## '27 Years of R&D One Road' for the Development of the Battery Industry, Professor Hyeong Jin Kim receives a commendation from the Minister of Industry

- After 20 years of working for LG Chem, nurturing juniors... Contributing to industrial development through battery material research and nurturing experts



▲ GIST Graduate School of Energy Convergence Professor Hyeong Jin Kim

GIST (Gwangju Institute of Science and Technology, President Kiseon Kim) Graduate School of Energy Convergence Professor Hyeong Jin Kim was awarded the Minister of Trade, Industry and Energy's Commendation for his contribution to the Korean battery industry.

Professor Hyeong Jin Kim has worked for about 20 years at LG Chem, a world-class chemical company representing Korea. After gaining experience in the industrial

field and R&D fields, he moved to GIST and is the best expert in the battery field in Korea.

From his time as a senior researcher at the LG Chem Research Institute in 1995 to the head of the LG Chem Holland Plant in Michigan, USA in 2014, Professor Kim has been involved in the overall battery industry and has contributed throughout from basic research necessary for the lithium-ion battery industry to designing and manufacturing electric vehicle batteries.

During his tenure at LG Chem, he carried out national projects of the Ministry of Industry, such as the development of growth engine technology and the development of electrolytes for ultra-high-capacity lithium secondary batteries. He succeeded in developing and mass-producing the world's highest-capacity cylindrical battery and applied it to Dell and HP laptops in the US for the first time.

In particular, the successful completion of the Michigan state government grant project in the United States achieved a profit of KRW 120 billion and was also the first in Korea to successfully mass-produce automobile batteries and battery packs at overseas battery factories.

Since 2016, when he became a professor at GIST, he has been conducting research on silicon and electrolytes, which are core materials needed for the battery industry, and electrode structures. Not only that, he transferred the technology to the manufacturing method of thick film electrodes using a laser, and he is also participating in the development of technologies necessary for the battery industry by performing corporate-industrial-academic tasks.

In particular, he is striving to nurture professionals necessary for the domestic battery industry. This year, LG Energy Solution Poland's local subsidiary and Lithuania's Kaunas University (KTU) are carrying out EU projects in the energy sector.

Professor Hyeong Jin Kim said, "Based on my various experiences in the industry, I am collaborating with researchers in various fields both inside and outside of GIST to further broaden the scope of R&D. By focusing on the energy sector tasks of the European Union (EU), which started this year, I would like to use new technologies and results to be created in the future to further contribute to the development of the Korean battery industry."

Professor Kim said, "In particular, as part of an energy policy in preparation for rapid climate change, national support for the rechargeable battery sector, which is a key future driver, and a systematic personnel training plan are needed."

The Korea Battery Industry Association held a proclamation ceremony for the <1st Battery Industry Day> to commemorate the achievements and status of the secondary battery industry, a national core industry, on November 1, last year, on the 10th anniversary of the association's founding.

This year, the <2nd Battery Industry Day Commemoration Ceremony and Merit Award Ceremony> will be held at JW Marriott Hotel Seoul on November 1 (Tuesday) at 3 pm. To encourage the continuous development of the secondary battery industry by raising public interest in the battery industry and boosting the morale of industry workers, awards were given to those of merit.

