NEWS RELEASE

Samsung Showcases Groundbreaking Logic Innovations at System LSI Tech Day 2023

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Samsung emphasizes its vision to propel the Fourth Industrial Revolution forward through a comprehensive System LSI humanoid platform;

Inaugural event offers an early glimpse of next-gen logic portfolio encompassing Exynos 2400 mobile processor, Zoom Anyplace camera sensor technology, vision sensor, 5G modem and health-oriented processor

SAN JOSE, Calif.--(BUSINESS WIRE)-- Samsung Electronics Co., Ltd., a world leader in advanced semiconductor technology, today unveiled its latest innovations in analog and logic semiconductor technologies and outlined its blueprint for upcoming technological advancements at its inaugural Samsung System LSI Tech Day 2023 event. Attended by approximately 300 customers and partners at its Samsung Semiconductor U.S. headquarters, the event featured tech sessions led by Samsung executives, covering a wide range of topics from System LSI humanoids to AI and the company's R&D endeavors in the U.S.

Samsung President and Head of System LSI, John Park, delivers the opening keynote at Samsung's annual System LSI Tech Day. (Photo: Business Wire)

In the opening keynote, Samsung emphasized the company's vision to lead hyper-intelligent, hyper-connected and hyper-data technologies in the Fourth Industrial Revolution era with its comprehensive logic solutions uniquely tailored for various industries.

"Generative AI has quickly emerged as perhaps the most significant trend of the year, demanding more powerful foundational technologies to process data and bring AI to life," said Yong-In Park, President and Head of System LSI Business at Samsung Electronics. "We are paving the path toward a new era of proactive AI, leveraging our

Samsung System LSI Humanoid platform, which seamlessly converges our capabilities across a broad spectrum of logic semiconductors, from powerful computational IPs, connectivity solutions to sensors emulating the main five human senses."

First Glimpse of Exynos 2400 Mobile Processor and Zoom Anyplace Image Sensor Technology

One of the event's highlights was the preview of Samsung's next-generation flagship mobile processor, the Exynos 2400 with Xclipse 940 GPU based on the latest AMD RDNA™ 3 architecture. A live demo showcased the processor's substantially enhanced ray tracing capability, promising improved realism and immersion in gaming through a range of optical effects including global illumination, reflection and shadow rendering.

Achieving significant advancements in computing performance, the Exynos 2400 processor features a 1.7x increase in CPU performance and a remarkable 14.7x boost in AI performance compared to the previous Exynos 2200 product. Additionally, Samsung introduced a new AI tool designed for upcoming smartphones, demonstrating text-to-image AI generation using its Exynos 2400 reference board.

Also revealed for the first time was Samsung's Zoom Anyplace technology based on its 200-million pixel image sensor. This sensor innovation will enable an entirely new camera zoom experience, allowing mobile users to take up to 4x close-ups of moving objects without any image degradation. AI-based tracking technology automatically follows and captures objects, all while recordings are made in full screen simultaneously, ensuring that no moment or detail is left uncaptured.

Other debuts at the event were Narrowband Internet of Things (NB-IoT) non-terrestrial networks (NTN) ready next-generation 5G modem; a new vision sensor brand, the ISOCELL Vizion; and a Smart Health processor.

Samsung's latest automotive processor slated for mass production in 2025, the Exynos Auto V920, was displayed running several applications across multiple displays. Meanwhile, a video of the ISOCELL Auto 1H1 image sensor highlighted its 120Hz high dynamic range (HDR) and superior LED flicker mitigation (LFM) performance that ensure safer driving.

Demonstrating its capability in cellular and connectivity technologies, Samsung featured a video demo of NB-IoT NTN satellite communication in collaboration with Skylo Technologies, an NTN service provider, using Samsung's next-gen modem reference device. A live demo of wireless lighting control through its ultra-wideband (UWB) solution, the Exynos Connect U100, was also shared.

Additional logic innovations on display include the 200-megapixel (MP) ultra-high-resolution image sensor, the ISOCELL HP2; an advanced driver assistance (ADAS) and autonomous driving (AD) camera solution, the ISOCELL

Auto 1H1; quantum-dot (QD) OLED display driver IC (DDI); IoT security solutions; and wireless-charging power management IC (PMIC).

Deep-dive into AI with Academic Experts

During the afternoon panel discussion session, Sukhwan Lim, head of the U.S. System LSI R&D Center, joined with academic experts — Professor Jae-sun Seo of Cornell Tech, Professor Yakun Sophia Shao of UC Berkeley and Professor Thierry Tambe of Stanford University — to discuss the implications on compute platforms from recent trends in generative AI and large language models.

About Samsung Electronics Co., Ltd.

Samsung inspires the world and shapes the future with transformative ideas and technologies. The company is redefining the worlds of TVs, smartphones, wearable devices, tablets, digital appliances, network systems, and memory, system LSI, foundry and LED solutions. For the latest news, please visit the Samsung Newsroom at **http://news.samsung.com**.

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