

ESOL joins the eBeam initiative...the second Korean company after Samsung



Researchers are manufacturing the main chamber part of the EUV light source in the clean room at ESOL, an EUV equipment company located in Dongtan Industrial Complex, Hwaseong-si, Gyeonggi-do.

ESOL, a domestic semiconductor extreme ultraviolet (EUV) solution company, has joined the 'eBeam Initiative'. The eBeam initiative is a global semiconductor design and manufacturing community based on eBeam and EUV technologies. This is the second time a Korean company has joined after Samsung Electronics.

ESOL announced on the 9th of March, 2022 that it had signed up as a member of the eBeam Initiative earlier this month. Founded in 2009 by D2S, a provider of Graphics Processing Unit (GPU) accelerated solutions for semiconductor manufacturing, the eBeam initiative is a global cooperative network of semiconductor electron beam technology. It was launched with the purpose of widely using electron beam technology in the semiconductor manufacturing process, technical education, and establishing a cooperative network among member companies. Recently, as the semiconductor EUV market expands, the scope of activities is expanding to EUV technology, photomask, and metrology inspection and so on.

The eBeam initiative is led by private companies that utilize real-world advanced semiconductor processes. As of this month, a total of 51 member companies are participating.

Semiconductor manufacturers such as Samsung Electronics, GlobalFoundries, Kioxia, Micron, SMIC, and ST have joined. In the semiconductor equipment companies, Applied Materials, ASML, TEL, KLA, and Canon have joined. Semiconductor design automation (EDA) tool companies such as Synopsys, Cadence, and Siemens EDA, and material and semiconductor component companies such as DNP, Toray, and Toppan are also active in the eBeam initiative. The only Korean domestic companies are Samsung Electronics and ESOL.

ESOL joins the eBeam initiative to share advanced technologies related to EUV solutions with member companies and seek development plans. It plans to contribute to the expansion of the EUV solution market through various conferences and technology exchange activities. ESOL has developed and commercialized various EUV solutions such as EUV mask defect measurement equipment, EUV photoresist measurement equipment, and phase shift mask (PSM) measurement equipment. Byung-guk Kim, CEO of ESOL, said, "The EUV solution technology secured by ESOL will be known to the global market by joining the eBeam initiative."