

## **Touchdown on comet successful – congratulations from maxon motor!** Rosetta mission employs Swiss drive technology.

**The European Space Agency (ESA) successfully landed a small laboratory on Comet 67P/Churyumov-Gerasimenko. The lander features ten instruments which may provide important clues to the origin of life. Two DC motors made by drive specialist maxon motor are on board the mission.**

Success! The European space probe Rosetta successfully guided its lander Philae to touch down on the four-kilometer Comet 67P/Churyumov-Gerasimenko, a.k.a. Chury. For the first time in the history of space exploration, scientists have access to substantial data from a comet's surface. The Philae lander has a mass of 100 kg and features ten instruments.

maxon motor is proud to be part of this mission. The Swiss-based drive specialist provided two DC motors, with a diameter of 13 mm each. These motors were used to lower the APXS instrument to the ground. The APXS is an alpha x-ray spectrometer that is used to record the chemical composition of Chury and provide information on the presence of key elements such as carbon and oxygen. The instrument was developed at the Johannes Gutenberg University Mainz.

### **10 years in vacuum**

The individual instruments were activated automatically in sequence. After a day and a half, precise micromotors lowered the APXS from the lander's belly to the surface of the comet successfully. This means the drives have survived the ten-year journey unscathed. Never before has a DC motor been exposed to vacuum for such a long time.

The Rosetta project is expected to continue until the end of 2015, when Chury returns to the outer reaches of our solar system. Until then, researchers want to collect as much data as possible from the comet's core and tail – and maybe answer the question of whether comets once brought water or even life to Earth.

*What's next?*

Follow [@maxonmotor](https://twitter.com/maxonmotor) on Twitter to stay up to date on the news from the Rosetta mission.

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*The Philae lander.*  
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*Comet 67P, compared with the circumference of Paris, France.*  
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