GOVERNMENT OF INDIA MINISTRY OF SCIENCE & TECHNOLOGY DEPARTMENT OF SCIENCE & TECHNOLOGY LOK SABHA UNSTARRED QUESTION. NO.4209 TO BE ANSWERED ON 13/12/2019

RESEARCH IN ARTIFICIAL INTELLIGENCE

4209. DR. VISHNU PRASAD M.K.: SHRIMATI KIRRON KHER: DR. SHRIKANT EKNATH SHINDE:

Will the Minister of SCIENCE AND TECHNOLOGY विज्ञान और प्रौद्योगिकी मंत्री be pleased to state:

- (a) whether the Government plans to improve research in Artificial Intelligence (AI) and Information Technology (IT) by promoting/encouraging competent research in this field, if so, the details thereof and the plans formulated in consultation with other Ministries;
- (b) the current level of financial and institutional support provided by the Government for research in AI and IT;
- (c) whether there has been increased allocation in the budget for research in AI and IT, if so, the details thereof and the funds allocated in these fields during the last three years;
- (d) whether the Government provides any support to individual/ private companies filing patents in the field of AI and IT and if so, the details thereof; and
- (e) the other steps taken by the Government to boost the research in the said fields?

ANSWER

MINISTER OF HEALTH AND FAMILY WELFARE; MINISTER OF SCIENCE AND TECHNOLOGY AND MINISTER OF EARTH SCIENCES (DR HARSH VARDHAN)

स्वास्थ्य और परिवार कल्याण मंत्री; विज्ञान और प्रौद्योगिकी मंत्री; और पृथ्वी विज्ञान मंत्री डॉ. हर्ष वर्धन

- (a) The details of action taken to improve Research in AI and IT by government are as under:
 - (i) Artificial Intelligence (AI) and Information Technology (IT) are the focused research areas under Department of Science & Technology initiated National Mission on Interdisciplinary Cyber-Physical Systems (NM-ICPS). The Mission has strategies to improve research in Artificial Intelligence (AI) and Information Technology (IT) by creating dedicated Innovation Hubs. The Mission was formulated in consultation with Ministry of Electronics and Information Technology, NITI Ayog, Defence Research and Development Organization (DRDO), Department of Heavy Industry, Department of Industrial Policy & Promotion and Department of Space.
 - (ii) NITI Aayog, after extensive consultation with various Ministries and leading academicians, institutions, practitioners and industry players, has released India's National Strategy for Artificial Intelligence in June 2018. It is also associated with formalizing the institutional mechanism and funding framework to implement the recommendations of the National AI Strategy. The Strategy has outlined India's proposed efforts in research, development, adoption and skilling in AI. The major recommendations of the Strategy include, inter alia, setting up Centres of Research Excellence (CORE) focused on fundamental research,

International Centres on Transformational AI (ICTAI) focused on applied research, developing a centralized state of the art AI computing infrastructure (AIRAWAT), and pursuing moonshot projects in AI.

- (b) Government has provided Rs 124.00 Crore to Department of Science & Technology for supporting research in AI & IT, during the current financial year.
- (c) Yes, Sir. Rs. 1.00 Lakh was allocated to DST during the financial year 2018-19 and Rs.124.00 Crore during the current financial year for conducting research in the field of AI & IT. Further, approval for a National Mission on Interdisciplinary Cyber Physical Systems (NM-ICPS) has been received by DST at a total cost of Rs 3,660.00 Crore for 5 years.
- (d) Yes, Sir.
- (i) Technology Development Board (TDB), a statuary Body under Department of Science & Technology and Technology Information Forecasting and Assessment Council (TIFAC), an autonomous organization under DST support patent filing in all technology fields, including AI and IT, by individuals/private companies.
- (ii) Also, Ministry of Electronics & Information Technology (MeitY) over the years has taken concerted steps to promote, protect and proliferate the culture of IPR especially among the Micro, Small and Medium Enterprises (MSMEs) and technology Start-Ups engaged in hardware manufacturing, software, embedded circuits or other related areas of ICT development in the country. A significant initiative of MeitY has been the "Support for International Patent Protection in E&IT (SIP-EIT)" scheme that encourages international patent filing by Indian MSMEs and Start-Ups so as to encourage innovation and recognize the value and capabilities of global IP.
- (e)(i) National Mission on Interdisciplinary Cyber Physical Systems (NM-ICPS) of the Department of Science & Technology (DST) is implemented through 25 Technology Innovation Hubs created at reputed academic institutes across the country. These Hubs are expected to boost research in AI and IT field in association with Academia, Industry, Central Ministries and State Governments.
- (ii) Ministry of Electronics and Information Technology, Government of India initiated "Visvesvaraya PhD Scheme for Electronics and IT" with an objective to enhance the number of PhDs in Electronics System Design & Manufacturing (ESDM) and IT/IT Enabled Services (IT/ITES) sectors in the country. The research areas supported under the Scheme inter alia include Artificial Intelligence.
