GOVERNMENT OF INDIA MINISTRY OF WATER RESOURCES, RIVER DEVELOPMENT & GANGA REJUVENATION

LOK SABHA

UNSTARRED QUESTION NO. 1527

ANSWERED ON 24.11.2016

NEW TECHNOLOGIES FOR RAIN WATER HARVESTING

1527. SHRI P. KUMAR

Will the Minister of WATER RESOURCES, RIVER DEVELOPMENT AND GANGA REJUVENATION be pleased to state:

- (a) whether adequate measures have been undertaken for effective implementation of rain water harvesting programmes, if so, the details thereof;
- (b) the details of financial assistance granted to various States including Tamil Nadu during the last three years and the current year, State-wise;
- (c) the existing technologies being used for rain water harvesting; and
- (d) whether the Government proposes to implement any new technique for rain water harvesting and if so, the details thereof?

ANSWER

THE MINISTER OF STATE FOR WATER RESOURCES, RIVER DEVELOPMENT AND GANGA REJUVENATION

(DR. SANJEEV KUMAR BALYAN)

- (a) Government has taken several steps for the purpose of rain water harvesting programmes as below:
 - The National Water Policy (2012) formulated by Ministry of Water Resources, RD & GR, interalia, advocates conservation, promotion and protection of water and highlights the need for augmenting the availability of water through rain water harvesting, direct use of rainfall and other management measures. The National Water Policy (2012) has been forwarded to all State Governments/ UTs and concerned Ministries/ Departments of Central Government for adoption.
 - This Ministry has circulated a Model Bill to all the States/UTs to enable them to enact suitable ground water legislation for its regulation and development which includes provision of rain water harvesting. So far, 15 States/UTs have adopted and implemented the ground water legislation on the lines of Model bill. 30 States/UTs have made rain water harvesting mandatory by enacting laws or by formulating rules & regulations or by including provisions in Building bye-laws or through suitable Government Orders.
 - CGWB has also prepared a conceptual document entitled "Master Plan for Artificial Recharge to Ground Water in India" during 2013, involving ground water scientists/experts. The Master Plan envisages construction of 1.11 crore rain water harvesting and artificial recharge structures in the Country at an estimated cost of Rs. 79,178 Crores to harness 85 BCM (Billion Cubic

- Metre) of water. The augmented ground water resources will enhance the availability of water for drinking, domestic, industrial and irrigation purpose. The Master Plan has been circulated to all State Governments for implementation.
- The Department of Rural Development has prioritized work related with Natural Resources Management (including water harvesting) under MGNREGA and has issued a joint framework with the Ministry of Water Resources and Department of Land Resources. For FY 2016-17, the States have taken up a target of 8,82,325 farm ponds.
- CGWB has taken up Aquifer Mapping and Management programme during XII Plan, under the scheme of Ground Water Management and Regulation. The Aquifer Mapping is aimed to delineate aquifer disposition and their characterization for preparation of aquifer/area specific ground water management plans with community participation.
- CGWB has been organizing mass awareness programmes in the Country to promote rain water harvesting and artificial recharge to ground water.
- Ministry of Urban Development has circulated its Model Building Bye-Laws (2016) to all State Governments which, inter-alia, incorporates provisions for Rain Water Harvesting.
- Ministry of Environment, Forests and Climate Change have merged two separate programmes, namely, National Lake Conservation Plan (NLCP) and National Wetland Conservation Programme (NWCP) into a new Integrated Scheme of National Plan for Conservation of Aquatic Eco-Systems (NPCA) for conservation and management of identified lakes and wetlands in the country.
- (b) Under MGNREGS (Mahatma Gandhi National Rural Employment Guarantee Scheme), Rainwater Harvesting structures, watershed management works and renovation of traditional water bodies are undertaken to improve the ground water situation. To bring about the convergence among the schemes-MGNREGS, Pradhan Mantri Krishi Sinchayee Yojna (PMKSY) and Integrated Watershed Management Programme (IWMP), the Ministry of Rural Development has developed Natural Resource Management Framework under MGNREGS within the overall framework of PMKSY. The State-UT-wise details of amount released under the MGNREGS during the last three years and the current year is indicated in **Annexure-I.**
- (c)&(d) The existing techniques for rain water harvesting are percolation tanks, check dams, cement plugs, roof top rainwater harvesting structures etc. Further, Geographic Information System (GIS) technology, a map based advanced tool integrating various pieces of thematic information to evolve solutions for management of water resources is being used for rain water harvesting. As per information received from the State Governments, Chhattisgarh, Tripura, Meghalaya, Telangana, Tamil Nadu, West Bengal have adopted GIS based technology for harvesting rainwater.

Annexure referred in reply to Part (b) of the Lok Sabha Unstarred Q.No. 1527 for reply on 24.11.2016 regarding "New Technologies for Rain Water Harvesting"

(Amount in Rs. lakhs)

		Central Release				
Sl.no.	State	2013-14	2014-15	2015-16	2016-17 till 16/11/2016	
1	Andhra Pradesh	475049.00	290314.10	307380.33	355592.02	
2	Arunachal Pradesh	13852.67	2704.16	4395.10	13076.40	
3	Assam	57349.95	50023.46	87830.06	76599.04	
4	Bihar	158070.67	95968.24	102412.26	133038.45	
5	Chhattisgarh	144602.31	150570.49	106341.30	183272.13	
6	Gujarat	33530.02	35442.93	30598.72	52126.32	
7	Haryana	37687.81	16715.29	12470.72	15007.75	
8	Himachal Pradesh	47797.09	35542.86	39610.32	26172.66	
9	Jammu And Kashmir	60315.73	52171.08	55801.83	73611.03	
10	Jharkhand	62143.28	72433.41	97879.90	135645.56	
11	Karnataka	159606.81	171687.07	99155.27	149754.84	
12	Kerala	127710.93	158758.02	152633.88	123754.82	
13	Madhya Pradesh	183982.44	245163.12	236732.20	252252.95	
14	Maharashtra	115292.02	79951.77	123834.73	143949.27	
15	Manipur	23100.00	21997.13	25532.29	27723.41	
16	Meghalaya	27106.21	27785.90	22182.56	55560.99	
17	Mizoram	24474.27	11141.23	28517.36	6534.33	
18	Nagaland	29214.80	11305.27	26665.95	50152.80	
19	Odisha	75752.84	103530.34	147941.05	137306.28	
20	Punjab	22615.48	18948.18	24533.37	39318.16	
21	Rajasthan	205943.32	297609.87	269583.23	357159.15	
22	Sikkim	10684.17	7386.41	8623.44	9011.21	
23	Tamil Nadu	469021.12	378180.33	547037.47	330298.08	
24	Telangana		191996.00	182484.92	149993.87	
25	Tripura	94366.49	63662.48	135894.19	79541.43	
26	Uttar Pradesh	289639.01	251341.40	269569.44	274195.21	
27	Uttarakhand	33000.50	28636.22	45076.65	41170.23	
28	West Bengal	289438.19	374495.29	471174.20	394528.98	
29	Andaman And Nicobar	1918.10	1301.94	1035.72	636.97	
30	Dadra & Nagar Haveli	NR	NR	NR	NR	
31	Daman & Diu	NR	NR	NR	NR	
32	Goa	205.86	137.95	246.82	111.27	
33	Lakshadweep	16.93	45.06	11.85	0.00	
34	Puducherry	879.98	739.69	1292.57	300.15	
	Total	3274368.00	3247686.69	3664479.70	3687395.74	