

Rethinking Tools and Teams for Next Generation Endoscopy

Initiative: Kurswechsel – Forschungsneuland zwischen den Lebenswissenschaften und Natur- oder Technikwissenschaften

Ausschreibung: Qualifizierungskonzepte

Bewilligung: 04.07.2019

Laufzeit: 4 Jahre

Projekt-Website: <https://digitalhealth.tu-dresden.de/research/innovation-projects/ngscopes/>

Endoscopy has transformed the diagnosis and management of gastrointestinal diseases. Endoscope design, however, has only marginally changed in the last 40 years rendering them suboptimal tools far from current technology. The project's aim is to re-think endoscopes in an interdisciplinary pilot team of clinician scientists and engineers applying smart materials to reach a new level of multi-functionality, precision and haptic feedback. Further, the participating groups want to establish a new structured interdisciplinarity between medicine and engineering science. The overarching goals are to A) re-enable physicians to shape the 'tools of their trade', B) lower the hurdles for engineering innovation in medical applications and C) help attract the best minds in medicine and engineering science to this topic.

Projektbeteiligte

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