

Gadgets and Devices: MemGlove/Arduino, Starburst and Axiomtek

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- [The MemGlove detects hand poses and recognizes objects](#) [3]

Hand movements have long been used as a computer interface method, but as reported here, the MemGlove from a team of MIT CSAIL researchers takes things several steps further. This augmented glove can sense hand poses and how it's applying pressure to an object.

The wearable uses a novel arrangement of 16 electrodes to detect hand position based on resistance, and six fluid filled tubes that transmit pressure depending on how an item is gripped.

An Arduino Due is used to sense these interactions, which pass information on to a computer for processing. Pose verification is accomplished with a Leap Motion sensor. By training neural networks with TensorFlow, the glove is able to identify various hand poses, as well as distinguish between 30 different household things that are grasped.

- [Startups Push Aerospace Innovation](#) [4]

Entrepreneurs developing lightweight propulsion systems for satellites, cybersecurity for Linux, wireless power and a blockchain application for secure part procurement, among other emerging technologies, presented their technologies to investors, the military and industry. In 10-minute intervals, the company representatives pitched their early stage, aerospace-related

technologies at Starburst Accelerator's third U.S. Virtual Selection Committee meeting on July 9th, which was held virtually. Headquartered in Paris, Starburst's U.S. team brought in the eight hopeful companies, all vying for partnership agreements, venture capitalist funding and a chance to join Starburst's Accelerator Program. The startups' prospective products range in level of technical readiness and prototyping stages.

As an aerospace technology incubator, Starburst has been operating for almost 7 years. Initially, the accelerator held specific events targeted at specific stakeholder groups, such as Defense Advanced Research Projects Agency, the Air Force or certain investor groups, explained Van Espahbodi, co-founder and managing partner at Starburst.

Today, Espahbodi said, they are constantly scouting emerging technology solutions for 50 clients in eight countries across 21 aerospace markets, from quantum sensors, to cybersecurity, to new energy sources and propulsion, he said.

- [Quad-GbE Apollo Lake appliance has dual mini-PCIe slots](#) [5]

Axiomtek's Linux-ready NA346 networking appliance is equipped with a Celeron N3350, 4x GbE ports with optional bypass, 2x USB 3.0, HDMI, and 2x mini-PCIe slots with mSATA and wireless support.

Axiomtek has launched an entry-level SD-WAN, VPN and security gateway for industrial IoT security applications. The 146 x 118.2 x 33.5mm NA346 runs Yocto-based Linux or Win 10 on a dual-core, up to 2.4GHz Celeron N3350 with a 6W TDP from Intel's Apollo Lake generation. The quad-GbE port networking appliance follows Axiomtek's earlier, Apollo Lake based, 6-port NA345 and other Apollo Lake based networking gateways such as Acrosser's 6-port AND-APL1N1FL.

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[3] <https://blog.arduino.cc/2020/07/14/the-memglove-detects-hand-poses-and-recognizes-objects/>

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