

No.: 318/17/2024-Grid Connected Rooftop (Part-14)
Mission Directorate, PM-Surya Ghar: Muft Bijli Yojana
Ministry of New and Renewable Energy
Government of India

Atal Akshay Urja Bhawan
Lodhi Road, New Delhi-110003
Dated: 08.10.2024

Office Memorandum

Subject: Operational Guidelines for Implementation of Component "Innovative Projects " under PM-Surya Ghar: Muft Bijli Yojana

This refers Ministry's order No. 318/17/2024-GCRT Division dated 16th March 2024 vide which sanction was issued for the PM-Surya Ghar: Muft Bijli Yojana, aimed at installing rooftop solar plants in one crore households, with a total financial outlay of Rs. 75,021 crore.

2. The Operational Guidelines for Implementation of Component "Innovative Projects" under PM-Surya Ghar: Muft Bijli Yojana is enclosed.
3. This issues with the approval of competent authority.


(Divyanshu Jha)
Deputy Secretary
d.jha1989@ias.nic.in

To

1. Secretary, Ministry of Power
2. Secretary, Department of Higher Education
3. Secretary, Department of Science and Technology
4. Secretary, Department of Scientific and Industrial Research
5. Secretary, Department for Promotion of Industry and Internal Trade
6. DG, National Institute of Solar Energy (NISE)
7. ACS/Principal Secretaries/Secretaries (Renewable Energy/Energy/Power) of all States/ UTs
8. CMDs/MDs of Discoms/State Nodal Agencies of all States/UTs

Copy for information to:

1. PS to Hon'ble Minister of New & Renewable Energy
2. PS to Hon'ble Minister of State of New and Renewable Energy
3. PPS to Secretary/AS/JS/JS&FA, MNRE
4. All Advisers & Group Heads
5. Director (NIC) for uploading on Ministry's website

PM Surya Ghar: Muft Bijli Yojana

Innovative Projects Component

1. Background and Scope

- a. The Government of India has approved the PM Surya Ghar: Muft Bijli Yojana on 29th February, 2024 to increase the share of solar rooftop capacity and empower residential households to generate their own electricity. The scheme has an outlay of Rs 75,021 crore and is to be implemented till FY 2026-27. The administrative approval was granted to the scheme vide Order No. 318/17/2024-Grid Connected Rooftop dated 16th March, 2024.
- b. These guidelines relate to the scheme component for Innovative Projects. This component aims to showcase and demonstrate innovative solar technologies, applications, or integration techniques to drive industry advancement and adoption in the country.

The guidelines outline the process for preparing and submitting project proposals, including the approval method, evaluation and monitoring mechanisms, and execution of proposals.

2. Objectives

The objectives of the Innovative Projects for rooftop solar are:

- a. To identify and fund new innovations in business models and technical deployments of rooftop solar.
- b. To support startups and institutions to conduct collaborative pilots, proof-of-concepts and scaling up of new business models in order to generate new technologies, rooftop solar products and associated innovations.
- c. To support interventions that can provide new pathways for deployment of distributed renewable energy for households and companies, and to create technological and management tools for DISCOMs to better manage distributed energy resources within their grids.

PM-Surya Ghar: Muft Bijli Yojana

Innovative Projects Component

- d. To support incorporation of cutting edge technology in real-life rooftop solar/distributed RE deployments

3. Financial Outlay

- a. ₹500 crore is allocated under the scheme for the Innovative Projects Component. Some illustrative examples of Innovative Projects include block chain-based peer to peer RTS, digital solutions for RTS, smart building materials, RTS with EVs, grid responsive RTS with battery storage solutions, DISCOM IT systems for RTS management etc. These may also include creation of special financing products along with financing intermediaries. Rooftop solar deployments expansion across segments by enabling new and innovative business models, such as Virtual Net Metering and Group Net Metering models, Behind the Meter Storage, RTS with EV, Rent-A-Roof Models, Peer to Peer Sale of RTS electricity etc.

4. Eligibility/Target Group

- a. Any entity or individual.
- b. The International Co-Operation for taking up joint research and design will also be supported.

5. Call for proposals

Scheme Implementation Agency (SIA) will invite proposals through advertisements in national newspapers /website /National Portal of PM Surya Ghar: Muft Bijli Yojana i.e. <https://www.pmsuryaghar.gov.in/>. SIA may also consider soliciting proposals from identified experts, institutions, and industries capable of implementing technology development activities in relevant areas. The Ministry through SIA may also support setting up of Centre of Excellence for strengthening the Rooftop Solar ecosystem in the country.

6. Application Procedure

Applications will be accepted on the National Portal for PM Surya Ghar: Muft Bijli Yojana i.e. <https://www.pmsuryaghar.gov.in/>.

PM-Surya Ghar: Muft Bijli Yojana

Innovative Projects Component

7. Tenure and Implementation

The project will have a maximum duration of 18 months. The effective date of implementation will be the issue of letter of award. The duration may be extended or shortened, as determined by the Selection Committee for Innovative Projects.

8. Nature of Assistance

The financial assistance for innovative projects would be capped at 60% of the total project cost. or Rs 30 crore whichever is lower. The Selection Committee may decide to provide a lower level of financial assistance, as per specific nature of the project. The Secretary, MNRE may specify minimum project cost that shall be funded under this project component.

9. Awards for Innovation/start ups

In order to encourage innovation in Rooftop Solar, the Mission will award prizes on an annual basis. The award will consist of a citation and a cash prize of Rs. 100 lakh, Rs 50 lakh, Rs. 30 lakh, and 10 consolation prizes of Rs 5 lakh each. The Selection Committee will formulate guidelines for the awards and act as a jury for the selection of candidates for the award.

10. Procedure for approval

Proposals complete in all respects will be assessed and shortlisted, based on relevance and feasibility by the Screening Committee for Innovative Projects. Thereafter, the Screening Committee will assess the proposals and shortlist the project, based on relevance and feasibility. The shortlisted projects will then be evaluated by the Selection Committee for Innovative Projects. Applicants will be invited to present their proposals in person (physical/online). The Selection Committee will select projects for appropriate funding under the component.

a. Criteria of Screening

- i. The screening criteria for innovation projects would be based on several key factors:

PM-Surya Ghar: Muft Bijli Yojana

Innovative Projects Component

1. Relevance, cost-effectiveness and completeness of the project.
 2. Project Concept and Novelty: The project's core idea should be innovative, offering a significantly different or improved approach compared to existing methods, products, or technologies.
 3. Feasibility: Beyond its innovative nature, the project must be achievable within the limitations of available resources, technology, and any other relevant constraints.
 4. Societal Value: The successful innovation project will demonstrably benefit citizens and society as a whole.
 5. Technology Agnostic: Innovative projects can leverage any technology, but the specific technology employed should be clearly defined in the proposal.
- ii. The project proposal should include necessary design and technical specifications that would facilitate further testing and analysis if required.

b. **Screening Committee for Innovative Project** shall comprise of the following members:

i.	Representative, Rooftop Solar Division, MNRE	Member
ii.	Representative, R&D Division, MNRE	Member
iii.	Representative, Regulatory Division, MNRE	Member
iv.	Representative, HRD Division, MNRE	Member
v.	Representative, National Institute of Solar Energy (NISE)	Member Convener
vi.	Three subject experts (for a particular sector) from IITs, Central Universities, Institutes of Eminence, other National Level institutions etc.	Member

- c. The Ministry may get the shortlisted proposals examined by the experts.
- d. Selection committee headed by Secretary, MNRE. It will comprise of Additional Secretary and Mission Director along with members of the monitoring committee.

PM-Surya Ghar: Muft Bijli Yojana

Innovative Projects Component

- e. **Monitoring Committee for Innovative Projects (MCIP-PMSG)** shall comprise of the following members:

i.	Mission Director, PM Surya Ghar	Chairperson
ii.	Three subject experts (for a particular sector) from IITs, Central Universities, Institutes of Eminence, other National Level institutions etc.	Member
iii.	Representative, R&D Division, MNRE	Member
iv.	Representative, Regulatory Division, MNRE	Member
v.	Representative, IFD, MNRE	Member
vi.	Representative, National Institute of Solar Energy (NISE)	Member Convener

- f. The Selection Committee for Innovative Projects will evaluate the innovative projects against the following criteria for selection:
- i. The Committee will examine the proposals forwarded by the Screening Committee using a checklist for reference, review the recommendation of the Screening Committee and satisfy itself with regards to experience and expertise of the organization, resources and technology available with the organization for implementation of project, financial status of the organization etc.
 - ii. Each proposal shall be evaluated as per the following criteria:
 - a. Novelty of the idea / concept of the innovative projects
 - b. Work Plan, Methodology of the innovative project
 - c. Value / benefit of innovative proven concept / prototype to the society and citizen
 - d. Practicability / feasibility of delivered output of the innovative R&D project
 - e. Availability of resources and technology with the organization and previous work experience
 - f. Experience and Expertise of the Organization
 - g. Support of DISCOM/Regulatory Commission

PM-Surya Ghar: Muft Bijli Yojana

Innovative Projects Component

- iii. Based on the evaluation of all proposals, the Selection Committee shall select suitable proposals for funding under the Innovative Projects Component of the Scheme. The Selection Committee may also approve budget revision proposed for existing projects under the Innovative Projects Component of the Scheme.

11. Release of Funds

- a. The project proponents of the approved projects will receive financial support as per the approval letter issued by MNRE upon submitting necessary documentation.
 - i. The pattern of release of the grant will be on milestone basis. In order to facilitate procurement of equipment early, upto 50% of the total assistance minus the institutional overheads would be released initially along with the sanction depending on the requirement of equipment in the project. For projects where equipment cost exceeds 50% of the project cost, higher initial release may be considered by the selection committee.
 - ii. The balance assistance minus the institutional overheads would be sanctioned as per the annual allocation based on progress/milestone achieved in the project. The utilization of the grants released towards purchase of equipments should be within 6 month of date of release, subsequent grant will be released after full utilization of the previous release and submission of required documents.
 - iii. The overhead charges will be restricted up to 8% of the project cost or 15 lakh, whichever is less. The institutional overheads would be released only after successful completion of the project and a review by the MCIP-PMSG and on receipt of the following documents.
 - i. Two copies of the project completion report along with a soft copy.
 - ii. A consolidated Audited Utilization Certificate for the amount actually utilized towards the project duly signed and sealed by Government Internal Auditor / Chartered Accountant, Registrar/Principal/ Director or CEO of the Institution as well as the Principal Investigator/Project Coordinator of the Institution

PM-Surya Ghar: Muft Bijli Yojana

Innovative Projects Component

- b. The unutilized grant along with interest, if any, shall be refunded, as per GFR guidelines.

12. Monitoring

- a. The scheme component shall be monitored regularly by the Mission Directorate.
- b. The National Institute for Solar Energy (NISE) shall be the Scheme Implementation Agency (SIA) of the scheme component Innovative Projects and shall ensure periodic progress review of the projects, proper utilization of the allocated funds, execution within the time frame, verification of fund utilization reports, phase-wise release of fund after progress review and other implementation related issues. The SIA will be eligible for service charges at 0.5% of the financial support utilized for the projects sanctioned under the Scheme component Innovative Projects and the service charge to SIA shall be utilized from within the 'Innovative Projects' component of the Scheme.
- c. Monitoring and evaluation of the project approved under this component will be undertaken by the MCIP-PMSG. The MCIP-PMSG will be responsible for:
 - i. Continuously monitoring project implementation;
 - ii. Recommending next release, mid-course corrections, realigning of objectives to enable delivery of the envisaged project outcomes in a timely manner;
 - iii. Assessing the performance of the supported projects, and appraising the annual work plan for the current year on the basis of the deliverables/outcomes; and
 - iv. Evaluate the achievements of completed projects and give recommendations for corrections and further work, if any.

13. Amendment of Scheme Component Guidelines

MNRE may make necessary amendments in the scheme guidelines for Innovative Projects Component to ensure smooth implementation of the scheme, as and when required, with the approval of Hon'ble Minister, New and Renewable Energy.

PM-Surya Ghar: Muft Bijli Yojana

Innovative Projects Component