News Release

New Ultra High Torque 22ECT Brushless Slotless Motor

Portescap introduces the newest addition to our Ultra EC™ mini motor platform, the 22ECT brushless motor, designed specifically to deliver ultra high torque in a compact size. With the unique coil technology and a patent pending multipolar rotor design, the 22ECT has been developed to be one of the most advanced and highest performing brushless slotless motors in its class. The 22ECT is specifically optimized for high continuous torque at low to medium speeds, maximizing power between 10 K and 20 K rpm. These motors are capable of delivering 2 times higher continuous torque than comparable BLDC motors of same size over the entire low speed range when used with gears.

The 22ECT is constructed with an enhanced high efficiency magnetic circuit that significantly reduces both iron and joule losses, the primary causes for motor stator heating. The result is the new 22ECT stays cooler and offers greater power density than equivalent models within its target operating zone. With maximum continuous torque up to 98.5 mNm and higher stall torque, 22ECT motors are ideally suited for use in applications such as Industrial automation, power tools & robotics.

Portescap succeeds in providing a high quality, long lasting & high performance brushless motor by optimizing the electro-mechanical motor design and material selection for 22ECT. Due to the multipolar design, these motors possess the torque capabilities of much bigger motors. The advantages of the 22ECT make it a good choice for geared applications because of its minimal speed drop and low motor heating under load. Their low inertia design makes them an exceptional option for applications requiring fast stopping, starting and acceleration.

The 22ECT is available in 60 and 82 mm length versions, with hall sensors and 3 different coils to match your speed and voltage requirements. Upon request, Portescap

can provide options for customization including gearboxes, encoders, coil variations and mechanical interface modifications.

Portescap is globally ISO 9001:2008 certified, and our production site in India is also ISO 13485, ISO14001:2004 and OHSAS 18001:2007 certified.

Maximum Continuous Torque*				
	Voltage	Frame Size		Torque
	(V)	Diameter (mm)	Length (mm)	mNm
Portescap	24	22	60	65
Comparative Motors	24	22	50-66	26-55
*Maximum Continuous Torque at comparable heat dissipation for 22mm diameter motors