

**GOVERNMENT OF INDIA
AGRICULTURE
LOK SABHA**

UNSTARRED QUESTION NO:2501

ANSWERED ON:04.08.2015

Adverse Impact of Climate Change on Agricultural Production

Patel Smt. Jayshreeben ;Rai Shri Prem Das

Will the Minister of AGRICULTURE be pleased to state:

- (a) whether the Government has conducted/sponsored any study to assess the impact of climate change on agricultural production in the country including Himalayan region;
- (b) if so, the details of findings thereof;
- (c) whether the Government has implemented schemes to address the adverse impact of climate change on agriculture;
- (d) if so, the details thereof including the funds allocated/released/utilised during each of the last three years and the current year, State and scheme-wise; and
- (e) whether the Indian Council of Agricultural Research (ICAR) has established a strong linkage with the CGIAR institution for research and development activities to enhance productivity in the agriculture sector and if so, the details thereof?

Answer

MINISTER OF STATE IN THE MINISTRY OF AGRICULTURE
(DR. SANJEEV KUMAR BALYAN)

(a) Yes, Madam.

(b) The Indian Council of Agricultural Research (ICAR) has conducted climate change impact analysis on crop yields for the whole country including Himalayan region using crop simulation models (INFO-CROP and HAD CM3). Reduction in crop yields has been projected for irrigated maize, wheat, irrigated and rainfed rice to the extent of 18, 6, 4 and 6 per cent respectively by 2020. The Indian Network for Climate Change Assessment (INCCA) of the Ministry of Environment & Forests (MoEF) has also assessed the impact of climate change in the overall environment of Himalayan region.

(c) & (d): Yes, Madam. The Government has taken a major initiative by launching National Initiative on Climate Resilient Agriculture (NICRA) in 2011 to adapt and mitigate the impact of global climate change on Indian agriculture. Besides, the Government is also addressing the issue of climate change through National Mission on Sustainable Agriculture (NMSA). Climate resilient interventions have been embedded and mainstreamed into Missions/ Programmes/Schemes of Department of Agriculture & Cooperation (DAC) through a process of restructuring and convergence. Further, climate resilient interventions are implemented by taking one representative village in each of 130 vulnerable districts of the country under Technology Demonstration Component (TDC) of National Initiative on Climate Resilient Agriculture (NICRA). The state wise allocation of budget is annexed.

(e) The ICAR institutes have strong linkages with CGIAR institutes and are continuously engaged in research and development activities to generate location- specific technologies and technology packages to enhance productivity in agriculture sector.
