



Program Summary Information

Date of Document Preparation: October 16, 2024	
Program Name	Maharashtra Climate Resilient Distributed Renewable Energy Access Program
Program Number	P000880
AIIB member	India
Sector/Subsector	Energy / Others
Alignment with AIIB's thematic priorities	Green Infrastructure, Technology-enabled Infrastructure
Status of Financing	Under Preparation
Objective	To promote distributed renewable energy in Maharashtra by providing farmers with reliable daytime power through off-grid solar pumps and to enhance the climate resilience of the existing electricity distribution network through investments that will support preparation for grid solarization.
Program Description	<p>Maharashtra, a major agricultural state in India, relies heavily on subsidized or free electricity to farmers for groundwater irrigation. Grid-connected electricity is supplied for agricultural users on a rotational basis at off-peak times. Farmers must wait for unreliable nighttime power, as daytime electricity is prioritized for higher-paying commercial and industrial users. The inability to recover costs from agricultural consumers leads to significant financial losses for Maharashtra State Electricity Distribution Company Limited (MSEDCL), limiting its ability to maintain and upgrade the electricity grid for all users.</p> <p>To address these issues, the state plans to promote the adoption of off-grid solar-powered water pumps among farmers and shift the supply of grid connected pumps to solar power. This initiative aims to alleviate financial pressure on MSEDCL and reduce cross-subsidy burdens on commercial users. It will also support broader objectives of clean energy usage. The program will contribute to a more sustainable and environmentally friendly energy sector in Maharashtra by advancing solar energy adoption.</p> <p>The proposed result-based program (RBP) is designed to address these financial challenges and boost solar energy integration into the grid. It consists of three key components: (i) financing 500,000 off-grid solar pumps over the next five years; (ii) strengthening the distribution system by upgrading equipment such as transformers, breakers, and feeders to optimize power distribution and accommodate the increasing influx of solar energy; and</p>

	(iii) providing technical assistance and capacity building to enhance the capacity of the implementing agency and beneficiaries to deliver consistent benefits.
Expected Result Areas	The RBP will focus on four main results areas: (i) expanding access to solar-powered irrigation and daytime power supply; (ii) strengthening the program implementation unit; (iii) creating of community benefits; and (iv) improving public expenditure effectiveness.
Environmental and Social Category	C
Environmental and Social (ES) Information	<p>Applicable Policy and Categorization. The Bank's Environmental and Social Policy (ESP), including the Environmental and Social Exclusion List (ESEL), will be applicable to this Program. As per the Bank's ESP, the Project has been categorized as Category C because the potential environmental and social (ES) risks and impacts to be low and limited. However, a screening process will be designed as part of Environmental and Social Systems Assessment (ESSA), this assessment reviews the adequacy of the systems proposed to be applied to the RBP for managing ES risks and potential impacts, including the Client's capacity to plan, implement, monitor, and report on ES mitigation measures, scope for improvements, and risks and related mitigation measures.</p> <p>Environmental and Social Risks and Impacts. No major environmental impacts and risks are envisaged during the construction stage. The only risk associated with the program is disposal of damaged solar panels. It will be discussed with the client to put a mechanism in place to ensure that supplier takes back the damaged panels at the time of replacement. The social impacts and risks are expected to be low and private land acquisition is not envisaged. The pumps will be installed on beneficiary farmer's land; upgrading of equipment like transformers, breakers, and feeders will be in the existing substations; and setting up small solar-powered grids in strategic spots across Maharashtra will be on government owned land free of encroachment and other encumbrances.</p> <p>Environmental and Social Systems Assessment (ESSA). ESSA is a prerequisite under RBP financing, will be conducted to assess the adequacy of the environment and social systems. The program will leverage the experience of other relevant projects to mainstream environmentally and socially friendly practices. It aims to be gender responsive, socially inclusive, and transparent. MSEDCL already has a functional grievance redress system as the project-level grievance redress mechanism (GRM) that will be reviewed during appraisal to ensure that the mechanism addresses complaints associated with, amongst others, access to information and stated benefits. ESSA will further recommend actions, if required, to strengthen specific aspects of the MSEDCL's</p>

	<p>capacity and these systems for mitigating ES risks during the preparation and implementation of the RBP including issues related to gender and social exclusion.</p> <p>Stakeholder Engagement, Information Disclosure, and Project Grievance Redress Mechanism. AIIB's ES specialists and consultants will carry out further desktop and field-based ES screening and assessment during appraisal and hold consultations with program stakeholders to enable informed ES management systems assessment. The draft assessment will be publicly disclosed timely in an appropriate manner before appraisal of the RBP. MSEDCL already has a functional grievance redress system as the project-level grievance redress mechanism (GRM). The information of this GRM and the Project-affected People's Mechanism (PPM) of AIIB will be timely disclosed in an appropriate manner. The ES actions to fill any gaps identified will be agreed upon with the MSEDCL prior to program approval.</p> <p>Monitoring and Reporting Arrangement. Proposed ES action implementation will be monitored and reported based on agreed format during program implementation. Bank will conduct monitoring and supervision during program implementation and providing implementation support to the Client as appropriate.</p>		
Cost and Financing Plan	<p>Total Program Cost: USD 1,835 million</p> <p>AIIB Loan (Proposed): USD 1,100 million, State of Maharashtra and others: USD 735 million</p>		
Borrower	Republic of India		
Implementing Entity	Maharashtra State Electricity Distribution Company Limited (MSEDCL)		
Estimated date of loan closing	December 2030		
Contact Points:	AIIB	Borrower	Implementing Entity
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Date of Concept Decision	October 16, 2024		
Date of Appraisal Decision	Q1-2025		

Estimated Date of Financing Approval	Q2-2025
Independent Accountability Mechanism	<p>The Project-affected People's Mechanism (PPM) has been established by the AIIB to provide an opportunity for an independent and impartial review of submissions from Project-affected people who believe they have been or are likely to be adversely affected by AIIB's failure to implement its Environmental and Social Policy in situations when their concerns cannot be addressed satisfactorily through Project-level GRM or AIIB Management's processes.</p> <p>Information on AIIB's PPM is available at: https://www.aiib.org/en/about-aiib/who-we-are/project-affected-peoples-mechanism/how-we-assist-you/index.html.</p>