

第 31 回工学院特別セミナー 兼 電気電子系科学技術懇話会 The 31st School of Engineering, Distinguished Seminar and EE Forum on Science and Technology

"The Future of Memory Chip technology and role of innovation"



Dr. Gurtej S Sandhu

Senior Fellow and Vice President, Technology Development, Micron Technology, Inc.



日時: 2023年2月16日(木) 10:00~11:00

場所: Zoom

対象:本学の学生、本学の教職員

Time: 10:00-11:00, Thursday, February 16th, 2023

Place: Zoom

Available for **All STUDENTS** & all faculties/staffs

Abstract: A commitment to innovation and creativity at a system level is required to meet demands of the data age. These innovations will help fuel the next generation of technologies such as self-driving cars, space exploration, artificial intelligence and machine learning, which sounded like science fiction not so long ago. Several technologies have been proposed over the years with no clear winner. Some of the critical factors which need to be considered for a successful implementation of a new technology include; why and when alternate memory technologies may be needed, what are the performance criteria and related requirements, and what needs to happen in the ecosystem to support a successful new technology. The result of this reality is that bottoms up development for a new memory technology may not feasible due to technical risks and cost and we must target application-specific solutions for new future markets.

Biography: Gurtej Sandhu is Senior Fellow and Vice President at Micron Technology. In his current role, he is responsible for Micron's end-to-end (Si-to-Package) R&D technology roadmaps. The scope includes driving and managing the Modeling engineering organization to resource and execute on developing innovative technology solutions for future memory scaling. Dr. Sandhu's responsibilities include managing interactions with research consortia around the world. He has been actively involved with a broad range of process technologies for IC processing and has pioneered several process technologies currently employed in mainstream semiconductor chip manufacturing. Dr. Sandhu received a degree in electrical engineering at the Indian Institute of Technology, New Delhi, and a Ph.D. in physics at the University of North Carolina, Chapel Hill, in 1990. He is recognized as one of the top inventors in the world. In 2018, he received the IEEE Andrew S. Grove Award for outstanding contributions to silicon CMOS process technology for chip scaling.

For your registration, please find https://zoom.us/meeting/register/tJwoc-uqrzoqHdRhr34S23k-

UKDWAHky NCn (QR code).

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