

**GOVERNMENT OF INDIA  
AGRICULTURE  
LOK SABHA**

UNSTARRED QUESTION NO:74  
ANSWERED ON:23.02.2010  
EXPENDITURE ON R& D IN AGRICULTURE  
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**Will the Minister of AGRICULTURE be pleased to state:**

- (a) the amount spent for research and development in Agriculture in the country during each of the last three years, State-wise;
- (b) the details of the research being carried out in different agricultural institutes in the country during the current year alongwith the achievements thereof;
- (c) whether the results achieved are satisfactory; and
- (d) if not, the reaction of the Government thereto?

**Answer**

THE MINISTER OF STATE IN THE MINISTRY OF AGRICULTURE AND MINISTER OF STATE IN THE MINISTRY OF CONSUMER AFFAIRS, FOOD & PUBLIC DISTRIBUTION (PROF. K.V. THOMAS)

(a) The DARE/ICAR do not allocate funds State-wise because its various research institutes/projects are being operated each with a specific mandate irrespective of State or Region specificity. The details of the Expenditure of the ICAR during the last three years are as under:-

(Rs. in Crore)	
Year	Actual Expenditure
2006-07	1368
2007-08	1317
2008-09	1652

(b) The different agricultural institutes functioning under DARE/ICAR are mainly carrying out their research activities based on the following thrust areas/research priorities:-

Enhancing Agricultural Profitability, Productivity & Resource Use Efficiency Eco-region specific technology generation and extension continuum Systems perspective in research and education Enhancement of water productivity and nutrient use efficiency Climate change and Management of stresses Land use systems for multi-functional agriculture Diagnostics, vaccines and delivery systems Value-added product development, food safety and quality assurance Bio-prospecting, Bio-fuels, Bio-fortification, Bio-safety, Bio-security and Bio-fertilization Genetic resources conservation and utilization IT-based decision support systems for technology transfer Human resource development in niche areas Enabling mechanisms for enhancing R&D productivity IP management and public-private partnership

The salient accomplishments during the year 2009-10 are as under:-

Crop Science: 2 hybrids and 8 high yielding varieties of rice released for different agro-eco systems; 8 wheat varieties released for different eco-systems; 14 maize hybrids and 2 composites released. The total seed production in agricultural crops including nuclear seed, breeder seed, foundation seed, quality seed and planting materials is 634163 q whereas breeder seed of centrally released varieties of seed crops is 73932.91 q. Horticulture: 4 location specific coconut varieties/hybrids released; Kufri Himsona and Kufri Khyati varieties of potato released; 3 onion lines were released. Natural Resource Management: First drought tolerant variety of Horsegram mutant-18R released; Developed farming system module on micro watershed basis for small and marginal land holdings of red soils region of Andhra Pradesh. Agricultural Engineering: Natural dye from biomass (henna and Chicory waste) developed along with its application in textiles; developed packaging system for short-term storage of banana with diffusion channel technique; supplied 1409 prototypes to various agencies. Animal Science: Frieswal cattle yielded 3293 kg milk in 300 days with a peak yield of 15kg; egg production recorded up to 64 wks of age ranged from 201-243 eggs on hen housed basis in pure strains and HI strain cross; 52% methane reduction achieved with tree leaves in cattle, cloned buffalo calf `Garima` produced using hand guided technique. Fisheries: Off season spawning of mrigal achieved; 3 feed formulations with locally available low cost ingredients developed. Agricultural Education: 220 Experiential Learning units for skill oriented hands-on training for students established in the AUs; 30 `Niche Area of excellence` established; ICAR International Fellowship for Ph.D. program introduced. Intellectual Property Research & Technology Management: 47 patents granted and 38 patents applications in process.

Transfer of Technology

The Department is making concerted efforts to conduct on-farm trials to identify the location specificity of technologies under various farming systems, frontline demonstrations to establish the production potential of improved agricultural varieties/technologies on the

farmers' fields, training of farmers to update their knowledge and skills. This task is being carried out through already established 570 Krishi Vigyan Kendras (KVKs) and the XI plan target is to establish 667 i.e. atleast one KVK in each of the rural districts of the Country. During 2009-10 (till date) 85871 frontline demonstrations were held and 106.16 lakh farmers participated in extension activities.

(c) & (d): The Department has made significant achievements and this could be judged from the fact that over the years the food grain production has increased by 4 times, horticultural crops and milk by 6 times, fish by 9 times and eggs by 27 times since 1950-51. During the year 2008-09, the country harvested a record 230 million tones of food grains, produced 6.87 million tones of fish and more than 100 million tones of milk.