GOVERNMENT OF INDIA MINISTRY OF NEW AND RENEWABLE ENERGY LOK SABHA

UNSTARRED QUESTION NO. 47

ANSWERED ON 20.07.2023

INCENTIVES TO RENEWABLE ENERGY SECTOR

47. SHRI GAJENDRA SINGH PATEL SHRI RODMAL NAGAR

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

- (a) the details of the works carried out by the Ministry under the provisions of incentive policies in the renewable energy sector;
- (b) the status of achievements made under solar energy, wind energy, biomass and small hydroelectric projects during 2023-24; and
- (c) the details of implementation of major projects related to renewable energy in Khargone- Barwani Parliamentary Constituency?

ANSWER

THE MINISTER OF NEW & RENEWABLE ENERGY AND POWER (SHRI R.K. SINGH)

- (a) The Ministry is implementing various schemes and programmes which have provisions of incentives for Renewable Energy deployment. These include:
 - i. Grid Connected Rooftop Solar PV Power Projects
 - ii. Central Public Sector Undertaking (CPSU) Scheme Phase-II (Government Producer Scheme) for grid-connected Solar Photovoltaic (PV) Power Projects by the Government Producers
- iii. PLI Scheme 'National Programme on High Efficiency Solar PV Modules'
- iv. Solar Park Scheme
- v. PM-KUSUM scheme
- vi. Green Energy Corridor Scheme
- vii. Biomass Programme
- viii. Waste to Energy Programme
 - ix. Biogas Programme
 - x. R&D programme
 - xi. National Green Hydrogen Mission

The details of incentives being provided as Central Financial Assistance (CFA) by the Ministry under these schemes/ programmes are given in **Annexure**.

- (b) During the year 2023-24, as on 30.06.2023, a total of 4.48 GW renewable energy capacity has been installed in India. This includes 3.32 GW Solar Power, 1.14 GW Wind Power, 0.01 GW Small Hydro Power, and 0.01 GW Bio-Power.
- (c) On the basis of details received from Madhya Pradesh Urja Vikas Nigam Ltd. (MPUVNL), the details of implementation of major projects related to renewable energy in Khargone-Barwani Parliamentary Constituency is as under:-

Bio mass registered projects 1.5 MW at Village-Mendrana, Tehsil-Pansemal, District-Barwani.

Annexure referred to in reply to part (a) of Lok Sabha Unstarred Question No. 47 for 20/07/2023 regarding 'Incentives to Renewable Energy Sector'

Incentives being provided as Central Financial Assistance (CFA) for the implementation of major renewable energy schemes/ programmes.

Scheme/ Programmes	Incentive presently eligible as per the Scheme
a) Grid Connected Rooftop	(i) For Residential Sector
Solar PV Power Projects	Central Financial Assistance (CFA) up to 40% for capacity up to 3 kWp
	 CFA up to 20% for capacity beyond 3 kWp and up to 10 kWp CFA up to 20% for GHS/RWA capacity up to 500 kWp (limited to 10 kWp per house and total upto 500 kWp) (ii) For Discoms
	Incentives up to 10% of project cost depending upon achievements in capacity addition above baseline. Vide its OM dated 27.01.2023, Ministry has fixed the CFA for the entire country. The revised CFA rates would be applicable on all future bids and the bids which are scheduled to be closed after 15 days of issuance of this OM. The revised rates are as follows:
	For general category States/UTs: i. Individual Household - For first 3 kW: Rs. 14588/ kW and for RTS capacity beyond 3 kW and upto 10 kW: Rs. 7294/kW.
	ii. Resident Welfare Associations/Group Housing Societies (RWA/GHS) - Rs. 7294/kW for common facilities up to 500 kWp @ 10 kWp per house. For special category States/UTs:
	i. Individual Household - For first 3 kW: Rs. 17662/ kW and for RTS capacity beyond 3 kW and upto 10 kW: Rs. 8831/kW. ii. Resident Welfare Associations/Group Housing Societies (RWA/GHS) - Rs. 8831/kW for common facilities up to 500 kWp @ 10 kWp per house.
b) Central Public Sector Undertaking (CPSU) Scheme Phase-II (Government Producer Scheme) for grid-connected Solar Photovoltaic (PV) Power Projects by the Government Producers	Viability Gap Funding (VGF) support up to Rs 55 lakhs per MW to the CPSUs/Govt. Organizations entities selected through competitive bidding process.
c) PLI Scheme 'National Programme on High Efficiency Solar PV Modules'	The beneficiaries are eligible for Production Linked Incentive (PLI) on production and sale of solar PV modules. The quantum of PLI eligible for disbursal depends upon: (i) quantum of sales of solar PV modules; (ii) performance parameters (efficiency and temperature coefficient of maximum power) of solar PV modules sold; and (iii) percentage of local value addition in modules sold.
d) Solar Park Scheme	Up to 25 lakhs per Solar park, for preparation of Detailed Project Report (DPR). 20 Lakh per MW or 30% of the project cost, whichever is lower, for development of infrastructure.
e) PM-KUSUM scheme	Component A: Setting up of 10,000 MW of Decentralized Ground/Stilt Mounted Solar Power Plants Benefit available: Procurement Based Incentive (PBI) to the DISCOMs @ 40 paise/kWh or Rs.6.60 lakhs/MW/year, whichever is lower, for buying solar power under this scheme. The PBI is given to the DISCOMs for a period of five years from the Commercial Operation Date of the plant. Therefore, the total PBI payable to DISCOMs is up to Rs. 33 Lakh per MW. Component B: Installation of 20.00 Lakh Stand-alone Solar Pumps Benefit available: CFA of 30% of the benchmark cost or the tender cost, whichever is lower, of the stand-alone solar agriculture pump is provided.

Scheme/ Programmes	Incentive presently eligible as per the Scheme
	However, in North Eastern States, Sikkim, Jammu & Kashmir, Ladakh, Himachal Pradesh and Uttarakhand, Lakshadweep and A&N Islands, CFA of 50% of the benchmark cost or the tender cost, whichever is lower, of the stand-alone solar pump is provided. Component C: Solarisation of 15 Lakh Grid Connected Agriculture Pumps including through feeder level solarisation Benefit available: (a) Individual Pump Solarization: CFA of 30% of the benchmark cost or the tender cost, whichever is lower, of the solar PV component will be provided. However, in North Eastern States, Sikkim, Jammu & Kashmir, Ladakh, Himachal Pradesh and Uttarakhand, Lakshadweep and A&N Islands, CFA of 50% of the benchmark cost or the tender cost, whichever is lower, of the solar PV component is provided. (b) Feeder Level Solarization: Agriculture feeders can be solarized by the State Government in CAPEX or RESCO mode with CFA of Rs. 1.05 Crore per MW as provided by MNRE. However in North Eastern States, Sikkim, Jammu & Kashmir, Ladakh, Himachal Pradesh, Uttarkhand, Lakshadweep and Andaman & Nicobar Island, CFA of Rs. 1.75 crore per MW is provided.
f) Green Energy Corridor	GEC Phase-I: CFA of 40 % of DPR cost or awarded cost whichever is lower.
Scheme (for development of intra-state	GEC Phase-II: CFA of 33 % of DPR cost or awarded cost whichever is lower.
transmission system for RE	
projects) g) Biomass Programme	(a) For Briquette/Pellet manufacturing plants: Rs. 9.00 Lakhs/ MTPH
8/	(Maximum CFA- Rs. 45.00 Lakh per project) (b) For Non-Bagasse Cogeneration Projects: Rs. 40 Lakhs/ Megawatt (Maximum CFA- Rs. 5.00 Crore per project)
h) Waste to Energy Programme	(a) for Biogas generation: Rs 0.25 crore per 12000 cum/day (Maximum CFA- Rs.5.00 crore/project)
	 (b) for BioCNG/Enriched Biogas/Compressed Biogas generation: (Maximum CFA- Rs.10 crore/project) (i) BioCNG generation from new Biogas plant- Rs 4.0 Crore per 4800 Kg/day; (ii) BioCNG generation from existing Biogas plant- Rs 3.0 Crore per 4800 Kg/day;
	(c) for Power generation based on Biogas (Maximum CFA- Rs. 5.00 crore/project):- (i) Power generation from new biogas plant: Rs 0.75 Crore per MW
	(ii) Power generation from existing biogas plant: Rs 0.5 crore / MW
	(d) for Power generation based on bio & agro-industrial waste (other than MSW through incineration process):- Rs. 0.40 crore/MW (Maximum CFA - Rs.5.00 Crore/Project)
	 (e) for Biomass Gasifier for electricity/ thermal applications: i) Rs. 2,500 per kW_e with duel fuel engines for electrical application ii) Rs. 15,000 per kW_e with 100% gas engines for electrical application iii) Rs. 2 lakh per 300 kW_{th} for thermal applications.
	 Note: In case, the Waste to Energy plants are set up in Special Category States (NE Region, Sikkim, Himachal Pradesh and Uttarakhand), Jammu & Kashmir, Ladakh, Lakshadweep and Andaman & Nicobar Islands, the eligible CFA would be 20% higher than Standard CFA pattern given above. Biogas/BioCNG/Power (biogas based) generation plants based on cattle dung as main feedstock set up by Gaushalas independently or through joint ventures/partnerships will be eligible for 20% higher

Scheme/ Programmes	Incentive presently eligible as per the Scheme
	CFA than Standard CFA pattern given above. These Gaushalas
	(Shelters) should be registered with the respective State Government.
i)Biogas Programme	a) Rs. 9800/- to Rs. 70,400/- per plant based on size of the plant in
	cubic meter for small biogas plants (1-25 cubic meter/day plant capacity);
	b) Rs. 35,000/- to Rs. 45,000/- per kilowatt for power generation and Rs. 17,500 /- to Rs. 22,500/- per kilowatt equivalent for thermal applications
	(25 - 2500 cubic meter/day plant capacity) .
	The eligible CFA would be 20% higher than Standard CFA in for NER, Island, Registered Gaushalas and SC/ST beneficiaries
j) R&D programme	The Ministry encourages research and technology development proposals
J/ 1 1 1 3 1	in collaboration with the industry and provides upto 100% financial
	support to Government/non-profit research organizations and upto 50-
	70% to Industry, Start-ups, Private Institutes, Entrepreneurs and
	Manufacturing units.
k) National Green Hydrogen	The SIGHT scheme guidelines under the Mission have been notified for
Mission	Electrolyser Manufacturing and Mode-I for Green Hydrogen production.
	SIGHT programme for Electrolyser manufacturing has an allocation of
	Rs. 4440 crores by 2029-30. The incentives start from Rs. 4440 per kW in
	the first year and end at Rs. 1480 per kW in the fifth year.
	SIGHT programme for Green Hydrogen production (Mode-I) provides
	incentives for Green Hydrogen production, which are capped at Rs. 50/kg
	, Rs. 40/kg and Rs. 30/kg for the first, second and third year respectively.