

Morten Bo Søndergaard Svendsen

Engineer, PhD

Summary

Scientific & Innovation Summary (as of August 2024): - 104 peer-reviewed publications (works in ORCID) - h-index: 25 | Citations: 2312 | i10-index: 45 (Google Scholar) - Supervision: 4 Ph.D. projects, 9 MSc-level, 9 BSc-level, and 9 engineering internships **Innovation Summary:** 2 patents, 8 patent applications

Experience Summary: - Engineering management, technical -pioneering, -development, and -research. Physiological imaging (perfusion, fluorescence guided surgery, thermography, LSCI), Medical Devices (Fluidbalance, perfusion, AI for ultrasound), Medical Simulation (Physical models, virtual reality trainers, automatic assessment)

Board, Affiliations, and Positions of Trust

(Past and present) *Young Academy of Science, Technology and Innovation* | *Danish Comprehensive Cancer Center - 3D print* | *Education Follow-Up Group, Healthcare Technology, DTU* | *AI Network, Capital Region of Denmark* | *AI Pioneer Center, University of Copenhagen / Technical University of Denmark* | *Strategic Board, Measurelet Aps* | *Section Board, University of Copenhagen, MARS* | *Educational Board, Technical University of Denmark, Aqua*

Funding and Grants:

Secured approximately 45 million DKK from various sources including AI Signature Project (DK GOV), DIREC, RegionH Innovation Fund, and the Danish Cancer Society.

Experience

Education

University of Copenhagen Ph.D., Biology (2013 - 2016) Thesis on marine biology; published 20+ papers. **Technical University of Denmark** M.Sc. Engineering (2006 -2012) Aquatic Science and Technology; member of DTU Aqua study board. **Aarhus University** FELASA B+C (Laboratory Animal Science) **Den Danske Skiskole** Basic Ski Instructor 1

Employments

Technical University of Denmark - Drug Delivery and Sensing (IDUN)
Senior Scientific Consultant (2024 - Present)

Assisting on the Energy Materials for the Gut (EMGUT) project. Development of intestinal benchtop simulation models, 3D design and print.

University of Copenhagen - Department of Computer Science (DIKU)

Associate Professor (2023 - 2024)

Focus on enhancing the connection between CAMES and DIKU, including technical research and validation.

Capital Region of Denmark - CAMES Engineering

Head of Engineering | Researcher | Engineer (2019 - 2024)

Leading digital and physical development projects in medical simulation, including ultrasound and robot-assisted surgery.

CAMES Rigshospitalet

Consultant | Researcher | Engineer (2017 - 2019)

Initiated collaborations with SMEs, founded CAMES Engineering.

University of Copenhagen - Marine Biology

Post.Doc (2017 - 2019)

Developed a numerical model for aquaculture systems, taught MSc classes.

University of Copenhagen - Marine Biology | Physiology

Ph.D. Fellowship (2013 - 2017)

Fish ecophysiology and investigations on harmful algae effects on fishes.

Commercialization

Synthetic Surgery

Founder (2023 - Present)

Production and development of training models for robotic surgery. Based on Ph.D. projects of Peter Hertz.

Prenaital

Founder (2023 - 2024)

Managing IP from SONAI project, collaborating with industrial partners for AI licensing. Exited for personal reasons.

Measurelet

Scientific Officer | Co-founder (2021 - 2024, Ad hoc)

Early-stage tech development and scientific research, focusing on AI/ML tools.

CTO | Co-founder (2018 - 2021)

Led product development, IP creation, and regulatory compliance for Measurelet Toilet.

Dianova A/S @ DTU

Technical Project Partner (2018 - 2020)

Worked on motion correction in perfusion imaging, led to IP transfer.

OceanData

Founder (2011 - Present)

Consulting in systems analysis, software programming, and data analysis.

External Relations

Network, Research, and Activities: - AMBU & Olympus - Endoscopy - Amsterdam UMC - ICG Imaging and Standardization - Arthrex GmbH - ICG Physiological Imaging - Avateramedical GmbH - Phantoms Robot-Assisted Surgery - Bispebjerg Hospital - GI Endoscopy - BoneSupport - Product evaluation phantom - Danish Comprehensive Cancer Center - 3D printing - Ferrosan Medical Devices - Robot-Assisted Surgery - Gentofte Herlev Hospital - Nursing and fluid balance - PyroScience GMBH - Oxygen sensing and respirometry - Rigshospitalet - Various departments (Surgical Imaging, Ultrasound, Medical Education)