GOVERNMENT OF INDIA MINISTRY OF NEW AND RENEWABLE ENERGY RAJYA SABHA UNSTARRED OUESTION NO. 305

UNSTARRED QUESTION NO. 305

ANSWERED ON 02.12.2025

INDIGENOUS MANUFACTURING OF RENEWABLE ENERGY EQUIPMENT

305. SHRI HARSH MAHAJAN

Will the Minister of *New and Renewable Energy* be pleased to state:

- (a) whether Government aims to promote indigenous manufacturing of renewable energy equipment such as solar panels, wind turbines, wind turbine blades, battery storage systems, etc.;
- (b) if so, the steps being taken by Government so far in this regard;
- (c) whether Government has formulated any plan to establish Special Economic Zones or manufacturing hubs for renewable energy equipment; and
- (d) if so, the details regarding the number and locations of such hubs?

ANSWER THE MINISTER OF STATE FOR NEW & RENEWABLE ENERGY AND POWER (SHRI SHRIPAD YESSO NAIK)

(a) & (b) The Ministry of New and Renewable Energy (MNRE) has been consistently bringing out policies to promote indigenous manufacturing of solar energy equipment such as solar panels. Various initiatives taken, inter-alia, include those mentioned at **Annexure**. As on 31.10.2025, Solar PV Module manufacturing capacity in the country has reached over 116 GW.

With regard to manufacturing of wind energy equipment, the Ministry has put in place a procedure to enlist type and quality certified wind turbines under 'Approved List of Models & Manufacturers (Wind)' [i.e. ALMM (Wind)]. It mandates Hub and Nacelle assembly / manufacturing facility conforming to ALMM requirements. Further, an amendment to ALMM (Wind) has been issued mandating sourcing of Major Wind Turbine Components like blade, tower, Gearbox, Generator and Special Bearings (Yaw, Pitch and Main Bearing) only from manufacturing facilities enlisted in ALMM (Wind Turbine Components) after inspection. Presently, 14 Manufacturers with 33 models with capacity ranging from 225 kW – 5.2 MW are in the latest ALMM (Wind) list of the Ministry. The current annual production capacity of wind turbines in the country is around 20 GW.

With regard to Energy Storage Systems, Government has approved a Production Linked Incentive (PLI) scheme, 'National Programme on Advanced Chemistry Cell (ACC) Battery Storage' with an outlay of Rs. 18,100 Crore for 50 GWh ACC manufacturing facilities in the country. Out of 50 GWh, 10 GWh has been earmarked for Grid Scale Stationary Storage applications. Balance 40 GWh capacity has been awarded, which is end-use agnostic and can be utilized for any applications, including electric vehicles (EVs) and Stationary Energy Storage Systems. In addition, the Government has approved a Viability Gap Funding (VGF) Scheme for developing large-scale Battery Energy Storage Systems (BESS) with an initial allocation of ₹3,760 crore. A total BESS deployment capacity of 13,220 MWh has been planned under the scheme. Additionally, due to rising BESS demand, the Ministry of Power has approved another VGF scheme of 30 GWh, funded through ₹5,400 crore from the power system development fund (PSDF). This will support 25 GWh of projects in 15 states and 5 GWh at an existing NTPC station to maximize use of current generation and transmission assets.

Under the National Green Hydrogen Mission, which is being implemented by the Government with an objective to make India a global hub of production, usage and export of green hydrogen and its derivatives, financial incentives have been awarded to 15 companies for electrolyser manufacturing.

(c) & (d) The Government of India proposed a scheme for "Setting up of Manufacturing Zones for Power and Renewable Energy Equipment". As a pilot, Ministry of Power has sanctioned to set-up a Brownfield manufacturing zone with an outlay of Rs. 400 Crore over the years 2022-23 to 2026-27. Madhya Pradesh Industrial Development Corporation (MPIDC) was selected as the successful proposer for developing the Manufacturing Zone for Power and Renewable Energy Equipment (Pilot Project) at Mohasa Babai, Narmadapuram District, Madhya Pradesh.

Annexure referred to in reply of part (a) & (b) of the Rajya Sabha Unstarred Question No. 305 to be answered on 02.12.2025

Initiatives taken to encourage domestic solar manufacturing, 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. Under the Scheme, Letters of Award have been issued for setting up of 48,337 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) Imposition of Basic Customs Duty on import of solar PV cells, modules, Solar Inverters and Solar Glass: The Government has imposed Basic Customs Duty (BCD) on import of solar PV cells, solar PV modules, solar inverters, and solar glass.
- (iv) Exemption of Custom Duty on capital goods for manufacture of Solar Cells and Modules: The Government has exempted customs duty on import of the goods specified in List 41 of the notification No. 30/2024-Customs dated 23.07.2024, for the manufacturer of solar PV cells and modules.