

## **16mm Athlonix DC Miniature Motor Features Energy Efficient Coreless Design**

Portescap introduces the next frame size in the DCP range of Athlonix™ high power density brush DC mini motors. Athlonix DCP motors offer an optimized price-to-performance solution ideal for a broad spectrum of applications. Available in a 16 mm diameter, the new 16DCP motor features an energy efficient coreless design with an optimized self-supporting coil and magnetic circuit, which ensures optimum price-to-performance is delivered.

Athlonix 16DCP motors are available in 2 variations, precious metal commutation and graphite commutation, both featuring an Alnico magnet inside. The unique constant force spring design for carbon brush ensures consistent performance. An REE (Restriction of Electro Erosion) coil is an available option, which ensures extended life of the motor and provides an environment of intrinsic safety especially at high speed conditions.

With maximum continuous torque up to 2.63 mNm and higher stall torque than similar motors, Athlonix 16DCP motors are ideally suited for use in applications such as medical & industrial pumps, gas analyzers, security & access, power tools, mesotherapy guns and tattoo machines.

“Athlonix motors are powered by a proprietary self-supporting coil resulting into maximized magnetic flux and ampere-turns for a given diameter” says Sunil Kumar, Brush DC Product Line Manager at Portescap. “In contrast, typical self-supporting coils have inherent ampere-turns limitations that affect the magnetic flux density in the magnetic circuit, which further limits power output and endurance of the motor,” he says. Component standardization and design modularity ensures quick customization capability for samples across various applications.

“Due to lower motor regulation factor compared to comparable motors available in the market, our new 16DCP has higher load carrying capacity at minimum reduction in speed leading to more uniform power” says Sunil Kumar.

Athlonix motors are available with encoders and gearheads of various sizes and ratios. They are manufactured in an ISO certified facility and are RoHS compliant.

<b>Motor regulation factor</b>				
	Voltage	Frame Size		Motor regulation factor
	(V)	Diameter(mm)	Length(mm)	R/K2 (1000/Nms)
Portescap	12	16	26	247.5
Comparative motors	12	16	24-26	270.4 - 324