

EMASS Announces Updated Drone Results

ECS-DoT SoC test results show increased propulsion under less power draw

LOS ANGELES (July 1, 2025) – EMASS, a Nanoveu subsidiary emerging from stealth with next-generation semiconductor technology, has announced the recent findings of their drone test series held in June, 2025.

Excerpt of the findings:

Nanoveu subsidiary EMASS has shown that its ECS-DoT System-on-Chip can deliver a 33% increase in simulated drone flight time (from 60 to 80 minutes) without changing the battery or airframe. The chip runs at 50 Hz, executing full "sense-think-act" loops every 20 ms in a hardware-in-the-loop simulation, with loop-to-loop timing stable and under ±1 ms variance. Two AI engines contribute: a surrogate model predicting propulsive power demand (reducing over-thrust events by ~25%) and a reinforcement-learning controller using PPO to optimise throttle and blade pitch, improving flight distance per watt by ~20%, all while keeping AI compute power under 1 milliwatt. Next steps include refining models to aim for 40-70% gains, broadening simulation profiles (different payloads, wind, battery states), testing heavier/multi-platform drones, increasing robustness (fail-safes, redundancy), and moving into live flight trials, with the goal of positioning ECS-DoT for commercial drone, inspection, precision agriculture, logistics, and defence uses.

"Demonstrating a major simulated increase in flight time without altering the drone's hardware is a clear validation of ECS-DoT's real-world potential. This result proves that our ultra-low-power AI engine can deliver meaningful operational gains in energy-constrained environments," said Mark Goranson, CEO of EMASS. "With further model refinement underway and live flight trials planned, ECS-DoT is now firmly positioned as a solution for autonomous drones and the broader edge-AI landscape. The worldwide drone market size was estimated at USD \$73 billion in 2024 and is projected to reach \$163 billion by 20303, representing a major addressable growth market for our technology."

Click here to view the full report.

For more information, visit the website.

###

About EMASS

EMASS – a subsidiary of Nanoveu Ltd (ASX: NVU) – is an advanced semiconductor company specializing in ultra-low-power AI system-on-chip (SoC) solutions for edge computing. The company's flagship ECS-DoT chip delivers high-performance AI processing for vision, audio, and sensor data directly on-device, maximizing energy efficiency through its RISC-V architecture and non-volatile memory technologies. This always-on intelligence solution is optimized for power- and space-constrained applications including drones, wearables, healthcare devices and industrial IoT systems. For more information, visit nanoveu.com/emass.

About Nanoveu

Nanoveu is a listed company advancing human-machine experiences at the edge through a

FOR IMMEDIATE RELEASE



portfolio that spans ultra-low-power AI and glasses-free 3D technologies. Its subsidiary EMASS designs advanced system-on-chip (SoC) solutions that deliver efficient, scalable ondevice AI for smart devices, IoT applications and 3D content transformation − enhancing Nanoveu's reach across rapidly growing AI, edge computing and 3D content markets. EyeFly3D™ is Nanoveu's end-to-end platform for glasses-free 3D, uniting proprietary screen technology with sophisticated content processing software and, now, EMASS's ultra-low-power SoC to bring immersive 3D to a wide range of devices and industries. The Company also develops and markets an advanced range of self-disinfecting and hydrophobic films and coatings under the Nanoshield™ brand, designed for applications including large-scale CSP and photovoltaic solar installations. Together, Nanoveu's businesses deliver practical innovation that makes devices smarter, environments safer and experiences more immersive.

Media Contact

Bryar Keyes Senior Account Manager, Public Relations Bryar.Keyes@publitek.com +1 (503) 358-9597