GOVERNMENT OF INDIA MINISTRY OF WATER RESOURCES, RIVER DEVELOPMENT & GANGA REJUVENATION LOK SABHA UNSTARRED QUESTION NO. 909 ANSWERED ON 21.07.2016

DECREASE IN GROUND WATER LEVEL

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

(a) whether the quantity and quality of ground water has decreased in most parts of the country and pollution indicators have gone beyond the maximum limit prescribed by Bureau of Indian Standards;

(b) if so, the details of ground water contamination indicators, State/UT-wise;

(c) whether the Government has worked with any State/UT Government to prepare plan/programme to provide Potable drinking water to all the people of villages and cities, where ground water is found contaminated;

(d) if so, the short term and long term steps taken by the Government to ensure that the entire population gets safe water for use;

(e) the details of the measures the Government has taken/proposes to take to increase the efficient/optimal usage of water in domestic as well as industrial sectors and the outcome of the said measures on the water availability in the country; and

(f) whether the Government has taken steps to implement any scheme for Artificial Recharge to ground water in India, if so, the details thereof along with the funds allocated for the purpose and the status of their utilization?

ANSWER

THE MINISTER OF STATE FOR WATER RESOURCES, RIVER DEVELOPMENT AND GANGA REJUVENATION (DR. SANJEEV KUMAR BALYAN)

(a) & (b) Central Ground Water Board (CGWB) and State Ground Water Organizations jointly assess replenishable ground water resources of the Country periodically. As per the last two assessments, carried out during the year 2009 and 2011, the total annual replenishable ground water resource in the Country is around 431 Billion Cubic Metres (BCM) and 433 BCM

respectively. The figures indicate that there is no significant change in quantity of replenishable ground water in most parts of the Country.

Ground water quality data generated by Central Ground Water Board (CGWB) indicates that ground water has concentration higher than the norms, prescribed by the Bureau of Indian Standards, in various parts of the Country, as per the following details :

Sl.	Contamination &	No. of	Sl.	Contamination &	No. of
No.	Pollution Hazard	States/UTs	No.	Pollution Hazard	States/UTs
1.	Arsenic	10	4.	Iron	26
2.	Fluoride	20	5.	Heavy Metals (Lead,	15
				Chromium & Cadmium)	
3.	Nitrate	21			

(c) & (d) Under the scheme of National Rural Drinking Water Programme (NRDWP) of the Ministry of Drinking Water & Sanitation (MoDWS), 20% of the allocated funds are earmarked for water quality problems. Further, the States may also utilize up to 67% of funds released under NRDWP for improving water quality of ground and surface water. As a long term measure, MoDWS has advised all the State Governments to provide piped water supply from alternate safe sources to all water quality affected habitations with priority to cover Fluoride and Arsenic affected habitations. Since these mega schemes take a long gestation period for commissioning, the States have been advised to set up community water treatment plants in all the remaining Arsenic, Fluoride, Heavy Metals, toxic elements, pesticides and fertilizers affected habitations as a short term measure and provide 8-10 lpcd (litre per capita per day) of safe drinking water on or before March, 2017.

Further, CGWB carries out exploratory drilling to delineate contaminant free aquifer zones and successful exploratory wells are handed over to the concerned State Agencies for utilization. CGWB also provides technical guidance to State Agencies in tackling the problem of water quality.

(e) Measures taken up the Central Government to increase the efficient/optimal usage of water in the country:

- "Master Plan for Artificial Recharge to Ground Water in India" has been prepared, which envisages construction of different types of Artificial Recharge and Rainwater Harvesting structures in the Country.
- The 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.
- CGWB has taken up Aquifer Mapping and Management programme during XII Plan, under the scheme of Ground Water Management and Regulation.
- This Ministry has also launched 'Jal Kranti Abhiyan' (2015-16 to 2017-18) in order to consolidate water conservation and management in the Country through a holistic and integrated approach involving all stakeholders, making it a mass movement. 'Jal Gram Yojana' component of 'Jal Kranti Abhiyan' envisages selection of two villages in every

district, preferably 'over-exploited' or facing acute water scarcity, as 'Jal Grams' to ensure optimum and sustainable utilization of water.

- Ministry of Urban Development in its Draft Model Building Bye-Laws (2015) has incorporated a Chapter on Provision of Rain Water Harvesting.
- Special focus is given through Mahatma Gandhi National Rural Employment Guarantee Act (MGNREGA) for water conservation and water harvesting structures to augment ground water. In addition, priority has been given for construction of farm ponds in the year 2016-17 to harvest rain water.
- Central Ground Water Authority (CGWA) has issued advisory to States/ Union Territories and Ministry of Urban Development to take necessary measures for adopting rain water harvesting/ artificial recharge in all the Government buildings. 30 States/UTs have made rain water harvesting mandatory by enacting laws or by formulating rules & regulations or by including suitable provisions in Building bye-laws or through suitable Government Orders.
- CGWA issues 'No Objection Certificate' (NOC) for withdrawal of ground water subject to implementation of ground water recharge measures as per the criteria given below :

Category of assessment unit based on ground water development	Recharge measures to be adopted for Industries/infrastructure /mining units (Other than water intensive industries)	Recharge measures to be adopted for water intensive industries viz packaged drinking water, soft drink industries, distilleries, breweries, paper, etc
Safe	Recharge measures has to be adopted	Recharge quantity needs to be 50% of ground
	in the project area	water withdrawal
Semi- Critical	Recharge quantity needs to be 50%	Recharge quantity needs to be 100% of ground
	of ground water withdrawal	water withdrawal
Critical	Recharge quantity needs to be 100%	Recharge quantity needs to be 200% of ground
	of ground water withdrawal	water withdrawal
Over- Exploited	Recharge quantity needs to be 200%	No permission for Industries under this
	of ground water withdrawal	category.

(f) During XI Plan, Demonstrative Artificial Recharge Projects were taken up under Central Sector Scheme "Ground Water Management & Regulation". Under the scheme, 133 demonstrative recharge projects costing Rs. 99.87 crore were approved for construction of recharge structures in various States/UTs with an anticipated annual recharge to ground water at about 55.20 MCM. The scheme on Artificial Recharge project has been discontinued during the XII Plan period. Till date, Rs. 92.70 crore has been released.
