FutureHorizons

FH MONDAY

11 July 2022



Future Horizons Ltd, • 44 Bethel Road • Sevenoaks • Kent TN13 3UE • England Tel: +44 1732 740440 • Fax: +44 1732 740442 e-mail: <u>mail@futurehorizons.com</u>• <u>http://www.futurehorizons.com/</u> Affiliates in Europe, India, Israel, Japan, Russian, San Jose California, USA

Ansys Joins Intel Foundry Services Cloud Alliance to Advance Semiconductor Development

PITTSBURGH, June 28, 2022 /PRNewswire/ -- Ansys (NASDAQ: ANSS) today announced that it has joined the Intel Foundry Services (IFS) Cloud Alliance. IFS is a fully vertical, standalone foundry business announced by Intel last year. As part of the company's commitment to meet the growing demand for foundry capacity, Intel is partnering with cloud service providers and EDA suppliers to enable a secure design environment for customers on the cloud. Ansys tools, including Ansys RedHawk-SC, Ansys HFSS, Ansys® Totem[™], Ansys® PathFinder[™], Ansys® VeloceRF[™] and Ansys® RaptorX[™], are available as part of this interoperable, cloud-enabled semiconductor design flow that will help enable current and future Intel customers to enhance their productivity.

RedHawk-SC is a next-generation system-on-chip (SoC) power noise signoff platform that is built on Ansys SeaScape, the world's first custom-designed, big data architecture for electronic system design and simulation. Its underlying highly-scalable elastic compute architecture takes full advantage of the cloud, enabling customers to load the largest designs within seconds and quickly explore thousands of scenarios.

Tata Motors And Renesas Join Hands To Build Semiconductor Solutions For India, Emerging Markets

Group companies — Tata Motors and Tejas Networks — have announced a partnership with Renesas Electronics Corporation, a Japan-based premier supplier of advanced semiconductor solutions.

The partnership aims to work on enhancing innovation across electronic systems for India and other emerging markets.

What's in it for Tata Motors

With its expertise in semiconductor technology, Renesas will help Tata Motors accelerate the development of electric and connected vehicles. The collaboration will help Tata Motors develop next-generation automotive electronics.

Melexis launches 2mm x 2.5mm pico-resolver

Melexis has launched the MLX90381 AEC-Q100/ISO 26262 compliant pico-resolver for industrial and automotive applications.

Its DFN-6 (2 mm x 2.5 mm) package enables sensored mechatronic miniaturization.

This ASIL-ready solution is programmable at module level and is best suited to rotor position detection.

This device combines the advantages of a small outline and reliable analog outputs providing sine and cosine signals.

Leveraging Melexis' Triaxis Hall technology, the MLX90381 is suitable for use in rotor position detection.

The MLX90381 can be used for absolute rotary position sensing and, leveraging its low latency and fast response, measures rotational speeds of more than 50,000 rpm.

Syntiant Leads TinyML Benchmark Results

MLCommons has published the latest round of MLPerf Inference benchmark scores. In the MLPerf Tiny division, U.S. startup Syntiant shined with impressive keyword spotting latency and energy consumption, while Nvidia and Qualcomm battled it out in the edge and data center categories once again.

Syntiant's NDP120 ran the tinyML keyword spotting benchmark in 1.80 ms, the clear winner for that benchmark (the next nearest result was 19.50 ms for an Arm Cortex–M7 device). This result used 49.59 uJ of energy (for the system) at 1.1V/100 MHz. Turning the supply voltage down to 0.9 V (and reducing clock frequency to 30 MHz) reduced Syntiant's energy to 35.29 uJ, but increased latency to 4.30 ms.

Nordic Semiconductor to acquire Mobile Semiconductor

Nordic Semiconductor today announces that it has entered into an agreement to acquire Mobile Semiconductor, a privately-held U.S. company specializing in embedded memory technology for microcontrollers and Systems-on-Chip.

Mobile Semiconductor has long provided the RAM memory used in all of Nordic's wireless IoT devices including its nRF52 and nRF53 Series Bluetooth SoCs and nRF91 Series cellular IoT SiPs, a press release reads.

We are very excited to bring on-board this world class team, recognized as an industry leader in optimized, low voltage embedded SRAM designs, says Nordic CTO/EVP R&D and Strategy, Svein-Egil Nielsen, in the press release. A team we know intimately from years of working together. And in terms of the technology, Mobile Semiconductor's SRAM has been a key differentiator in our Bluetooth and cellular IoT product ranges. As such, when the opportunity to bring this critical expertise in-house arose, it was a no-brainer to proceed and make this latest acquisition.