

GOVERNMENT OF INDIA
MINISTRY OF AGRICULTURE AND FARMERS WELFARE
DEPARTMENT OF AGRICULTURE AND FARMERS WELFARE

LOK SABHA
UNSTARRED QUESTION NO. 2237
TO BE ANSWERED ON 15th MARCH, 2022

PROTECTION OF FARMERS AGAINST CLIMATE CHANGE

2237. SHRI SHYAM SINGH YADAV

Will the Minister of AGRICULTURE AND FARMERS WELFARE कृषि और किसान कल्याण मंत्री be pleased to state:

- a) the details of the steps taken by the Government to protect farmers against climate change;
- b) the steps taken by the Government to promote climate friendly agriculture;
- c) whether the Government is devising any mechanism to measure effects of climate change on agriculture; and
- d) if so, the details thereof;

ANSWER

THE MINISTER OF AGRICULTURE AND FARMERS WELFARE

कृषि और किसान कल्याण मंत्री (SHRI NARENDRA SINGH TOMAR).

(a & b) National Mission for Sustainable Agriculture (NMSA) is one of the Missions within the National Action Plan on Climate Change (NAPCC). The mission aims to evolve and implement strategies to make Indian agriculture more resilient to the changing climate. NMSA was approved for three major components i.e. Rainfed Area Development (RAD); On Farm Water Management (OFWM); and Soil Health Management (SHM). Subsequently, four new programmes were introduced namely Soil Health Card (SHC), Paramparagat Krishi VikasYojana (PKVY), Mission Organic Value Chain Development in North Eastern Region (MOVCDNER) and Sub Mission on Agroforestry (SMAF). During 2015-16, Pradhan Mantri Krishi Sinchayee Yojana (PMKSY) was operationalised wherein the OFWM

component of NMSA was subsumed under Per Drop More Crop (PDMC) component of PMKSY. In addition to aforementioned programmes under NMSA, Restructured National Bamboo Mission (NBM) was launched in April 2018.

To meet the challenges of sustaining domestic food production in the face of changing climate, Indian Council of Agricultural Research (ICAR), Ministry of Agriculture and Farmers Welfare, Government of India launched a flagship network project 'National Innovations in Climate Resilient Agriculture' (NICRA) in 2011. The project is being implemented through different components viz., strategic research on adaptation and mitigation, demonstration of technologies on farmers' fields in 151 clusters of villages one each from climatically vulnerable districts and creating awareness among farmers and other stakeholders to minimize the climatic change impacts on agriculture. The project aims to develop and promote climate resilient technologies that help the districts and regions prone to extreme weather conditions like droughts, floods, frost, heat waves, etc., to cope with such extremes.

(c & d) The impact of climate change on crops was studied by ICAR under National Innovations in Climate Resilient Agriculture (NICRA) project using integrated simulation modeling framework. In the absence of adoption of adaptation measures, climate change projections are likely to affect yields of crops. Besides the modeling studies, on station experiments by different research institutes and KVKs under NICRA network across the country are studying the impact of extreme weather events on different crops and adaptation measures to minimize the loss.
