GOVERNMENT OF INDIA MINISTRY OF ELECTRONICS AND INFORMATION TECHNOLOGY RAJYA SABHA

UNSTARRED QUESTION NO. 2301

TO BE ANSWERED ON: 08.08.2025

INDIGENOUS DEVELOPMENT OF LLMs UNDER INDIAAI MISSION

2301. SMT. RENUKA CHOWDHURY:

Will the Minister of ELECTRONICS AND INFORMATION TECHNOLOGY be pleased to state:

- (a) the total funds sanctioned for the development of indigenous deep tech of Large Language Models (LLMs), as Government aims to develop world-class LLM in the next two years;
- (b) the details of the recently proposed Sarvam LLM initiative, along with timeline of development, funds allocated, etc;
- (c) the number of Startups, companies, proposals under evaluation or approved so far, as part of the ₹10,370 crore IndiaAI Mission;
- (d) whether Government is providing access to high-end computing infrastructure to support the development of indigenous Artificial Intelligence (AI) models; and
- (e) the broader strategy to achieve technological self-reliance and leadership in AI globally?

ANSWER

MINISTER OF STATE FOR ELECTRONICS AND INFORMATION TECHNOLOGY (SHRI JITIN PRASADA)

(a) to (e): India's AI strategy is based on the Hon'ble Prime Minister's vision to democratize the use of technology. It aims to address India centric challenges, create economic and employment opportunities for all Indians.

AI ecosystem in India at present:

India has a strong information technology ecosystem. It generates annual revenues of more than 250 billion dollars and provides employment to more than 6 million people.

Global rankings such as Stanford AI rankings place India among the top countries in AI skills, capabilities, and policies to use AI. India is also the second-largest contributor to GitHub AI projects, showcasing its vibrant developer community.

India's AI strategy:

India's AI strategy aims to position India as a global leader in artificial intelligence. Government launched IndiaAI mission in March 2024. It is a strategic initiative to establish a robust and inclusive AI ecosystem aligned with India's development goals.

Development of India's Foundation Models

• Funds sanctioned for the development of indigenous Foundation Models under the IndiaAI Mission is Rs. 1971.37 Cr for a period of 5 years.

- Developing indigenous Large Language Models/Small language Models on Indian data sets.
- Models so trained will ensure an Indian local context, dialects, and cultural nuances.
- Target areas: Healthcare, education, agriculture, climate, and governance.
- Four (4) startups Sarvam AI, Soket AI, Gnani AI, and Gan AI, have been selected (so far) to build India's foundation models (details in Annexure-1)
- The models developed under IndiaAI mission will be made open source to help other startups build applications, especially India specific ones, on top of it.

National Mission on Interdisciplinary Cyber-Physical Systems (NM-ICPS)

- Under NM-ICPS, a project titled "**Bharat-Gen**: A Suite of Generative AI Technologies for India", with funding support of Rs. 235.17 crore has been approved for a period of two years.
- It is focused on developing efficient and inclusive AI solutions in Indian languages.
- The project is being implemented through a consortium led by the TIH Foundation Internet of Things (IoT) and the Internet of Everything (IoE), established at IIT Bombay and includes premier academic institutions as partners, namely IIT Bombay, IIIT Hyderabad, IIT Hyderabad, IIT Mandi, IIT Kanpur, IIM Indore, and IIT Madras.

Sarvam AI Proposal

- The proposal is focused on building India's Sovereign LLM Ecosystem, developing an open source 120 billion parameter AI model to enhance governance and public service access through use cases like "2047: Citizen Connect" and "AI4Pragati".
- IndiaAI Mission to provide access to 4,096 H100 SXM GPUs over 6 months, a maximum of 1,76,94,720 GPU hours, through the IndiaAI Compute portal, from the empanelled compute service providers.

IndiaAI Compute Capacity

- This pillar under IndiaAI Mission ensures establishment of high-end AI infrastructure access of GPUs to support safe and scalable AI research and innovation.
- As on date, 34,381 GPUs have been onboarded from 14 empanelled service providers.
- Government of India provides these GPUs at a subsidized cost. The average rate for these GPUs is about Rs 65 per GPU per hour.

Development of AI based applications

- Under IndiaAI Application Development Initiative, support is extended to AI startups solving public interest problems in governance, health, climate, etc., while following ethical design frameworks.
- Currently 30 applications are being funded under the Mission (details in Annexure-2)

Support to AI-based startups in India

- IndiaAI Startups Global program is launched with Station F & HEC Paris, to help 10 Indian AI startups expand into Europe.
- These include startups working in areas like responsible AI, and AI in cybersecurity, among others (Details in Annexure -3)

Safe and trusted AI

- IndiaAI Safety Institute for AI safety, security, and developing trust with diverse stakeholders.
- Diverse stakeholders including academia, startups, industry & government bodies engage through a hub-and-spoke model
- 8 Responsible AI Projects approved covering Machine Unlearning, AI Bias Mitigation, Privacy-Enhancing Tools, AI Governance Testing, etc. (Details in Annexure -4)

Annexure 1

Details of projects approved for development of India's Foundation Models:

- 1. **Sarvam AI** has been selected to build India's Sovereign LLM Ecosystem, developing an open source 120 billion parameter AI model to enhance governance and public service access through use cases like "2047: Citizen Connect" and "AI4Pragati".
- 2. **Soket AI** is working to develop India's first open-source 120 billion parameter foundation model optimized for the country's linguistic diversity, targeting sectors such as defense, healthcare, and education.
- 3. **Gnani AI** is working to build a 14 billion parameter Voice AI foundation model delivering multilingual, real-time speech processing with advanced reasoning capabilities.
- 4. **Gan AI** is working to create a 70 billion parameter multilingual foundation model targeting "Superhuman TTS (text-to-speech)" capabilities to surpass current global leaders.

Details of theme wise projects selected under IndiaAI Application Development Initiative:

• Climate Change and disaster management: 4 applications have moved to the next stage under this theme with 1 idea and 3 prototypes.

Indicative problem statement	problem		Solution stage
Early Warning Systems for Adverse and Sudden Climate Change	Heatwave Resilience: Integrating AI-based Advanced Forecasting for Extreme Heat Events: Integrate AI-based climate forecasting with health data to develop a targeted risk classification system for heat-health impacts	ARTPARK	Idea
Multi-Hazard Susceptibility Mapping	Multi-Hazard Susceptibility Mapping: hazard management system that integrates four modules: Hazard Prone Area Database, Susceptibility Mapping, Threat Assessment & Mitigation Planning, and Monitoring & Assessment.	Jarbits Pvt Ltd	Prototype
Solutions that correspond to both indicative problem statements	DeepFlood: Rapid flood inundation mapping using Vision Transformers and Satellite Data: advanced flood inundation mapping tool using SAR data and deep learning models for real-time, automated flood detection	Indian Institute of Technolog y Delhi	Prototype
Others: Climate and Outbreak of Diseases	Moskeet: Climate impact on mosquito-borne diseases: AI-powered platform integrates real-time climate data with mosquito tracking to predict and prevent disease outbreaks.	Moskeet	Prototype

• **Healthcare:** 8 applications have moved to the next stage under this theme with 4 prototype and 4 existing solutions.

Indicative problem statement	Title of the Project and Description	Team Name	Solution Stage
Early disease detection using AI-	End to End AI Cloud Platform for Radiology Diagnosis: AI cloud platform for radiology diagnosis, integrating innovative technologies such as CV, GenAI, NLP, Dicom, mobile, and cloud computing	Technology Private Limited	Existing Solution

enhanced X-rays	NIDAAN (iNtegrated lung health screening & tuberculosIs Detection through Ai At National scale): qXR, an advanced AI tool for interpreting chest X-rays (CXR), detects & localizes 30+ findings.	Qure.ai Technologies Private Limited	Existing Solution
	AI/ML enabled MafPro device platform for cancer staging, localization, and margins. MafPro handheld detector provides a radiation-free, non-invasive, safe and cost-effective solution that can reliably detect and adequately evaluate metastases in lymph nodes using AI/ML based algorithms	SIAMAF Healthcare	Prototype
Strengtheni ng ophthalmol ogy outcomes	Impactful AI solution, preventing preventable blindness, for socio-economic transformation: DRISTi AI is a CE-marked, device-agnostic retinal screening solution detecting 16 DR-related abnormalities and 20 vision-threatening conditions.	Artelus	Existing Solution
using AI for detection and manageme nt of	VoxelBox: SaaS platform that integrates advanced computational neuroscience, AI, and 3D visualization to provide clinicians with deeper insights into brain structure and function.	BrainSightAI	Prototype
conditions	Development of Ocellux: An AI-Based Solution for Enhanced Early Diabetic Eye Screening in INDIA: smartphone-based retinal imaging device designed for capturing high-resolution images of the retina and anterior segment	Anself Dynamics Pvt. Ltd.	Prototype
Others: Patients Monitoring	AI Powered Wearable Technology for Detection & Diagnosis of Musculoskeletal Joint Health Pain: non-invasive device that enables physiotherapists to assess joint health with precision.	Team Pheezee	Existing Solution
Others: Enabling Access to Healthcare	Revolutionizing healthcare using doctor-led AI: AI-powered personal doctor available 24x7 and free of cost, designed to assist people when they are sick, monitor their health through wearables, and act as a health coach to prevent diseases.	Jivi Health Private Limited	Prototype

• **Agriculture:** 8 applications have moved to the next stage under this theme with 1 prototype and 7 existing solutions.

Indicative	Title of the Project and Description	Team Name	Solution
problem			stage
statement			

Soil Testing and Advisory	Krishi Sah'AI'yak - Farming Co-pilot: AI-powered conversational assistant providing personalized agricultural advisory in multiple Indic languages. Samagra Development Associates Pvt. Ltd		Existing Solution
	KissanCopilot Multilingual Multimodal personalized AI Assistant for small holder farmers: Powered by Dhenu's vertical LLM for agriculture, provides personalized agricultural advisory services to smallholder farmers.	Titodi Infotech Pvt Ltd	Existing Solution
	Rapid, chemical-free soil testing solution using NIR Spectroscopy & AI/ML models: End-to-end soil testing approach leverages an offline app, AI-powered spectral device, and ML models to deliver timely, chemical-free soil analysis.	Neoperk Technologies Pvt. Ltd.	Existing Solution
Others: Carbon Credits for Soil Health	MRV: in-house developed MRV (Measurement, Reporting, and Verification) technology designed to ensure the integrity and quality of generated carbon credits.	Varaha Climate AG Private Limited	Existing Solution
Water and Fish Monitoring	Kadalcompass - We Amplify the voice of water using Hydro-AI,Underwater com,IoUT with Sensor Network: 5G-enabled device that transforms fishing practices using AI, IoUT, and advanced communication technologies	Innogle Technologies Pvt LTD	Existing Solution
	AI-Driven Live Fish Logistics and Mortality Reduction in Aquaculture: AI-driven solution optimizes aquaculture operations by monitoring water quality, predicting potential issues, and providing prescriptive recommendations to ensure fish health and reduce mortality.	SNRAS PVT LTD	Existing Solution
Quality of produce	AI-Deep tech driven quality assessment of maize: Traceability of the maize quality from farm to processing units provides unique and important value for the entire product chain in the market	RootsGoods (OPC) Pvt. Ltd.	Existing Solution
	Q-scan: AI-powered IoT solution that captures critical data throughout the fresh produce lifecycle, providing real-time analysis of food quality and actionable insights to sellers.	Qzense Labs Pvt Ltd	Prototype

Governance: 4 applications have moved to the next stage under this theme with 1 prototype and 3 mature solutions.

Indicative problem statement	Title of the Project and Description	Team Name	Solution Stage
Public service access	ConvoZen.AI: AI-powered conversational platform that automates customer engagement across channels like chat, voice, email, and social media, offering fast, personalized, and multilingual support.	Technologies Solutions Pvt.	Existing Solution
	AI contact center: AI-powered technologies like machine translation, NLP, ASR and TTS, and multilingual voice recognition to enhance governance by improving communication and accessibility across India's linguistic diversity.	Devnagri AI Pvt. Ltd	Existing Solution
Grievance Redressal and Legal Support	Adalat AI: AI solutions for Courts: legal tech solution leverages AI-driven transcription to automate court processes, reducing India's overwhelming judicial delays.	Legsys.AI Technology Foundation	Prototype
Others: Improving Internal Administra tion	Gov.Civis.Vote: Leverages Civis' proven public consultation framework and integrates advanced technologies to create a unified platform for governments.	Civic Innovation Foundation	Existing Solution

Assistive technologies for learning disabilities: 6 applications have moved to the next stage under this theme with 2 ideas, 2 prototype and 2 mature solutions.

Indicative problem statement	Title of the Project and Description	Team Name	Solution Stage
Early Identificati on for SLDs	Jiveesha: AI-powered platform for diagnosing Specific Learning Disabilities using advanced software and a plug-and-play device.	Daira Edtech Private Limited	Idea
	ScreenPlay - a digital game-based screening tool or autism and related disorders: AI-driven, game-based platform designed for early identification and intervention of Autism Spectrum Disorder in children aged 3-6.	Kidaura Innovations Pvt Ltd	Existing Solution
Enhanced Multimedi a	Readabled (Online Dyslexia Training): web- based application designed to help children with dyslexia improve phonetic awareness through interactive exercises.	Hermit Labs Pvt. Ltd.	Existing Solution

Accessibili ty tools	Voice fusion AI: adaptive voice cloning platform designed to empower speech-impaired individuals to express themselves through emotionally connected, lifelike voice outputs,	Technologies	Prototype
Solutions that address both	Adaptive Learning and Detection for SLDs: advanced AI techniques to detect Specific Learning Disabilities (SLDs) such as dyslexia, dysgraphia, and dyscalculia.		Prototype
indicative problem statements	Special Educator AI: AI-driven system designed to address India's shortage of special educators and support children with Specific Learning Disorders.	Viranc Infotech	Idea

Startups supported under IndiaAI Startups Global program launched with Station F & HEC Paris:

Annexure 3

Sr. No.	Startup Name	Area of Work	
1	PrivaSapien Technologies	Responsible AI with privacy engineering and privacy-enhancing technologies	
2	CoRover.ai	Conversational Gen AI platform for contextual, domain-specific human-like responses	
3	Staqu Technologies (Jarvis)	AI-powered audio-video analytics for surveillance, security, and governance	
4	SatSure Analytics	Earth Observation using satellite imagery and AI for decision intelligence	
5	Storyvord	AI-based video content generation from product URLs and brand context	
6	VolarAlta	Drone-based AI solutions for industrial inspections	
7	Smartail	AI-powered edtech platform for immersive learning and real-time assessment	
8	Secure Blink	AI-driven cybersecurity with proactive DevSecOps posture management	
9	NeuroPixel.AI	AI-enabled ultra-fast image editing for fashion and e-commerce	
10	Voicing AI	Agentic AI platform for enterprise-grade intelligent voice agents	

Annexure 4

The details of the selected projects under "Safe & Trusted AI" Pillar are as under:

NAME OF THE THEME	SELECTED APPLICANT	TITLE OF THE PROJECT
Machine Unlearning	IIT Jodhpur	Machine Unlearning in Generative Foundation Models
Synthetic Data Generation	IIT Roorkee	Design and Development of Method for Generating Synthetic Data for Mitigating Bias in Datasets; and Framework for Mitigating Bias in Machine Learning Pipeline for Responsible AI
AI Bias Mitigation Strategy	National Institute of Technology Raipur	Development of Responsible Artificial Intelligence for Bias Mitigation in Health Care Systems
Explainable AI Framework	DIAT Pune and Mindgraph Technology Pvt. Ltd.	Enabling Explainable and Privacy Preserving AI for Security
Privacy Enhancing Strategy	IIT Delhi, IIIT Delhi, IIT Dharwad and Telecommunication Engineering Center (TEC)	Robust Privacy-Preserving Machine Learning Models
AI Ethical Certification Framework	IIIT Delhi and Telecommunication Engineering Center (TEC)	Tools for assessing fairness of AI model
AI Algorithm Auditing Tool	Civic Data Labs	ParakhAI - An open-source framework and toolkit for Participatory Algorithmic Auditing
AI Governance Testing Framework	Amrita Vishwa Vidyapeetham and Telecommunication Engineering Center (TEC)	Track-LLM, Transparency, Risk Assessment, Context & Knowledge for Large Language Models
