

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

LOK SABHA
UNSTARRED QUESTION NO- 4403
TO BE ANSWERED ON 23rd March, 2021

USE OF BIO- PESTICIDES

4403. SHRI ANURAG SHARMA:
SHRI C.N. ANNADURAI:
SHRI VIJAY KUMAR DUBEY:
SHRI GAJANAN KIRTIKAR:
SHRI REBATI TRIPURA:
SHRI GAUTHAM SIGAMANI PON:
SHRI DHANUSH M. KUMAR:

Will the Minister of Agriculture and Farmers Welfare कृषि एवं किसान कल्याण मंत्री be pleased to state:

- (a) the details of the market share of bio-pesticide in the pesticide market of the country;
- (b) the total number of Farmers Field Schools organized to sensitize farmers on bio-pesticides as an alternative to chemical pesticides;
- (c) whether the Government proposes to formulate a concrete policy to enhance Research and Development activities in bio-pesticides sector and if so the details thereof;
- (d) whether the Indian Council of Agricultural Research (ICAR) is also engaged in research for developing bio-control agents as pesticides and if so, the details thereof;
- (e) whether the Government has taken any steps for the awareness of this bio-control agents to farmers and if so, the manner in which the bio-control agents are likely to benefit the farmers; and
- (f) the other steps taken by the Government to formulate a concrete policy to promote the use of bio-pesticides in agriculture so as to enhance the production of toxic/chemical free agri products in the country?

ANSWER

MINISTER OF AGRICULTURE & FARMERS WELFARE
कृषि एवं किसान कल्याण मंत्री (SHRI NARENDRA SINGH TOMAR)

(a): State Governments and Union Territories report data related to consumption of pesticides and bio-pesticides to Central Government. As per the data provided by States, the trend of consumption of chemical pesticides has varied from year to year and State to State; however, during the same period, the use of bio-pesticides is showing increasing

trend. Consumption of bio-pesticides which was 8.5 percent of the total pesticide consumption during 2013-14, has increased to 12.5 per cent during 2019-20.

(b): Ministry of Agriculture and Farmers Welfare is implementing the Sub-Mission on Plant Protection with a mandate to popularize adoption of Integrated Pest Management (IPM) through training and demonstration in crops, inter-alia promotion of biological control approaches in crop protection technology and through Farmer Field Schools and HRD programs. During last 5 years, 2016-17 to 2020-21 (upto February, 2021), 3205 farmer field schools have been organized in the different states of India through Central Integrated Pest Management Centres; wherein 112175 farmers have been trained on latest IPM technologies. Further, a total 989 farmer field schools have been organized by Indian Council of Agricultural Research- National Centre for Integrated Pest Management during 2019-2021. During 2019-20 and 2020-21, a total of 33757 and 45364 Farmer Field Schools have been conducted respectively by different State Governments/ Union Territories viz. Himachal Pradesh, Uttarakhand, Haryana, Punjab, Rajasthan, Gujarat, Uttar Pradesh, Bihar, Karnataka, Kerala, Andhra Pradesh, Telangana, Tamilnadu, Chhattisgarh, West Bengal, Maharashtra, Madhya Pradesh, Assam, Tripura, Goa and Jammu and Kashmir.

(c) & (d): Indian Council of Agricultural Research (ICAR) has reported that different Institutes of ICAR are engaged in Research & Development as well as promotion of bio-control agents as an integral component of Integrated Pest Management (IPM) technology. Several potential bio-control agents have been identified and some of them have been commercialized. Further, 98 species/strains of parasitoids, 23 strains of Entomopathogenic nematodes and 17 predator species are being multiplied at ICAR institutes which are effective at different stages of insect pests.

(e): Different Institutes of Indian Council of Agricultural Research and Central Integrated Pest Management Centers conduct workshops, group meetings, trainings, various HRD programs and activities to promote the use of bio-control agents, bio-pesticides among the farming community. Bio-control agents are mass multiplied in laboratories and released in farmer fields, which reduce the pest infestation and thus avoid crop loss. Farmers are also trained on farm production of Biocontrol agents, Entomo-pathogens and antagonistic fungi & bacteria on their own to reduce the dependency on chemical pesticides.

Further, farmers are made aware about conservation of natural enemies by Central Integrated Pest Management Centers and mass multiplied bio-control agents are released in farmer fields for holistic management of pest & diseases.

(f): The Government is promoting the use of bio-pesticides by implementing Sub-Mission on Plant Protection with a mandate to popularize adoption of Integrated Pest Management in crop protection technology. Bio-pesticides registration has been facilitated with simplified guidelines. Further, a protocol for mass multiplication of bio-control agents at farm level has also been developed in consultation with ICAR and has been circulated to States.
