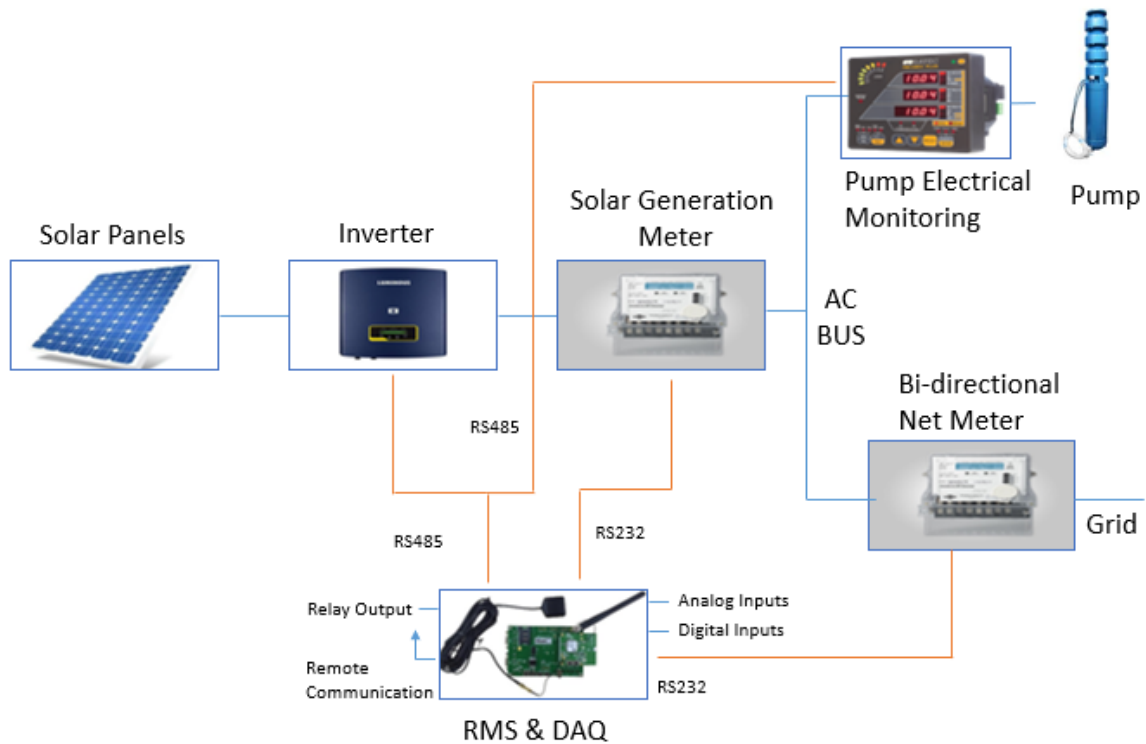
1	Surge Immunity Test (IEC 61000-4-5)	A
2	Electrical Fast Transient (IEC 61000-4-4)	A
3	Electrostatic Discharge (IEC 61000-4-2)	A
4	Radiated Electromagnetic Field Test (IEC 61000-4-3)	A
5	Power Frequency Magnetic Field (IEC 61000-4-8)	A
6	Conducted Disturbances induced by radio frequency (IEC 61000-4-6)	A
7	Voltage Dips, short interruptions (IEC 61000-4-11)	A
8	Dry Heat test (IEC 60068-2-2), continuous operations @ 55 deg. C	O
9	Damped Heat Test (IEC 60068-2-78), @ 95% RH and 40 deg. C	O

Note: Passing Criteria

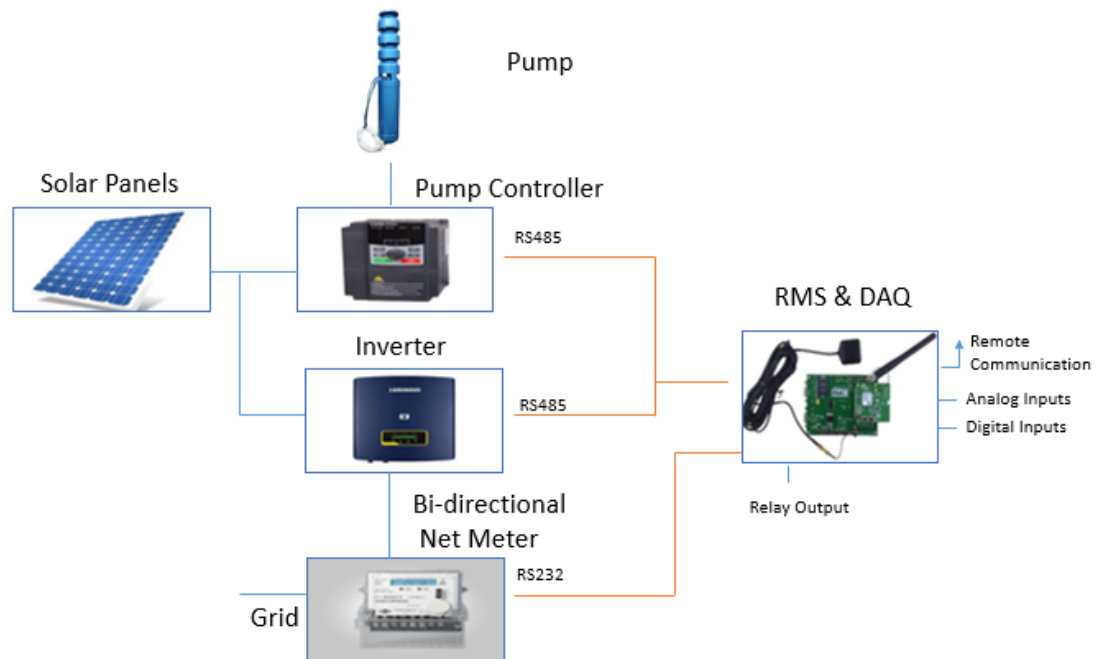
A: Temporary degradation or loss of function or performance which is self-recoverable

O: Normal performance within the specified limits

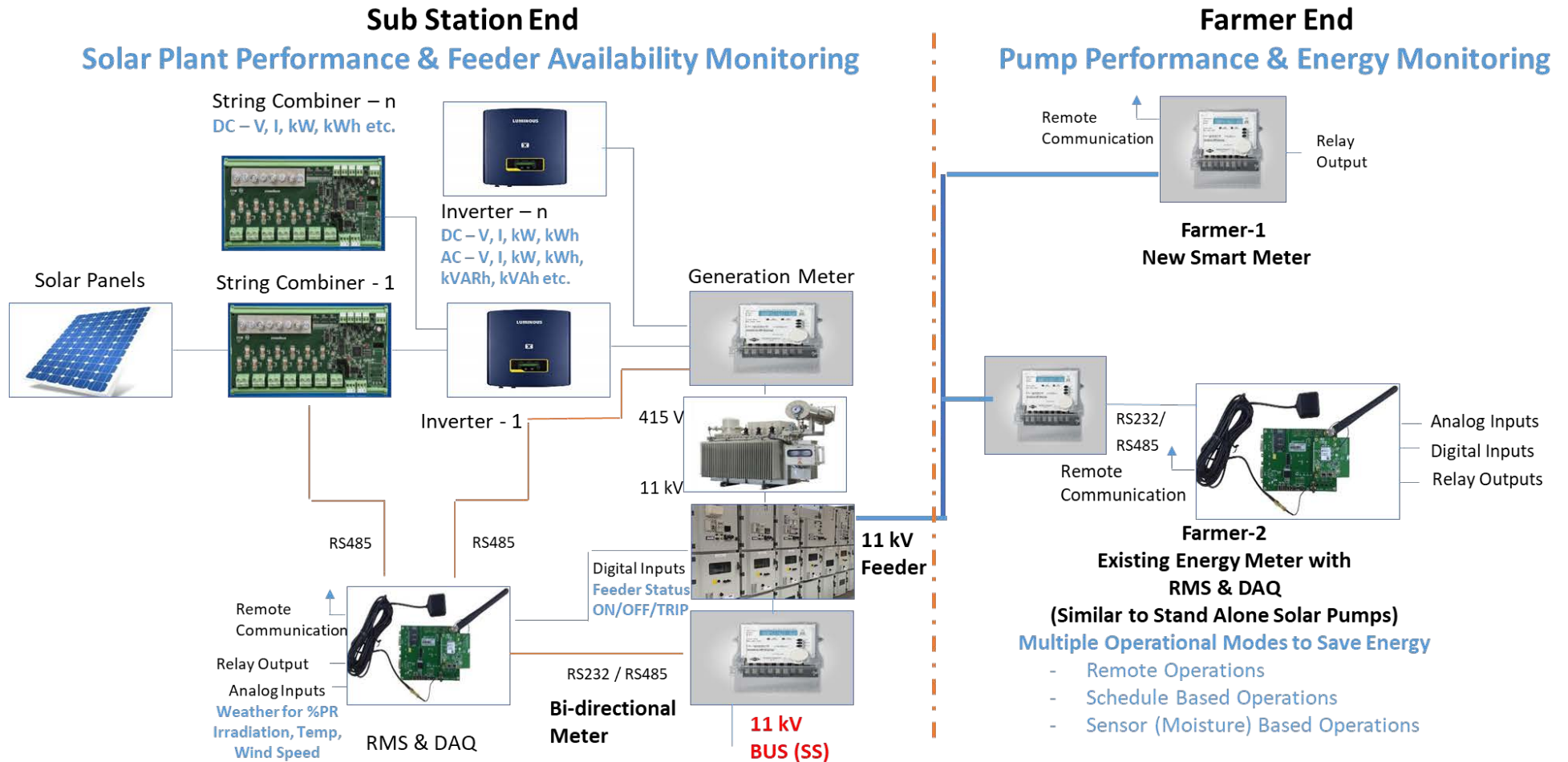
## System Components and Architecture: PM KUSUM Component C: Option 1 (Net Metering)



## System Components and Architecture: PM KUSUM Component C: Option 2 (Pump to run on solar power only)



## System Components and Architecture: PM KUSUM Component C or A: Option 3 (Solarisation of agricultural feeder at sub-station level)





# **RMS Communication and Security Architecture- PM KUSUM SEDM Platform**

Date: 14/07/2020

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2. RMS Registration .....	3
3. MQTT Topic Structure .....	3
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5. Communication Protocols.....	4
6. MQTT Message Structure .....	5

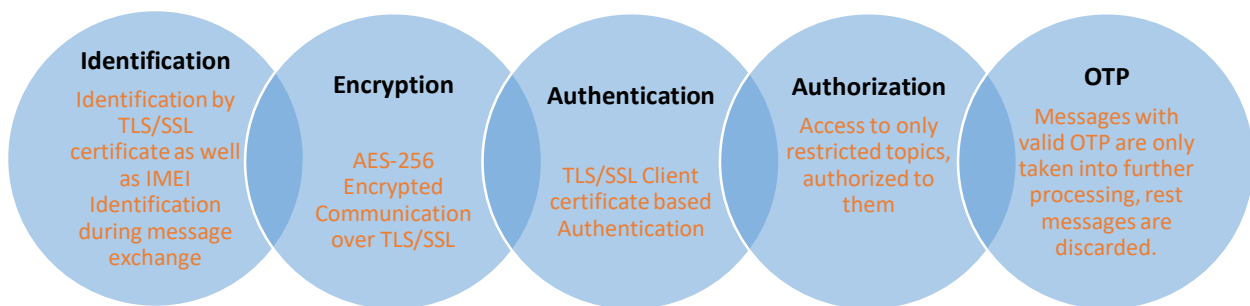
## RMS Communication & Security Architecture

1. Security Architecture (with reference to EESL Tender Annexure 8 – clause 4.d)
2. RMS Registration (with reference to EESL Tender Annexure 8 – clause 4.d)
3. MQTT Topic Structure (with reference to EESL Tender Annexure 8 – clause 4.b,4.c)
4. MQTT Message Structure (with reference to EESL Tender Annexure 8 – clause 4.e,4.f)
5. Annexure: JSON Formats with parameter keywords, sample values and description
  - a. Annexure: Pump Controller
  - b. Annexure: Energy Meter
  - c. Annexure: Inverter
  - d. Annexure: String Combiner Box (SJB)
  - e. Annexure: Heartbeat
  - f. Annexure: DAQ

### 1. Security Architecture

This section highlights the communication security architecture between RMS/DCU and State SWPS IoT Platform. With this security, architecture, third parties are unable to intercept or “sniff” the encrypted data. This stops ISPs, employers, local network administrators and cybercriminals from being able to perform “packet sniffing” to access what the traffic contains. It also protects against man in the middle (MitM) attacks. This implements Private TLS/SSL VPN to ensure highest level of security.

In additional to this, use of OTP in every message exchange shall help restrict spammers and Bots. Such OTP based mechanism will provide transaction level security which is required for remote operations.





## 2. RMS Registration

This section details how individual RMS/DCU shall be registered and communicate securely with State SWPS IoT Platform.

- Every supplier/vendor must Register all unique IMEI (International Mobile Equipment Identity) of RMS/DCU with State SWPS
- State SWPS will generate individual client certificate for RMS/DCU against unique IMEI registered and share with supplier/vendor through secured web API interface.
- Every supplier/vendor shall be able to access web API with unique credentials shared with them.
- Web API shall return individual client certificate, Device Broker url and “info” topic.
- After installation of client certificate relevant to IMEI of RMS/DCU, RMS/DCU will connect to Device Broker and get authenticated using client certificate and further shall be able to receive additional configuration details such as FTP credential, Message Topic structure etc. after subscribing to default topic.
- After client certificate expiry, RMS will connect to FTP using available credentials and download the renewed certificate

## 3. MQTT Topic Structure

This section defines the different topic structure for communication between RMS/DCU and State SWPS through Device Broker.

RMS/DCU will publish and subscribe to their respective topics only, authorization of topic shall be done against unique credentials.

Application Version	Solution	IMEI	Message Type	Publish/Subscribe
IIOT-1	Standalonesolarpump	{IMEI}	Info	Subscribe
	Gridconnectedsolarpump		OTP	Subscribe
	SolarMW		Heartbeat	Publish
	Ongridrooftop		Data	Publish
	Offgridrooftop		Ondemand	Subscribe
			Config	Subscribe

Sample Topic structure for Stand-alone Solar Pump shall be: **IIOT-1/Standalonesolarpump/{IMEI}/info**

**Multiple sub-topics will be formed for communication between RMS/DCU and sate SWPS IoT Platform**

- **Info:** Default Topic To exchange RMS/DCU configuration details
- **OTP:** To exchange OTP at every interval of 15/30/60 minutes
- **Heartbeat:** To update RMS/DCU health indicators at frequent configurable intervals.
- **Data:** To exchange data related to RMS/DCU Monitoring parameters in “**push mode**”
  - Push data Periodically
  - Push data on Event/Notification
  - History Missing Data Push Mode: History data will be identified against “**index**”

- **Ondemand:** To exchange data between RMS/DCU and Server in “**Command on Demand**” Mode
  - Each “On Demand” message will have two transactions: Commands, Response.
  - On demand command and response will be tracked against a common “**MSGID**”.
  - On demand message can be used to read and write with two command types
    - Command: “**Read**” - In json received from server replace each key with value from RMS/DCU and send the updated json back to server.
    - Command: “**Write**” - After executing the command based on key-value pair received in json, send the updated json back to server on successful execution.
    - Note: handshaking parameters such as msgid, etc has to send back to server as is, without modification
- **Config:** To update configurable parameters of Device, which is similar to Ondemand but will be used only for configurable parameters of Device, this implements “**Configuration over the air**”
  - Command: “**Read**” - In json received from server replace each key with value from RMS/DCU and send the updated json back to server.
  - Command: “**Write**” - After executing the command based on key-value pair received in json, send the updated json back to server on successful execution.
  - Note: handshaking parameters such as msgid, etc has to send back to server as is, without modification

#### 4. Communication Modes

- **Push on Periodic Interval:** In this mode deployed RMS shall transmit data of Multiple devices and sensors on different configurable time intervals such as Inverter or pump controller data at every 5 minutes, Energy Meter data at every 15 minutes, String Combiner Box data at every 10 minutes
- **Push on Event:** RMS shall detect various configurable alarm or event conditions such as Pump On / Off Status, Inverter On/Off Status, Low Water Flow Rate, Fault or Trip status etc. and It shall transmit data immediately to the server
- **On Demand Read:** In this mode, User will send command to RMS to get data as and when required and RMS will send the required data to server immediately
- **On Demand Write:** In case of Remote Operations, Farmer / Consumer shall send On Demand Write Command to the RMS and RMS will send back the acknowledgement with change in parameters after operation is completed
- **Configuration read/write:** Using this mode, user will be able to read and change configurable parameters remotely such as updating periodic interval, alarm limits, server parameters etc.

#### 5. Communication Protocols

- **Field Device Communication:** RMS to Field Devices communication such as Inverter, Pump Controller, Drive, String Combiner box, MFT/MFM, Data Acquisition System shall be established using **MODBUS RTU protocol** supported by all leading manufacturers globally

- **Energy Meter Communication:** RMS to Energy Meter communication such as Bi Directional (Revenue) Meter, Solar Generation (Audit) Meter shall be established using **DLMS/Modbus protocol** supported by all leading Meter Manufacturers in India
- **RMS to Server Communication - Industrial IoT MQTT Protocol:** RMS to Server Communication shall be established using MQTT protocol which is well accepted IoT protocol across the globe and supported by all leading IT as well as OT companies for Smart Grid, Smart RE and Smart City Applications

## 6. MQTT Message Structure

This section details message structure exchanged between RMS/DCU and state SWPS IoT Platform through Device Broker

keyword	Description	Sample Value
<b>IMEI</b>	Unique Identification of RMS/DCU – required to ensure registered source of data	863287049443888
<b>VD</b>	Virtual device/group – required for grouping parameters based on update interval/subsystems such as inverter/pump controller/meter/string combiner box etc.	2
<b>MSGID</b>	Message Transaction Id - required for “Ondemand”/”Config” message type, request/response/acknowledgement/feedback	123456789
<b>COMMAND</b>	Read/Write - Applicable only in case of “Ondemand”/”Config” message Type	Read
<b>TIMESTAMP</b>	RTC timestamp of RMS/DCU against all parameters of vd/group (YYYY-MM-DD HH:mm:ss)	2019-08-20 20:15:08
<b>STINTERVAL</b>	Periodic interval at which RMS shall store and transmit data to server. (in minutes)	15
<b>DATE</b>	local storage date – required as a reference to fetch data from local storage (YYYY-MM-DD)	2020-06-15
<b>INDEX</b>	Local storage Index – required as a reference to fetch data from local storage	5
<b>MAXINDEX</b>	Local storage maximum index of local storage date – required to calculate missing index	96
<b>LOAD</b>	Local storage retrieval command & status	0
<b>POTP</b>	Previous One Time Password	12345678
<b>COTP</b>	Current One Time Password, State SWPS Broker will update OTP at interval of 30/60 minutes	12345678
<b>Parameter-1 Parameter-2 Parameter-3 Parameter-1 ..... Parameter-n</b>	Equipment wise Keywords for multiple Parameters.	

## Communication Format Annexure

### Annexure – 1 (Revision-B) Pump Controller

Message Name	: Periodic Push Pump Controller (1)
Message Format	: JSON
Message Type	: Data
Message Command Flow	: Not Applicable for Data periodic Push
Message response Flow	: RMS -> State SWPS IoT Platform
Message Medium	: GPRS

#### Command Message

<b>Not Applicable</b>	

#### Response Message

Message	Description	Unit												
{														
"VD":1	Virtual Device Index/Group	-												
"TIMESTAMP":"2020-05-18 17:58:00",	RTC timestamp of RMS/DCU against all parameters of vd/group	-												
"MAXINDEX":96	maximum index of local storage date	-												
"INDEX":7,	reference of local storage	-												
"LOAD":0,	Local storage retrieval command & status	-												
"STINTERVAL":15,	Periodic interval at which RMS shall store and transmit data to server. (in minutes)	-												
"MSGID": "",	Message Transaction Id - required for "Ondemand"/"Config" message type, request/response/acknowledgement/feedback	-												
"DATE":200518,	local storage date	YYMMDD												
"IMEI":"1234561234561234",	IMEI No. of First Sim to be considered always for unique identity of DCU	-												
"ASN_11":"34123450",	<div><b>Pump Controller Serial No.</b><table><tr><td>RMS</td><td>0</td></tr><tr><td>DAQ</td><td>1-9</td></tr><tr><td>Pump Controller</td><td>11-19</td></tr><tr><td>Meter</td><td>21-29</td></tr><tr><td>Inverter</td><td>31-39</td></tr><tr><td>String Combiner Box</td><td>41-49</td></tr></table></div>	RMS	0	DAQ	1-9	Pump Controller	11-19	Meter	21-29	Inverter	31-39	String Combiner Box	41-49	-
RMS	0													
DAQ	1-9													
Pump Controller	11-19													
Meter	21-29													
Inverter	31-39													
String Combiner Box	41-49													
"POTP":"341234",	<b>Previous One Time Password</b>	-												
"COTP":"341234",	<b>Current One Time Password</b>	-												
"PMAXFREQ1":"50.00",	<b>Maximum Frequency</b>	Hz												

"PFREQLSP1": "50.00",		Lower Limit Frequency	Hz
"PFREQHSP1": "50.00",		Upper Limit Frequency	Hz
"PCNTRMODE1": "1",		Solar Pump Controller Control Mode Status	-
0	Variable Frequency Control Mode		
1	CVT Mode for Solar		
2	MPPT mode for Solar		
"PRUNST1": "2",		Solar Pump Controller Run Status	-
0	Stop		
1	Running		
2	Sleep		
3	Low Speed Protection		
4	Dry Run Protection		
5	Over Current Protection		
6	Minimum Power Protection		
"PREFFREQ1": "50.00",		Solar Pump Controller Reference Frequency	Hz
"POPFREQ1": "50.00",		Solar Pump Controller Output Frequency	Hz
"POPI1": "20.00",		Output Current	A
"POPV1": "230.00",		Output Voltage	V
"POPKW1": "45.00",		Output Active Power	KW
"PDC1V1": "550.00",		DC Input Voltage	DC V
"PDC1I1": "50.00",		DC Current	DC I
"PDCVOC1": "650.00",		DC Open Circuit Voltage	DC V
"PDKWH1": "35.00",		Today Generated Energy	KWH
"PTOTKWH1": "120.00",		Cumulative Generated Energy	KWH
"POPFLW1": "2.00",		Flow Speed	LPM
"POPDWD1": "120.00",		Daily Water Discharge	Litres
"POPTOTWD1": "220.00",		Total Water Discharge	Litres
"PMAXDCV1": "750.00",		Max DC Voltage	DC V
"PMAXDCI1": "40.00",		Max DC Current	DC I
"PMAXKW1": "650.00",		Max Output Active Power	DC KW
"PMAXFLW1": "650.00",		Max Flow Speed	LPM
"PDHR1": "8.00",		Pump Day Run Hours	Hrs
"PTOTHR1": "8.00",		Pump Cumulative Run Hours	Hrs
}			

Reaction	
Not Applicable	

## Communication Format Annexure

### Annexure - 2 Energy Meter

Message Name	: Periodic Push Meter (1)
Message Format	: JSON
Message Type	: Data
Message Command Flow	: Not Applicable for Data periodic Push
Message response Flow	: RMS -> State SWPS IoT Platform
Message Medium	: GPRS

#### Command Message

<b>Not Applicable</b>	

#### Response Message

Message	Description
{	
"VD":2	Virtual Device Index/Group
"TIMESTAMP":"2020-05-18 17:58:00",	RTC timestamp of RMS/DCU against all parameters of vd/group
"MAXINDEX":96	maximum index of local storage date
"INDEX":7,	reference of local storage
"LOAD":0,	Local storage retrieval command & status
"STINTERVAL":15,	Periodic interval at which RMS shall store and transmit data to server. (in minutes)
"MSGID": "",	Message Transaction Id - required for "Ondemand"/"Config" message type, request/response/acknowledgement/feedback
"DATE":200518,	local storage date

"IMEI": "1234561234561234",	IMEI No. of First Sim to be considered always for unique identity of DCU												
"ASN_21": 12345678,	Asset Serial Number <table border="1"> <tr> <td>RMS</td><td>0</td></tr> <tr> <td>DAQ</td><td>1-9</td></tr> <tr> <td>Pump Controller</td><td>11-19</td></tr> <tr> <td>Meter</td><td>21-29</td></tr> <tr> <td>Inverter</td><td>31-39</td></tr> <tr> <td>String Combiner Box</td><td>41-49</td></tr> </table>	RMS	0	DAQ	1-9	Pump Controller	11-19	Meter	21-29	Inverter	31-39	String Combiner Box	41-49
RMS	0												
DAQ	1-9												
Pump Controller	11-19												
Meter	21-29												
Inverter	31-39												
String Combiner Box	41-49												
"MTDET1": 30012302,	Meter Detail												
"POTP": "34123450",	<b>Previous One Time Password</b>												
"COTP": "34123450",	<b>Current One Time Password</b>												
"MTBLDATE1": 18,	Billing Date for meter 1												
"DATE1": 180606,	Present date for meter1												
"TIME1": 105400,	Present time for meter1												
"IR1": 20.58,	R Phase Current in Amps												
"IY1": 20.65,	Y Phase Current in Amps												
"IB1": 20.12,	B Phase Current in Amps												
"VRN1": 240.12,	R Phase to Neutral Voltage in Volts												
"VYN1": 242.13,	Y Phase to Neutral Voltage in Volts												
"VBN1": 243.55,	B Phase to Neutral Voltage in Volts												
"VRY1": 420.18,	Phase to Phase Voltage(R-Y) in Volts												
"VYB1": 419.38,	Phase to Phase Voltage(Y-B) in Volts												
"VBR1": 421.5,	Phase to Phase Voltage(B-R) in Volts												
"PFR1": 0.98,	R Phase Power Factor												
"PFY1": 0.97,	Y Phase Power Factor												
"PFB1": 0.96,	B Phase Power Factor												
"FRQ1": 50.05,	Grid Frequency												
"POWR1": 42.578,	R Phase Active Power in KW												
"POWY1": 42.156,	Y Phase Active Power in KW												
"POWB1": 42.354,	B Phase Active Power in KW												
"POW1": 42.185,	Total Active Power in KW												
"RPOWR1": 22.123,	R Phase Reactive Power in KVAR												
"RPOWY1": 20.110,	Y Phase Reactive Power in KVAR												
"RPOWB1": 22.310,	B Phase Reactive Power in KVAR												
"RPOW1": 65.610,	Total Reactive Power in KVAR												
"APOWR1": 55.610,	R Phase Apparent Power in KVA												
"APOWY1": 52.910,	Y Phase Apparent Power in KVA												
"APOWB1": 53.911,	B Phase Apparent Power in KVA												
"APOW1": 14.198,	Total Apparent Power in KVA												
"KWHNET1": 98561.4,	Cumulative Net Energy in KWH												
"KWHIMP1": 98561.4,	Cumulative Import Energy in KWH												
"KWHEXP1": 98561.2,	Cumulative Export Energy in KWH												
"KVAHNET1": 99100.3,	Cumulative Net Energy in KVAH												
"KVAHIMP1": 99105.1,	Cumulative Import Energy in KWH												
"KVAHEXP1": 98999.1,	Cumulative Export Energy in KWH												
"MDKWIMP1": 100.3,	Rising Demand (Import) in KW												
"MDKWEXP1": 98.6,	Rising Demand (Export) in KW												

"POFF1":1020,	Grid Power Failure in Minutes
"TC1":100,	Total Tamper Counts
"PF1":0.99,	Average PF
"LBKWHNET1":98561,	Last Billing Cycle Net Energy in KWH
"LBKWHIMP1":98561,	Last Billing Cycle Import Energy in KWH
"LBKWHEXP1":98561,	Last Billing Cycle Export Energy in KWH
"PMDKVAIMP1":22.50,	Present MD KVA Import
"PMDKVAEXP1":0.00,	Present MD KVA Import
"LBMDKWIMP1":7.07,	Last Billing MD KW Import
"LBMDKWEXP1":0.00,	Last Billing MD KW Export
"LBMDKVAIMP1":7.07,	Last Billing MD KVA Import
"LBMDKVAEXP1":0.00,	Last Billing MD KVA Export
"MDRSTC1":4	MD Reset Count
}	

Reaction	
Not Applicable	



## Communication Format Annexure

### Annexure – 3 Inverter

Message Name	: Inverter Periodic Push (INVERTER-1)
Message Format	: JSON
Message Type	: Data
Message Command Flow	: Not Applicable for Data periodic Push
Message response Flow	: RMS -> State SWPS IoT Platform
Message Medium	: GPRS

#### Command Message

<b>Not Applicable</b>	

#### Response Message

Message	Description
{	
"VD":5	Virtual Device Index/Group
"TIMESTAMP":"2020-05-18 17:58:00",	RTC timestamp of RMS/DCU against all parameters of vd/group
"MAXINDEX":96	maximum index of local storage date
"INDEX":7,	reference of local storage
"LOAD":0,	Local storage retrieval command & status
"STINTERVAL":15,	Periodic interval at which RMS shall store and transmit data to server. (in minutes)
"MSGID": "",	Message Transaction Id - required for "Ondemand"/"Config" message type, request/response/acknowledgement/feedback
"DATE":200518,	local storage date
"IMEI":"1234561234561234",	IMEI No. of First Sim to be considered always for unique identity of DCU
"ASN_31":"34123450",	<b>Inverter Serial No.</b>

	RMS	0	
	DAQ	1-9	
	Pump Controller	11-19	
	Meter	21-29	
	Inverter	31-39	
	String Combiner Box	41-49	
"POTP": "34123450",	Previous One Time Password		
"COTP": "34123450",	Current One Time Password		
"IST1": 1,	Inverter Status		
"IFREQ1": 40,	Frequency		
"IPF1": 0.8,	Power Factor		
"IDC1V1": 500,	DC-1 Voltage		
"IDC1I1": 200,	DC-1 Current		
"IDC1KW1": 200,	DC-1 Power		
"IDC2V1": 243.55,	DC-2 Voltage		
"IDC2I1": 420.18,	DC-2 Current		
"IDC2KW1": 200,	DC-2 Power		
"IDC3V1": 419.38,	DC-3 Voltage		
"IDC3I1": 421.8,	DC-3 Current		
"IDC3KW1": 200,	DC-3 Power		
"IDC4V1": 0.98,	DC-4 Voltage		
"IDC4I1": 0.97,	DC-4 Current		
"IDC4KW1": 200,	DC-4 Power		
"IRPHV1": 0.96,	R phase voltage		
"IRPHI1": 50.05,	R phase current		
"IRPHKW1": 50.05,	R phase Active Power		
"IYPHV1": 42.578,	Y phase voltage		
"IYPHI1": 42.156,	Y phase current		
"IYPHKW1": 50.05,	Y phase Active Power		
"IBPHV1": 42.354,	B phase voltage		
"IBPHI1": 42.185,	B phase current		
"IBPHKW1": 50.05,	B phase Active Power		
"IKW1": 22.123,	Active Power		
"ITKWH1": 20.110,	Today Generated Energy		
"ITON1": 22.310,	Today On Time of Inverter		
"ILKWH1": 65.610,	Life time Generated Energy		
"ILON1": 55.610,	Life time running hours		
"ITEMP1": 52.910,	Inverter Temperature		
"IFT1": 53.911,	Fault-1		
"IFT2": 14.198,	Fault-2		
"IFT3": 98561.4,	Fault-3		
"IFT4": 98561.4,	Fault-4		
"IFT5": 98561.2,	Fault-5		
"IKVA1": 99100.3,	Apparent power		
"IKVAR1": 99105.1	Reactive power		
}			

Reaction	
Not Applicable	

## Communication Format Annexure

### Annexure - 4 String Combiner Box

Message Name	: Periodic Push String Combiner Box
Message Format	: JSON
Message Type	: Data
Message Command Flow	: Not Applicable for Data periodic Push
Message response Flow	: RMS -> State SWPS IoT Platform
Message Medium	: GPRS

Command Message	
Not Applicable	

Response Message					
Message	Description				
{					
"VD":9	Virtual Device Index/Group				
"TIMESTAMP":"2020-05-18 17:58:00",	RTC timestamp of RMS/DCU against all parameters of vd/group				
"MAXINDEX":96	maximum index of local storage date				
"INDEX":7,	reference of local storage				
"LOAD":0,	Local storage retrieval command & status				
"STINTERVAL":15,	Periodic interval at which RMS shall store and transmit data to server. (in minutes)				
"MSGID": "",	Message Transaction Id - required for "Ondemand"/"Config" message type, request/response/acknowledgement/feedback				
"DATE":200518,	local storage date				
"IMEI":"1234561234561234",	IMEI No. of First Sim to be considered always for unique identity of DCU				
"ASN_41":"34123450",	<b>SJB Serial no</b> <table border="1"> <tr> <td>RMS</td><td>0</td></tr> <tr> <td>DAQ</td><td>1-9</td></tr> </table>	RMS	0	DAQ	1-9
RMS	0				
DAQ	1-9				

	Pump Controller	11-19	
	Meter	21-29	
	Inverter	31-39	
	String Combiner Box	41-49	
"POTP": "34123450",	Previous One Time Password		
"COTP": "34123450",	Current One Time Password		
"SI11": "3.00",	SJB1, Channel1 Current		
"SI21": "5.00",	SJB1, Channel2 Current		
"SI31": "5.00",	SJB1, Channel3 Current		
"SI41": "5.00",	SJB1, Channel4 Current		
"SI51": "5.00",	SJB1, Channel5 Current		
"SI61": "5.00",	SJB1, Channel6 Current		
"SI71": "5.00",	SJB1, Channel7 Current		
"SI81": "5.00",	SJB1, Channel8 Current		
"SI91": "5.00",	SJB1, Channel9 Current		
"SI101": "5.00",	SJB1, Channel10 Current		
"SI111": "5.00",	SJB1, Channel11 Current		
"SI121": "5.00",	SJB1, Channel12 Current		
"SI131": "5.00",	SJB1, Channel13 Current		
"SI141": "5.00",	SJB1, Channel14 Current		
"SI151": "5.00",	SJB1, Channel15 Current		
"SI161": "5.00",	SJB1, Channel16 Current		
"SI171": "5.00",	SJB1, Channel17 Current		
"SI181": "5.00",	SJB1, Channel18 Current		
"SI191": "5.00",	SJB1, Channel19 Current		
"SI201": "5.00",	SJB1, Channel20 Current		
"SI211": "5.00",	SJB1, Channel21 Current		
"SI221": "5.00",	SJB1, Channel22 Current		
"SI231": "5.00",	SJB1, Channel23 Current		
"SI241": "5.00",	SJB1, Channel24 Current		
"SDCV1": "635.00",	SJB1, DC Voltage		
"SDCTOTI1": "40.00",	SJB1, Total DC Current		
"SDCTOTKW1": "28.00",	SJB1, Total DC Power		
"SDI11": "1.00",	SJB1, Digital Input1		
"SDI21": "1.00",	SJB1, Digital Input2		
"ST11": "1.00",	SJB1, Temperature1		
"ST21": "1.00",	SJB1, Temperature2		
"ST31": "1.00"	SJB1, Temperature3		
}			

Reaction	
Not Applicable	

## Communication Format Annexure

### Annexure – 5 RMS

Message Name	: RMS
Message Format	: JSON
Message Type	: Heartbeat
Message Command Flow	: Not Applicable
Message response Flow	: RMS -> State SWPS IoT Platform
Message Medium	: GPRS

#### Command Message

<b>Not Applicable</b>	

#### Response Message

Message	Description
{	
"VD":0	Virtual Device Index/Group
"TIMESTAMP":"2020-05-18 17:58:00",	RTC timestamp of RMS/DCU against all parameters of vd/group
"MAXINDEX":96	maximum index of local storage date
"INDEX":7,	reference of local storage
"LOAD":0,	Local storage retrieval command & status
"STINTERVAL":15,	Periodic interval at which RMS shall store and transmit data to server. (in minutes)
"MSGID": "",	Message Transaction Id - required for "Ondemand"/"Config" message type, request/response/acknowledgement/feedback
"DATE":200518,	local storage date
"IMEI":"1234561234561234",	IMEI No. of First Sim to be considered always for unique identity of DCU
"POTP":"341234",	<b>Previous One Time Password</b>
"COTP":"341234",	<b>Current One Time Password</b>
"GSM":1,	Device connected to GSM network
"SIM":1,	SIM detected (1 - detected)
"NET":1,	Device in Network (1 - in network)
"GPRS":"1",	GPRS connected (1 - connected)

"RSSI":22,	Signal Strength
"SD":1,	SD card detected (1 - detected)
"ONLINE":1,	Device Online (1- Online)
"GPS":1,	GPS Module Status (1-ON,0-OFF)
"GPSLOC":1,	GPS Location Locked
"RF":1,	RF Module Status (1-ON,0-OFF)
"RTCDATE":180918,	RTC Date
"RTCTIME":175800,	RTC Time
"TEMP":45.5,	Device Temperature
"LAT":19.06,	Latitude from gps
"LONG":72.8777,	Longitude from gps
"SIMSLOT":1,	Sim Slot (Current Sim Slot: 1 or 2)
"SIMCHNGCNT":10,	Total Sim Slot Change Count
"FLASH":1,	Device Flash Status 1: Detected 0: Error
"BATTST":0,	Battery Input Status: 1 if on battery power else 0
"VBATT":5.0,	Battery Voltage
"PST":1	Power Supply (1-Mains, 2-Battery)
}	

Reaction	
Not Applicable	

## Communication Format Annexure

### Annexure – 6 DAQ System

Message Name	: Periodic Push DAQ System
Message Format	: JSON
Message Type	: Data
Message Command Flow	: Not Applicable for Data periodic Push
Message response Flow	: RMS -> State SWPS IoT Platform
Message Medium	: GPRS

#### Command Message

<b>Not Applicable</b>	

#### Response Message

Message	Description
{	
"VD":12	Virtual Device Index/Group
"TIMESTAMP":"2020-05-18 17:58:00",	RTC timestamp of RMS/DCU against all parameters of vd/group
"MAXINDEX":96	maximum index of local storage date
"INDEX":7,	reference of local storage
"LOAD":0,	Local storage retrieval command & status
"STINTERVAL":15,	Periodic interval at which RMS shall store and transmit data to server. (in minutes)
"MSGID": "",	Message Transaction Id - required for "Ondemand"/"Config" message type, request/response/acknowledgement/feedback
"DATE":200518,	local storage date
"IMEI":"1234561234561234",	IMEI No. of First Sim to be considered always for unique identity of DCU
"POTP":"34123450",	<b>Previous One Time Password</b>
"COTP":"34123450",	<b>Current One Time Password</b>
"AI1":45.5,	Analog Input – 1
"AI2":45.5,	Analog Input – 2
"AI3":45.5,	Analog Input – 3
"AI4":45.5,	Analog Input – 4

"DI11":1,	Digital Input – 1
"DI21":0,	Digital Input – 2
"DI31":1,	Digital Input – 3
"DI41":0,	Digital Input – 4
"DO11":1,	Digital Output – 1
"DO21":1,	Digital Output – 2
"DO31":1,	Digital Output – 3
"DO41":1	Digital Output – 4
}	

Reaction	
Not Applicable	



## Annexure - 7

Message Name	: On Demand Read/Write Parameter/Keyword
Message Format	: JSON
Message Type	: Config
Message Command Flow	: Cloud Server-> RMS
Message Response Flow	: RMS -> Cloud Server
Message Medium	: GPRS

Command Message	
Message	Description
{	
"timestamp":"2018-09-18 17:58:00",	
"type": "config",	
"cmd": "write",	To write config
"msgid": "130",	Server Auto Generated
"APN1": "www"	APN Value for sim1
"USR1": "string"	sim1 user name
"PASS1": "string"	sim1 password
"APN2": "Internet"	APN Value for sim2
"USR2": "string"	Sim2 user name
"PASS2": "string"	Sim2 password
"RESTART":1	To restart DCU, 1 : Execute command
"UPDATEINTERVAL":15	Enter update interval in mins.
"HEARTINTERVAL":5	Heartbeat Update Interval in mins
"URTCDATE":200622	DCU RTC Date (YYMMDD) Update
"URTCTIME":220312	DCU RTC Time (HH:MM:SS) Update - 24 hour format
"UPDATERTC":1	Update RTC, 1: Execute command, 0 : Successful execution
"GSMSYNC":1	RTC auto GSM synchronization, 1: to execute command
"DO1":1	Pump Remote ON/OFF Operation (1-ON, 0-OFF)
"AI1ZERO":1	Engineering Zero Value (4 mA dc) for AI1 E.G. 0(LPM)
"AI1SPAN":100	Engineering Span Value (20 mA dc) for AI1 E.G. 5000(LPM)
"AI2ZERO":1	Engineering Zero Value (4 mA dc) for AI2

"AI2SPAN":100	Engineering Span Value (20 mA dc) for AI2
"AI3ZERO":1	Engineering Zero Value (4 mA dc) for AI3
"AI3SPAN":100	Engineering Span Value (20 mA dc) for AI3
"AI4ZERO":1	Engineering Zero Value (4 mA dc) for AI4
"AI4SPAN":100	Engineering Span Value (20 mA dc) for AI4
"URL": "rms1.kusumiiot.co"	URL of Broker Server
"PORT":8883	Port of Broker Server
"CID": "d:860906045525646\$standalonesolarpump\$27"	Unique Client id of device
"USERNAME": "860906045525646\$standalonesolarpump\$27"	Username for device authentication
"PASSWORD": "9e0baa73"	Password for device authentication
"FTPPURL": "rms1.kusumiiot.co"	URL for FTP
"FTPUSER": "866191037709301"	Username for FTP
"FTPPASS": "908552f"	Password for FTP
"FTPPORT":22	Port for FTP
"FTPDOWN":1	Download Certificates from ftp 1: To execute command, 0: Command is successfully executed
}	

Response Message	
Message	Description
{	
"timestamp": "2018-09-18 17:58:00",	
"type": "config",	
"cmd": "write",	To write config
"msgid": "130",	Server Auto Generated
"APN1": "www"	APN Value for sim1
"USR1": "string"	sim1 user name
"PASS1": "string"	sim1 password
"APN2": "Internet"	APN Value for sim2
"USR2": "string"	Sim2 user name
"PASS2": "string"	Sim2 password
"RESTART":1	To restart DCU, 1 : Execute command
"UPDATEINTERVAL":15	Enter update interval in mins.
"HEARTINTERVAL":5	Heartbeat Update Interval in mins

"URTCDATE":200622	DCU RTC Date (YYMMDD) Update
"URTCTIME":220312	DCU RTC Time (HH:MM:SS) Update - 24 hour format
"UPDATERTC":1	Update RTC, 1: Execute command, 0 : Successful execution
"GSMSTIME":1	RTC auto GSM synchronization, 1: to execute command
"DO1":1	Pump Remote ON/OFF Operation (1-ON, 0-OFF)
"AI1ZERO":1	Engineering Zero Value (4 mA dc) for AI1 E.G. 0(LPM)
"AI1SPAN":100	Engineering Span Value (20 mA dc) for AI1 E.G. 5000(LPM)
"AI2ZERO":1	Engineering Zero Value (4 mA dc) for AI2
"AI2SPAN":100	Engineering Span Value (20 mA dc) for AI2
"AI3ZERO":1	Engineering Zero Value (4 mA dc) for AI3
"AI3SPAN":100	Engineering Span Value (20 mA dc) for AI3
"AI4ZERO":1	Engineering Zero Value (4 mA dc) for AI4
"AI4SPAN":100	Engineering Span Value (20 mA dc) for AI4
"URL": "rms1.kusumiiot.co"	URL of Broker Server
"PORT":8883	Port of Broker Server
"CID": "d:860906045525646\$standalonesolarpump\$27"	Unique Client id of device
"USERNAME": "860906045525646\$standalonesolarpump\$27"	Username for device authentication
"PASSWORD": "9e0baa73"	Password for device authentication
"FTPUURL": "rms1.kusumiiot.co"	Url for FTP
"FTPUSER": "866191037709301"	Username for FTP
"FTPPASS": "908552f"	Password for FTP
"FTPPORT":22	Port for FTP
"FTPDOWN":1	Download Certificates from ftp 1: To execute command, 0: Command is successfully executed
}	

Command Message	
Command – B. In case, if some key in command are invalid	
Message	Description
{	
"timestamp":"2018-09-18 17:58:00",	
"type":"config",	
"cmd":"write",	to write config
"msgid":"130",	server auto generated
"APNN1": 2	send value "2"
"USR1": "xyz"	send value "xyz"
}	

Response Message	
Message	Description
{	
"timestamp":"2018-09-18 17:58:00",	
"type": "config",	
"cmd":"write",	to write config
"msgid":"130",	server auto generated
"APNN1": 0	invalid Key, value will be returned '0'
"USR1": "xyz"	actual value received
}	

Reaction	
Not Applicable	