GOVERNMENT OF INDIA
MINISTRY OF EDUCATION
DEPARTMENT OF HIGHER EDUCATION

LOK SABHA
UNSTARRED QUESTION NO. 1211
ANSWERED ON-08/12/2025

National Institute for Aerospace Technology and Research

1211. Shri Shrirang Appa Chandu Barne:
Shri Ravindra Dattaram Waikar:
Shri Naresh Ganpat Mhaske:
Dr. Shrikant Eknath Shinde:
Smt. Bharti Pardhi:

Will the Minister of EDUCATION be pleased to state:

(a) the details of the new aerospace-related courses, departments or centres of excellence introduced in IITs, NITs and other higher educational institutions across the country during the last three years, locations and year-wise;

(b) whether the Government has any proposal under consideration to establish a dedicated National Institute for Aerospace Technology and Research in the country and if so, the details thereof;

(c) the number of students enrolled in aerospace engineering and allied programmes in IITs and other technical institutions during the last three academic years, institution-wise;

(d) the steps taken by the Government in collaboration with ISRO, DRDO, HAL and private industries to provide internship, research and employment opportunities to aerospace students and graduates; and

(e) the measures proposed by the Government to promote indigenous aerospace technology development, strengthen the aerospace job market and position India as a global hub in aerospace innovation and manufacturing?

ANSWER

MINISTER OF STATE IN THE MINISTRY OF EDUCATION
(DR. SUKANTA MAJUMDAR)

(a) to (e): In line with the National Education Policy (NEP) 2020, several institutes—including Indian Institutes of Technology (IITs), National Institutes of Technology (NITs), Indian Institute of Sciences (IISc) Bangalore, Indian Institute of Engineering Science and Technology (IIEST), Shibpur —have broadened their academic

offerings by introducing new undergraduate, postgraduate and doctoral programmes, in the Aerospace domain offering specializations such as space technology, UAV technology, Ballistics, Tracking and Navigation, etc. Some of the institutes have also opened dedicated Aerospace specific departments. Further, Rajiv Gandhi National Aviation University (RGNAU) under Ministry of Civil Aviation has also introduced a 4-year B. Tech programme in Aerospace Engineering.

In order to enhance research efforts in the area of Fluid & Thermal Sciences with involvement of academia, Indian Space Research Organization (ISRO), Department of Space has established a 'Centre of Excellence (CoE) – Research in Fluid & Thermal Sciences' at IIT Madras. Various Institutes including IIT Madras, IIT Roorkee, IIT Kanpur, IIT Bombay and IISc Bangalore have also specialized Centres of Excellence (CoEs) in Aerospace domain. Defence Research and Development Organization (DRDO) has also established 15 DRDO Industry Academia Centres of Excellence in the country including DRDO Industry Academia Centre of Excellence, IIT Bombay (DIA-CoE, IITB), DRDO Industry Academia Centre of Excellence, IISc Bangalore (DIA-RCoE, IISc) and DRDO Industry Academia Centre of Excellence, IIT Hyderabad (DIA-CoE, IITH).

A National Centre for Aerospace Innovation and Research (NCAIR) has been established at IIT Bombay in collaboration with Department of Science and Technology. NCAIR is a collaboration between academia, Government of India and industries aspiring to be a part of the aerospace sector to provide stimulus to the evolution of a vibrant aerospace ecosystem in India. The centre offers doctoral and post-doctoral fellowships to undertake innovative R & D in aerospace manufacturing domain.

To make students industry ready, DRDO's Aeronautical Technical cluster provides aerospace students and graduates opportunities to work on advanced defence technologies through key programmes such as Research Fellowships and a paid Internship Programme, which offers graduate and postgraduate students hands-on exposure to high-impact defence R&D alongside leading experts. HAL, ISRO and other PSUs, DPSUs have also been providing internship opportunities to all IIT/NITs and other students.

Further, the Space-Technology Incubation Centre (S-TIC) has been set up at NIT Agartala and NIT Jalandhar to foster collaboration between industry, academia, and ISRO, supporting R&D initiatives aligned with the Indian Space Programme. NIT Jamshedpur has collaborations with ISRO, DRDO, and HAL and also has an MoU with the Space Applications Centre (SAC) in Ahmedabad.

All India Council for Technical Education (AICTE) through initiatives such as Project PRACTICE 2025 and Faculty Development Programs (FDPs), focuses on enhancing students' practical, job-ready abilities and upskilling faculty in advanced domains, including aerospace and energy.

*****