

Medizinische Fakultät

Masterstudium: Biomedical Engineering

Biomedical engineering, the application of engineering principles to the medical field is a growing interdisciplinary area of the present century. Thanks to increasing life expectancy, its potential is by far above average. In Switzerland, medical technology is a particularly well-established and well-embedded industry sector driving the international standards. Swiss companies are among the global players in key business areas such as dental implants and hearing aids. Small- to medium-sized enterprises, which occupy market niches, reap extraordinary rewards. Therefore, an increasing demand for well-educated and motivated engineers with basic medical knowledge is guaranteed.

Studienfachberatung:

Study Coordinator: Dr. Gabriela Oser, Department of Biomedical Engineering Mail: master-dbe@unibas.ch, <http://dbe.unibas.ch> Application: <https://dbe.unibas.ch/en/education/master-of-science/>

Modul: Basics in Human Medicine

52054-01	Vorlesung: Biology of Tissue Regeneration (3 KP)	Mo 15:15-17:00 Biozentrum, Seminarraum U1.195 wöchentlich	Andrea Banfi Andrea Barbero Nunzia Di Maggio Elisabeth Artemis Kappos Olga Krupkova Anna Marsano Ivan Martin Adrien Moya Karoliina Pelttari Arnaud Scherberich
52052-01	Vorlesung mit Praktikum: Anatomy (6 KP)	Do 09:15-12:00 Anatomie, Seminarraum wöchentlich Practical Part: Friday afternoon 2.12.22/ 9.12.22/ 16.12.22	Patrizia Amico Lucas Boeck Magdalena Filipowicz Sinnreich Niklaus F. Friederich Cristina Granziera Beat Göpfert Philip Haaf Patricia Hirt-Minkowski Beat Kaufmann Frank Serge Lehmann Matthias Matter Laurent Muller Alexander Navarini Katrin Parmar Jakob R. Passweg Regina Maria Marga Schläger Savas Deniz Soysal Anas Taha Luigi Tornillo Özgür Yaldizli Michael Zellweger
52053-01	Vorlesung mit Praktikum: Physiology (6 KP)	Di 16:15-18:00 Bernoullistrasse 30/32, kleiner Hörsaal 120 Fr 10:15-12:00 Rosshofgasse (Schnitz), Seminarraum S 01 wöchentlich	Florent Baty Christoph Berger Matthias Johannes Maximilian Betz Frank-Martin Häcker Markus Knupp Dieter Kunz Anna Marsano Claudio Rosso Markus Weber Christian M.H.R. de Geyter
Modul: Mathematics			
52055-01	Vorlesung mit Übungen: Mathematics for Biomedical Engineering I (5 KP)	Do 14:15-16:00 Anatomie, Seminarraum Fr 10:15-11:00 Biozentrum, Seminarraum 02.090 wöchentlich	Edgar Delgado-Eckert Georg Schulz
52057-01	Vorlesung mit Übungen: Mechanics in Biomedical Engineering (6 KP)	Mo 13:00-14:30 Gewerbstrasse 14, Vorlesungsraum DBE 14.03.002 Di 09:15-12:00 Gewerbstrasse 14, Vorlesungsraum DBE 14.03.002 wöchentlich	Manuela Eugster Nicolas Gerig Georg Rauter



52056-01	Vorlesung mit Übungen: Programming and Statistics for Medical Data Analysis (4 KP)	Di 13:15-15:00 Gewerbstrasse 14, Vorlesungsraum DBE 14.03.002 wöchentlich	Philippe Claude Cattin Pablo Sinues
Modul: Biomedical Engineering			
52059-01	Vorlesung: Clinical Biomechanics (3 KP)	Fr 08:15-10:00 Kollegienhaus, Hörsaal 115 wöchentlich	Nicolas Gerig Beat Göpfert Annegret Mündermann Corina Nüesch Georg Rauter Jacqueline Romkes Morgan Saugeux Heide Elke Viehweger
28421-01	Vorlesung: Materials Science and Biomaterials (5 KP)	Mi 08:15-12:00 Gewerbstrasse 14, Vorlesungsraum DBE 14.03.002 wöchentlich	Hans Deyhle Srinivas Madduri Bert Müller Bekim Osmani Griffin Rodgers Guido Sigron
28420-01	Vorlesung: Principles of Medical Imaging (3 KP)	Mo 08:15-10:00 Kollegienhaus, Hörsaal 114 wöchentlich	Oliver Bieri Philippe Claude Cattin
26937-01	Vorlesung mit Übungen: Data processing and control (4 KP)	Mi 13:15-16:00 Gewerbstrasse 14, Vorlesungsraum DBE 14.03.002 wöchentlich	Philippe Claude Cattin Nicolas Gerig Georg Rauter
Modul: Image-Guided Therapy			
55664-01	Blockkurs: Rapid prototyping for measurement systems, automation, control, artificial intelligence, and virtual reality (2 KP)	Block 13.02.2023 - 17.02.2023 each day 9:00 - 17:00 Hegenheimermattweg 167b, 4123 Allschwil	Nicolas Gerig Georg Rauter