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New miniature drives for medical robots and multi-axis systems

maxon is once again expanding its range of configurable drives with more brushless DC motors, gearheads, and encoders from the ECX series. There is also news on positioning controllers in the micro segment.

The ECX series is growing with the addition of the maxon **ECX Speed 4**. This tiny powerhouse with a diameter of only 4 millimeters is designed for use in medical technology. The brushless DC motors are available in 2 versions: M (medium) and L (long) and can reach speeds of up to 50,000 rpm. They can be combined with the new **GPX 4 C gearheads**, which are available as two, three, or four-stage versions. With the GPX planetary gearheads, the pressure angle of the toothing has been optimized to achieve longer uptimes.

Smallest encoder on the market

The matching **ENX 4 MAG** incremental encoder expands the ways the drive system can be used, for example in surgical robots. MAG stands for magnetic. In this size class, the **ENX 4 MAG** encoder is a first on the market. It uses the same magnetic principle as the slightly larger ENX 6 MAG and ENX 8 MAG versions.

The new drive systems from the maxon ECX family, launching mid-April, can be conveniently configured online and ready for shipping in 11 working days. shop.maxongroup.us

Controllers with extreme power density

The EtherCAT version of the **EPOS4 Micro 24/5** positioning controller is another brand-new product. The controller's functionality, operation, software, and accessories are derived almost directly from the existing products in the EPOS4 range. It is suitable for use with both brushed DC and brushless EC motors with a continuous power of up to 120 W and has comprehensive feedback options such as Hall sensors, as well as digital incremental and SSI absolute encoders. The motion controller with its extremely compact design is the optimal solution for integration into single-axis and multi-axis systems, such as: small devices or robotic systems.

In addition to the new Micro design, the **EPOS4 Compact 24/5 EtherCAT 3-axes** will follow in the summer of 2020, as an extremely compact plug-and-play 3-axis positioning system. The 3-axis positioning system is based on the EPOS4 Micro and impressively demonstrates the small size and high functionality of these multi-axis solutions.

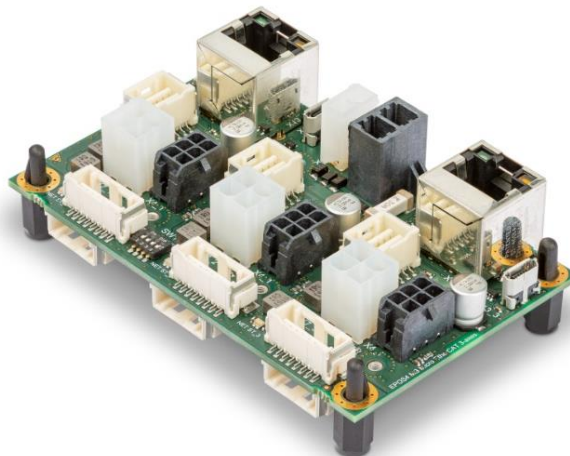
Please contact the maxon media office for more information.



maxon ECX Speed 4 with gearhead and encoder



EPOS4 Micro 24/5
EtherCAT positioning
controller



EPOS4 Compact 24/5 EtherCAT 3-axes

The Swiss specialist for quality drives

maxon is a developer and manufacturer of brushed and brushless DC motors, as well as gearheads, encoders, controllers, and entire mechatronic systems. maxon drives are used wherever the requirements are particularly high: in NASA's Mars rovers, in surgical power tools, in humanoid robots, and in precision industrial applications, for example. To maintain its leadership in this demanding market, the company invests a considerable share of its annual revenue in research and development. Worldwide, maxon has more than 3000 employees at nine production sites and is represented by sales companies in more than 30 countries.