

GOVERNMENT OF INDIA
MINISTRY OF NEW AND RENEWABLE ENERGY
LOK SABHA
UNSTARRED QUESTION NO. 3094
ANSWERED ON 16.12.2021

WATER PUMPS INSTALLED UNDER PM-KUSUM

3094. COL. RAJYAVARDHAN RATHORE

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

- (a) the number of solar water pumps that have been installed under the Pradhan Mantri Kisan Urja Suraksha evam Utthaan Mahabhiyan (PM-KUSUM) scheme since its inception, State and year-wise including districts of Rajasthan;
- (b) the number of solar water pumps manufactured in the country during the last five years;
- (c) the steps taken by the Government to increase the country's solar water pump manufacturing capacity;
- (d) whether the Government has a ceiling limit on number of solar water pumps in a district depending on its ground water level;
- (e) the details of ground water table and the number of solar powered water pumps installed in the State of Rajasthan, district-wise;
- (f) whether the Government has requisite surveillance mechanisms and is taking active measures to ensure solar water pumps do not disrupt the ground water table in districts with depleted levels of ground water; and
- (g) the other steps taken/being taken by the Government to decentralised solar power production?

ANSWER

THE MINISTER OF NEW & RENEWABLE ENERGY AND POWER

(SHRI R.K. SINGH)

(a) State-wise year-wise number of standalone solar water pumps installed under Pradhan Mantri Kisan Urja Suraksha evam Utthaan Mahabhiyan (PM-KUSUM) scheme since inception is given at **Annexure-I**. District-wise number of these pumps for Rajasthan is given at **Annexure-II**.

(b) As per the information available from the solar pump suppliers, about 3.50 lakh solar pumps have been manufactured and supplied under various Central Government and State Government programmes during the last five years.

(c) Following provisions of the PM-KUSUM Scheme aim to increase country's solar water pump manufacturing capacity:

- (i) Target of installation or solarisation of 35 lakh pumps through central financial support under the Scheme provides visibility of demand in the coming years.
- (ii) Condition of domestic content requirement for participation in Component-B (standalone solar pumps) and Component-C (solarisation of existing agricultural pumps).
- (iii) Direct participation of manufacturers of solar pumps/ solar photovoltaic modules/ solar pump controller either as sole bidder or member of a Joint Venture, in bidding under Component-B and Component-C.

(d) to (f) Under the PM-KUSUM Scheme, there is no limit on number of solar water pumps in a district. However, new solar pumps are not allowed to be installed in areas notified by Central Ground Water Board (CGWB), which monitors and regulates ground water development and extraction. Only the existing diesel pumps can be replaced with solar pumps under Component-B and existing electric pumps can be solarized under Component-C in these areas provided they use micro irrigation techniques to save water. Additionally, to conserve ground water, following provision are included in the PM-KUSUM Scheme:

(i) Preference for installation of standalone solar pumps and solarisation of existing agriculture pumps is given to the farmers using micro irrigation systems or covered under micro irrigation schemes or those who opt for micro irrigation systems.

(ii) The size of standalone solar pump is to be selected on the basis of water table in the area, land covered and quantity of water required for irrigation.

(iii) Farmers have the option to monetize the surplus power generated under individual pump solarisation by selling it to the DISCOM. Further, under feeder level solarisation, farmers are incentivised for electricity consumption below the benchmark consumption.

Details of the ground water table released by CGWB in June, 2021 along with solar pumps installed, district-wise, is placed at **Annexure-III**.

(g) The steps taken/being taken by the Ministry of New and Renewable Energy for decentralised solar power production include the following:

(i) Installation of grid-connected solar power plants up to 2 MW capacity under Component-A of PM-KUSUM Scheme

(ii) Installation of standalone solar pumps under Component-B and solarisation of grid-connected agriculture pumps including through feeder level solarisation under Component-C of PM-KUSUM Scheme by providing Central Financial Assistance (CFA).

(iv) Promotion of rooftop solar under Solar Rooftop Phase II Programme by providing CFA in residential sector and incentives to DISCOMs.

(v) Off-grid & Decentralized Solar PV Applications Programme, which has provided financial support for installation of solar street lights and off-grid solar power plants, and distribution of solar study lamps.

Annexure-I referred to in reply to part (a) of Lok Sabha Un-starred Question No. 3094 for 16/12/2021 regarding 'Water Pumps Installed under PM-KUSUM'

State-wise details of solar pumps reported installed in the country under Component-B of PM-KUSUM (as on 13.12.2021)

S. No.	State	Solar Pumps Installed (Nos.)
1	Gujarat	450
2	Haryana	22040
3	Himachal Pradesh	180
4	Jharkhand	6711
5	Karnataka	314
6	Madhya Pradesh	7234
7	Manipur	10
8	Meghalaya	35
9	Odisha	566
10	Punjab	6037
11	Tamil Nadu	1016
12	Tripura	421
13	Rajasthan	23892
14	Uttar Pradesh	6384
	Total	75290

Annexure-II referred to in reply to part (a) of Lok Sabha Un-starred Question No. 3094 for 16/12/2021 regarding 'Water Pumps Installed under PM-KUSUM'

District wise Solar Water pumps reported installed under PM-KUSUM Component B Rajasthan State

S.No.	District	Solar Pumps Installed (Nos.)
1	Ajmer	907
2	Alwar	546
3	Banswara	185
4	Baran	124
5	Barmer	388
6	Bharatpur	189
7	Bhilwara	1000
8	Bikaner	2346
9	Bundi	631
10	Chittaurgarh	467
11	Churu	2448
12	Dausa	311
13	Dhaulpur	20
14	Dungarpur	113
15	Hanumangarh	890
16	Jaipur	3422
17	Jaisalmer	755
18	Jalore	1239
19	Jhalawar	53
20	Jhunjhunu	495
21	Jodhpur	138
22	Karauli	102
23	Kota	70
24	Nagaur	259
25	Pali	246
26	Pratapgarh	279
27	Rajsamand	310
28	Sawai Madhopur	579
29	Sikar	657
30	Sirohi	770
31	Sri Ganganagar	1902
32	Tonk	1548
33	Udaipur	503
	Total	23892

Annexure-III referred to in reply to part (d) to (f) of Lok Sabha Un-starred Question No. 3094 for 16/12/2021 regarding 'Water Pumps Installed under PM-KUSUM'

District-wise details of extractable water resource and solar pumps installed under Component-B of PM-KUSUM

S.No	Name of District	Total Annual Extractable Resource of Assessed Units (in Mcm)	Solar Pumps Installed (Nos.)
1	Ajmer	372.08	907
2	Alwar	617.87	546
3	Banswara	182.56	185
4	Baran	623.87	124
5	Barmer	339.74	388
6	Bharatpur	298.16	189
7	Bhilwara	388.77	1000
8	Bikaner	344.85	2346
9	Bundi	303.53	631
10	Chittaurgarh	388.33	467
11	Churu	116.11	2448
12	Dausa	246.88	311
13	Dhaulpur	231.81	20
14	Dungarpur	177.61	113
15	Hanumangarh	200.81	890
16	Jaipur	699.44	3422
17	Jaisalmer	85.05	755
18	Jalor	505.61	1239
19	Jhalawar	497.14	53
20	Jhunjhunu	223.48	495
21	Jodhpur	343.03	138
22	Karauli	308.25	102
23	Kota	449.21	70
24	Nagaur	488.24	259
25	Pali	296.13	246
26	Pratapgarh	201.79	279
27	Rajsamand	103.5	310
28	Sawai Madhopur	343.19	579
29	Sikar	353.29	657
30	Sirohi	247.03	770
31	Sri Ganganagar	446.12	1902
32	Tonk	370.32	1548
33	Udaipur	279.81	503