GIST signs MOU with Global Semiconductor Test Company NI to foster AI semiconductor test specialists: Expanding from the 'GIST-Arm School' to the 'GIST-NI School'… Completing the full-cycle AI semiconductor 'Triangle' of design, verification, and evaluation

- NI dispatches equipment, software, and engineers to GIST and supports training programs

- Establishes a practical training and verification system through the operation of the GIST-NI joint working group, the 'Global AI Semiconductor Technology Research Institute'

GIST President Kichul Lim (fourth from the right) and NI CEO Ritu Favre (fourth from the left) are posing for a commemorative photo after signing a business agreement to foster specialized personnel in the semiconductor testing field and strengthen industry-academia cooperation.

On April 10 (Fri), the Gwangju Institute of Science and Technology (GIST, President Kichul Lim) signed a Memorandum of Understanding (MOU) with National Instruments (NI), a leading global company in test, measurement, and semiconductor

verification solutions, at the L Tower in Seocho-gu, Seoul, to foster specialized personnel in the field of AI semiconductor testing and strengthen industry-academia cooperation.

Headquartered in Austin, Texas, NI is a global company that provides test and measurement solutions for precisely measuring the computational performance, power efficiency, and stability of AI semiconductors, and supports advanced measurement and verification technologies across various industrial sectors.

This agreement aims to establish the 'GIST-NI School' (Verification & Evaluation), expanding into the testing and verification fields, following the 'GIST-Arm School' (Design) currently being pursued with Arm Limited (hereinafter Arm), a global leader in computing platform IP, to foster specialized talent in AI semiconductor design.

Through this, GIST will complete the so-called 'AI Semiconductor Triangle,' an industry-academia cooperation model based on full-cycle integrated education and research encompassing AI semiconductor design, verification, and evaluation.

In particular, this is highly significant as it establishes the first integrated industry-academia cooperation model in Korea that organically connects the entire process—from fabless-based design and foundry production to semiconductor assembly, fabrication (packaging), and verification and evaluation—thereby simultaneously laying the foundation for cultivating practical semiconductor talent directly linked to the industrial field and securing technological competitiveness.

Under this agreement, NI will provide GIST with in-kind contributions, including semiconductor test equipment and software, dispatched engineers, and educational programs.

GIST and NI plan to jointly pursue the following initiatives: ▲ development of training programs for specialized personnel in AI semiconductor testing; ▲ collaboration on wafer, packaging, and final testing, as well as the demonstration of AI chipsets; ▲ training in automated testing technologies based on LabVIEW (graphical measurement and control software), TestStand (automated test management software), and SystemLink (test data management and operation platform); ▲ joint industry-academia-research collaboration based on open test platforms; and ▲ strengthening the technological capabilities of small and medium-sized enterprises (SMEs) in the Gwangju and Jeonnam regions.

In addition, they plan to establish a joint working group called the 'Global AI Semiconductor Technology Institute (NI NOVA School@GIANTS)*' to gradually build specialized AI semiconductor educational courses, industry-linked practical training infrastructure, and a verification, evaluation, and certification system.

> ** NI NOVA School@GIANTS: NI NOVA School (NI Next-generation Open Validation & Automation School), a specialized education and validation school operated by NI, and GIANT (Global Institute of AI & Technology of Semiconductor), a global research and education institution, have partnered to provide education, practical training, and certification systems for next-generation AI semiconductor testing and validation.*

GIST President Kichul Lim stated, "While we have been building a foundation for AI semiconductor design education through cooperation with Arm, this collaboration with NI expands our scope to the field of validation and testing, thereby completing an education and research system that encompasses the entire semiconductor cycle." He added, "GIST will play a pivotal role in helping the Southern Semiconductor Cluster leap forward as a key hub that simultaneously secures global-level talent and technology."

NI CEO Ritu Favre stated, "I consider it very meaningful to establish a foundation for industrial cooperation and the cultivation of talent in the field of next-generation semiconductor testing and verification through our collaboration with GIST," adding, "I expect this partnership to contribute to strengthening the technological competitiveness of the global semiconductor industry, including Korea."

This agreement is also linked to the establishment of the AI Semiconductor Research Institute currently being pursued by GIST, leading to the creation of a national strategic hub-type education and research model that integrates the design, packaging, verification, and demonstration stages into a single entity.

Through this, an integrated industry-academia cooperation system will be realized within the Southern Semiconductor Cluster that oversees the entire cycle from design to verification and demonstration. It is expected to establish itself as a leading global industry-academia cooperation model that simultaneously fosters semiconductor talent and secures technological competitiveness.