GOVERNMENT OF INDIA
MINISTRY OF NEW AND RENEWABLE ENERGY
LOK SABHA
UNSTARRED QUESTION NO. 1507
ANSWERED ON 04/12/2024

ALMM FOR SOLAR MODULES

1507. SHRI ARVIND GANPAT SAWANT
SMT. BHARTI PARDHI
SHRI SHRIRANG APPA CHANDU BARNE

Will the Minister of NEW AND RENEWABLE ENERGY be pleased to state:

(a) whether proper implementation of Approved List of Models and Manufacturers (ALMM) for solar modules has faced several challenges during the last few years;
(b) if so, the details thereof and the reasons therefor;
(c) whether the Government proposes to bring out a policy similar to the ALMM for solar modules for solar cells to ensure better quality of these items;
(d) if so, the time by which the final decision is likely to be taken in this regard;
(e) the steps taken by the Government to provide a boost to domestic manufacturing;
(f) whether there is a need to provide platform for India's growing energy sector especially in the segment of energy storage; and
(g) if so, the steps taken by the Government in this regard?

ANSWER
THE MINISTER OF STATE FOR NEW & RENEWABLE ENERGY AND POWER

(SHRI SHRIPAD YESSO NAIK)

(a) & (b) Approved List of Models & Manufacturers (ALMM) for Solar PV Modules was first issued on 10.03.2021. As per the extant provisions regarding ALMM for solar PV modules, only the models and manufacturers included in ALMM List for solar PV modules, are eligible for use in Government Projects/ Government assisted Projects/ Projects under Government Schemes & Programmes/ Open Access / Net-Metering Projects, installed in the country, including projects set up for sale of electricity to Government under the Guidelines issued by Central Government under section 63 of Electricity Act, 2003 and amendment thereof, unless such projects are exempted from ALMM through some order / instruction issued by Ministry of New & Renewable Energy. Vide MNRE's O.M. dated 10.03.2023, the ALMM List for solar PV modules was held in abeyance for one financial year (2023-24) but has come into effect from 1st April 2024.

(c) & (d) Yes. A draft amendment to ALMM Order for implementation of ALMM (Approved List of Models & Manufacturers) for Solar PV Cells, was issued by Ministry of New & Renewable Energy (MNRE) on 07.09.2024 and comments were invited from the stakeholders till 21.10.2024. The matter is under examination in MNRE.
(e): The Ministry of New and Renewable Energy (MNRE), Government of India, has been consistently bringing out policies to boost domestic manufacturing of solar PV modules and other renewable energy equipments. Various initiatives taken, inter-alia, include those mentioned at **Annexure-I**.

(f) & (g) Central Electricity Authority (CEA), has estimated energy storage requirement of 336.40 GWh by the year 2030 which includes 208.25 GW from Battery Energy Storage System (BESS) and 128.15 GWh from Pumped Storage Projects (PSP).

The Government has taken various steps to promote the energy storage in the country, which inter-alia include:

(i). Ministry of Heavy Industries (MHI), in June, 2021 launched Production Linked Incentive (PLI) scheme for the manufacturing of Advanced Chemistry Cells (ACC) Batteries of 50 GWh capacity annually. Out of total capacity, 10 GWh has been earmarked for grid scale stationary storage applications.

(ii). Ministry of Power in 2022 issued the Renewable Purchase Obligation (RPO) and Energy Storage Obligation (ESO) trajectory till 2029-30. The ESO of obligated entities shall gradually increase from 1.0% in FY 2023-24 to 4% by FY 2029-30.

(iii). Waiver of ISTS Charges for a period of 25 years for Hydro PSP and for a period of 12 years for BESS, subject to specified conditions.

(iv). 'National Framework for promoting Energy Storage Systems' for the development and deployment of technology agnostic Energy Storage Systems in the country has been issued.

(v). The Union Cabinet has approved Viability Gap Funding (VGF) scheme for development of 4,000 MWh of BESS projects by 2030-31, with a financial support of up to 40% of the capital cost as budgetary support in the form of VGF.

(vi). Ministry of Power, in 2023, has issued guidelines to promote development of Pumped Storage Projects (PSP).

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ANNEXURE-I

Annexure referred to in reply of part (e) of the Lok Sabha Unstarred Question No. 1507 for 04.12.2024 regarding 'ALMM for Solar Modules'

Initiatives taken to increase domestic production of solar PV modules and other renewable energy equipment., inter-alia, include:

(i) Production Linked Incentive (PLI) Scheme: The Government of India is implementing the Production Linked Incentive (PLI) Scheme for High Efficiency Solar PV Modules, for achieving domestic manufacturing capacity of Giga Watt (GW) scale in High Efficiency Solar PV modules, with an outlay of Rs. 24,000 crore. The Scheme is being implemented in two tranches. Tranche-I has an outlay of Rs. 4,500 crore, under which Letters of Award have been issued for setting up of 8,737 MW of fully integrated solar PV module manufacturing units. For Tranche-II with an outlay of Rs. 19,500 crore, Letters of Award have been issued for setting up of 39,600 MW of fully/ partially integrated solar PV module manufacturing units.

(ii) Domestic Content Requirement (DCR): Under some of the current schemes of the MNRE, namely CPSU Scheme Phase-II, PM-KUSUM Components B & C, and PM Surya Ghar: Muft Bijli Yojana, wherein government subsidy is given, it has been mandated to source solar PV cells and modules from domestic sources.

(iii) Preference to 'Make in India' in Public Procurement: In accordance with Department for Promotion of Industry and Internal Trade (DPIIT) 'Public Procurement (Preference to Make in India), Order', MNRE had notified Purchase Preference (linked with local content) for RE sector which, inter-alia, identified list of all goods and services or works in respect of which there is sufficient local capacity and competition, and mandated that only "Class-I local supplier" shall be eligible to bid for the above goods/services/works with the mandate that minimum local content should be at least 50%.

(iv) Imposition of Basic Customs Duty on import of solar PV cells & modules: The Government has imposed Basic Customs Duty (BCD) on import of solar PV cells and modules, with effect from 01.04.2022.

(v) Discontinuation of Customs Duty Concessions: MNRE has discontinued issuance of Customs Duty Concession Certificates for import of material /equipment for initial setting up of solar PV power projects with effect from 02.02.2021.

(vi) Domestic Manufacturing in Wind Sector: MNRE has also put in place a procedure to enlist type and quality certified wind turbines under 'Revised List of Models & Manufacturers' (RLMM). It also mandates that Hub and Nacelle assembly / manufacturing facility shall be in India. Around 31 different models of wind turbines are being

manufactured in India by 14 different companies. The current annual production capacity of wind turbines in the country is around 18,000 MW.

(vii) Renewable Energy Research and Technology Development Programme (RE-RTD): Ministry of New and Renewable Energy is implementing a “Renewable Energy Research and Technology Development Programme (RE-RTD)” through various research institutions and industry to develop indigenous technologies and manufacturing for widespread applications of new and renewable energy in efficient and cost-effective manner. The objective of the scheme is to support the R&D projects for technology development and demonstration in various areas of new and renewable energy such as solar photovoltaic systems, biogas systems, waste to energy systems, wind energy systems, hybrid systems, storage systems, hydrogen and fuels cells, geothermal, etc. with the ultimate aim of increasing share of renewables in the energy mix in the country. It provides up to 100% financial support to government/non-profit research organizations and up to 70% to industry, startups, private institutes, entrepreneurs, and manufacturing units.