L&T Press Release
Issued by Corporate Brand Management & Communications

L&T House
Ballard Estate, Mumbai 400 001
Tel: 91 22 6752 5656
CIN: L99999MH1946PLC004768

LTSCT & IISc Ink Strategic MoU to Establish India's First National 2D Innovation Hub

Mumbai, September 03, 2025: Today at Day 2 of Semicon India 2025, L&T Semiconductor Technologies (LTSCT) and the Indian Institute of Science (IISc), Bangalore, signed a strategic Memorandum of Understanding (MoU) to collaborate on the development of a national 2D Innovation Hub. This strategic partnership marks a pivotal step toward advancing research and translation in 2D material-based semiconductors and quantum technologies. The envisioned hub will serve as a world-class facility focused on next-generation semiconductor innovation, beyond-silicon-chip technologies, placing India at the forefront of global semiconductor R&D.

LTSCT intends to support this mission through strategic contributions, starting with manpower, facilities, and ecosystem linkages, and expanding to building infrastructure, enabling indigenous toolchains, and potentially integrating these technologies. At the same time, IISc, as the host institution, will develop platform technologies, create wafer-scale cleanroom and fabrication capabilities, and drive translational research and innovation in semiconducting and quantum 2D applications.

The MoU records the mutual intent of both parties to collaborate on establishing and growing the Hub, subject to formal government approval.

Objective of the 2D Innovation Hub

- Creating India's first wafer-scale R&D line for semiconducting 2D materials
- Developing advanced processes, Process Design Kits (PDKs), and reference test vehicles
- Demonstrating 2D material-based microprocessor-level prototypes and quantum devices
- Building a national ecosystem with robust academic–industry–government participation

Commenting on the occasion, **Mr. Sandeep Kumar, Chief Executive, LTSCT, said, "**This partnership signals much more than strategic intent. It marks India's rise as a force in semiconductor innovation. By combining LTSCT's industrial strengths with IISc's academic excellence, we will accelerate indigenous capability, IP creation, and a future-ready manufacturing pathway. Our collaborative ambition is to unlock new value chains and empower emerging sectors, ensuring India's semiconductor future is built on deep innovation and commercial relevance."

IISc will anchor the Hub by setting up wafer-scale fabrication facilities, standard process flows, and advanced device prototyping across logic, memory, sensors, analog, and quantum circuits. It will also build shared infrastructure, foster collaborations across academia, industry, and R&D labs, train the next-generation workforce, and drive translational research and IP creation.

Prof. Mayank Shrivastava, Professor & Chair, Department of Electronic Systems Engineering, IISc, said, "Building the National 2D Innovation Hub is a profound demonstration of India's scientific leadership and collaborative strength. This partnership reflects IISc's commitment to cutting-edge scientific leadership and LTSCT's long-term vision to play a catalytic role in India's deep-tech and semiconductor ecosystem. It will enable the acceleration of India's journey toward leadership in 2D electronics and quantum technologies."

LTSCT will complement this through a phased engagement model. In the immediate phase, it will provide research fellowships, joint supervision of PhDs, access to labs and tools, and CSR-linked funding for infrastructure and talent. In the medium term, it will bring in L&T's expertise in planning and constructing semiconductor R&D infrastructure, and forge ecosystem linkages with global partners across defence, aerospace, energy, industrial automation, and computing.

With the National 2D Innovation Hub, LTSCT, and IISc, are charting a bold trajectory towards semiconductor leadership. Over the next decade, the partnership envisions working towards making India a preferred destination for 2D/quantum chip innovation, seamless industry integration, and globally competitive productisation. The initiative aims to equip the nation with not only world-class R&D capabilities, but also the talent, IP, and manufacturing muscle necessary to shape the semiconductor landscape, driving downstream adoption across strategic sectors and powering India's ascent in the global technology value chain.

About L&T Semiconductor Technologies (LTSCT)
L&T Semiconductor Technologies Ltd (LTSCT), a wholly owned subsidiary of Larsen & Toubro, is a fabless global semiconductor product company focussed on designing and delivering innovative solutions and comprehensive suite of services to customers. It offers semiconductor devices, solutions and technology partnership by helping customers realise energy- efficient, high-performance systems to benefit from data, electrification and software defined technology trends. LTSCT has R&D centres in Bengaluru, Delhi and Chennai, and Product Engineering & Sales divisions in Austin, Munich and Tokyo.

About the Indian Institute of Science (IISc)
The Indian Institute of Science (IISc) was established in 1909 by a visionary partnership between the industrialist Jamsetji Nusserwanji Tata, the Mysore royal family and the Government of India. Over the last 115 years, IISc has become India's premier institute for advanced scientific and technological research and education. Its mandate is "to provide for advanced instruction and to conduct original investigations in all branches of knowledge as are likely to promote the materials and industrial welfare on India." In 2028, IISc was selected as an Institution of Eminence (IoE) by the Government of India, and it consistently figures among the top Indian Institutions in world university rankings.

Media Queries:

Sumeet Chatterjee
Head - Corporate Brand Management & Communications
sumeet.chatterjee@larsentoubro.com