

**GOVERNMENT OF INDIA  
(MINISTRY OF SCIENCE & TECHNOLOGY)  
(DEPARTMENT OF BIOTECHNOLOGY)**

LOK SABHA

STARRED/UNSTARRED QUESTION NO.1156  
TO BE ANSWERED ON 23.11.2016

**Biotech-Kisan and Cattle Genomics**

1156. SHRI R. PARTHIPAN

**Will the Minister of SCIENCE AND TECHNOLOGY be pleased to state:**

- (a) whether the Government has launched two new schemes Biotech-KISAN and Cattle Genomics recently and if so, the details thereof along with major features of both of these schemes;
- (b) whether this will boost rural economy;
- (c) if so, the details thereof;
- (d) whether the schemes are being implemented in all the States; and
- (e) if so, the details thereof?

ANSWER

Minister of State for Science & Technology and Earth Sciences

(Sh. Y.S. Chowdary)

- (a)** Yes Madam, the Department of Biotechnology (DBT), Ministry of Science and Technology has launched two new schemes on Biotech-KISAN and Cattle Genomics.

The Biotech-Krishi Innovation Science Application Network (Biotech-KISAN) aims to understand the problems of water, soil, seed and market faced by the farmers and provide simple solutions to them. The scheme will be implemented in 15 agro-climatic zones of India in phased manner with the objective:

- Linking available science and technology to the farm by first understanding the problem of the local farmer and provide solutions to those problems.
- The working together, in close conjunction, of scientists and farmers is the only way to improve the working conditions of small and marginal farmers.

- This programme aims to work with small and marginal farmers especially the woman farmer for better agriculture productivity through scientific intervention and evolving best farming practices in the Indian context.

The Cattle Genomics scheme :

Livestock contributes significantly to the livelihood of rural poor in our country and has enormous potential to reduce poverty. There is a predicted increase in demand for animal food products in India by 2020. Genetic improvement of livestock through traditional selection for increasing livestock productivity has major limitations. To overcome these, genomic selection has played a crucial role in livestock industry globally.

The Govt. of India has, therefore, decided to work on genome sequencing of indigenous cattle breeds and development of high density SNP chips representing SNPs from all registered cattle breeds of India by involving various stake holders. This will reduce the cost and time interval of breeding programme in future and productivity of indigenous cattle will be enhanced. Initial work on cattle genomics will be carried out in selective research institutions.

- (b) and (c) Yes, the schemes are designed to increase productivity and yield from farm by active scientific interventions and education of scientific solutions. The Biotech-KISAN will also provide fellowships to farmers.
- (d) and (e) The Biotech-KISAN will be implemented in the 15 agro-climatic zones, which will cover all the states. The work on cattle genomics will be carried out initially in selected research institutions.