



Phd Position SpineBot

BIROMED-Lab

Department of Biomedical Engineering

Join us for the project "In SEA2 SpineBot for Safe Intraoperative Intervertebral Stiffness Assessment".

Project background:

The project "In SEA2 SpineBot" aims to develop a spinal robotic impedance measurement system for adolescent idiopathic scoliosis (AIS) patients. The intra-operative device enables in vivo biomechanical analysis of the spine, potentially revolutionizing AIS treatment in the future. The project is a collaboration between the BIROMED-Lab at the University of Basel, the Paediatric Orthopaedic Spine Team of the University Children's Hospital | UKBB, and the Computational Bioengineering Group at the University of Bern.

Job description:

This position focuses on the continued development and optimization of a robotic device as well as conducting first clinical studies. The position (4 years) is funded by Swiss National Science Foundation. Start date: immediately or upon agreement. You will work at the Department of Biomedical Engineering located in the "Switzerland Innovation Park Basel Area Main Campus" in Allschwil, an exciting and modern working environment with various research groups. This position is supervised by PD Dr. med. Daniel Studer (UKBB Paediatric Orthopaedic Spine Team) and Prof. Dr. Georg Rauter (BIROMED-Lab).

Your profile:


- Master degree in robotics, mechanical or electrical engineering, or a closely related discipline
- Experiences in mechatronics and robotics
- Motivated team-player with strong interest in applied medical robotics research
- High level in written and spoken English is required

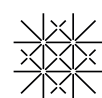


Ready to revolutionize AIS Research ? We are.

Apply for this project by email with the following materials:

- a letter of motivation that describes your interest in this position and relevant research experiences and capabilities (max. 1 page)
- CV
- diplomas and records
- name, phone number, and email address of at least two references

 **Want to know more about us?** check out www.dbe.biomed.unibas.ch and contact us by email for a lab visit.



**University
of Basel**

Department of
Biomedical Engineering