Implant against high blood pressure

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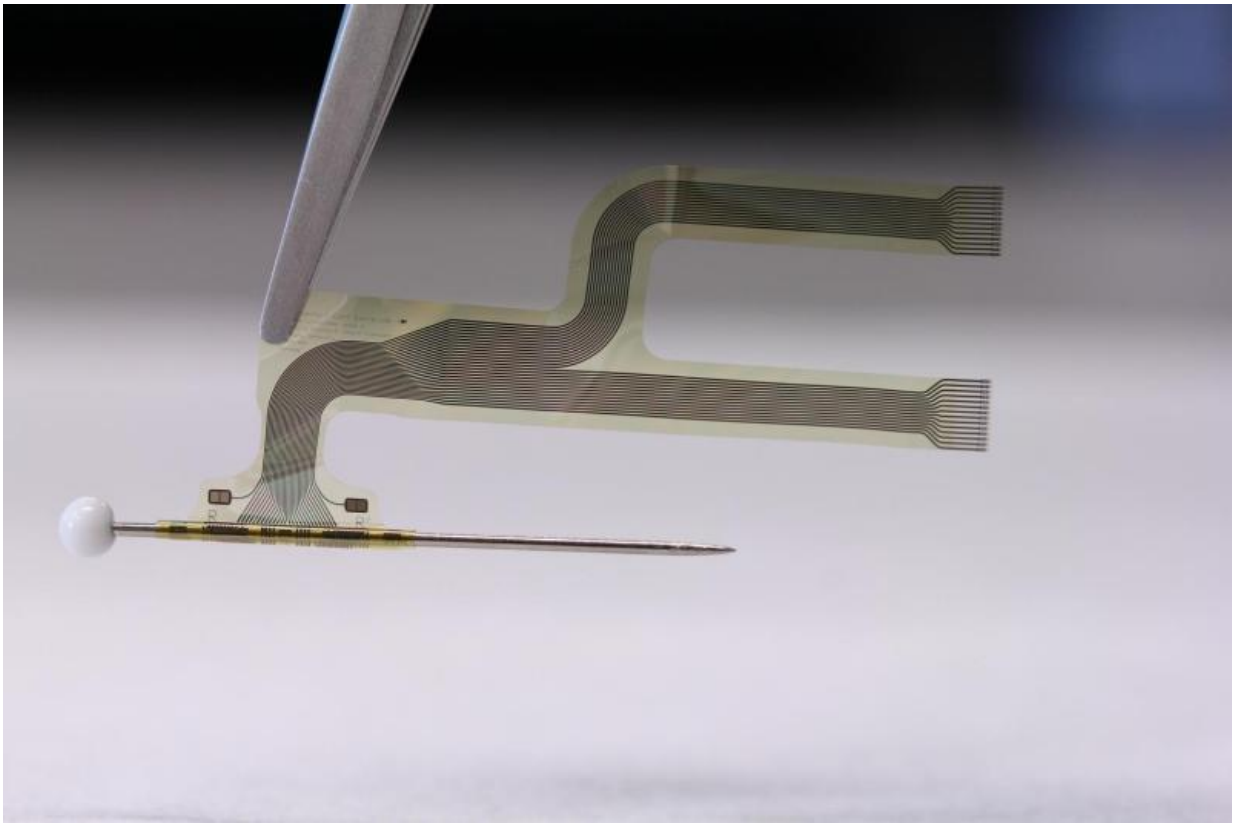

The Tuttlingen medical technology company Aesculap AG has founded the Freiburg startup neuroloop GmbH in cooperation with the University of Freiburg and the Freiburg University Medical Center. Building on research work from a team led by Prof. Dr. Thomas Stieglitz at the university's Department of Microsystems Engineering (IMTEK) and a

research group at the university medical center, the company plans to develop neurostimulators that will be capable among other things of lowering high blood pressure.

The University of Freiburg is one of Germany's oldest universities and stands for great innovative potential and scientific networking. "This is a prime example of how technologies from science and research can be implemented in market-ready products through a partnership between the university, the medical center, and companies from the region," explains Rector Prof. Dr. Hans-Jochen Schiewer.

"For Aesculap, the partnership means entry into the new field of functional neurosurgery, a market that has gained considerably in importance in the past years and will continue to experience rapid growth in the future," says Prof. Dr. Boris Hofmann, director of business development at Aesculap.

The microsystems engineers Dr. Dennis Plachta and Thomas Stieglitz from the Laboratory for Biomedical Microtechnology at IMTEK developed a novel cuff with electrodes for nerve stimulation in cooperation with the neurosurgeons Dr. Mortimer Gierthmühlen and Prof. Dr. Josef Zentner from the Freiburg University Medical Center in 2014. Plachta received the research prize of the Forum Angewandte Informatik und Mikrosystemtechnik ("Forum for Applied Computer Science and Microsystems Engineering") in January 2016.

The startup company neuroloop aims to develop the novel technology into a market-ready product in the coming years with a team of 15 engineers and scientists led by the Freiburg entrepreneur Dr. Michael Lauk and Dennis Plachta. The company expects to receive a license for the market-ready product in 2021.

"For start-ups, funding by a strong strategic partner like Aesculap is a

very interesting alternative to classic venture capital funding from the financial market," explains Managing Director Lauk. "The foundation of the company is the first step. The more ambitious part of the task no doubt still lies ahead of us. The team is looking forward to the challenges involved in developing the technology and getting it licensed in the coming years."

Provided by Albert Ludwigs University of Freiburg