

Biosensing and Bioelectronics

Basic information

Professor in charge: Tomi Laurila

Professors: Mervi Paulasto-Kröckel

Administrative contact: Study coordinator Päivi Koivunen

Extent: 20 credits

Abbreviation: -

Code: ELEC3046

Target group: Students from Masters' programme in Life Science Technologies and other Master students with sufficient prerequisites

Language: English

Prerequisite knowledge: Studies encompassing at least 60 (ECTS) credits in mathematics, chemistry/materials science, physics and computer programming, and minor ELEC3021 Bioinformation Technology or equivalent knowledge.

Objectives

After completing the minor the student has acquired the basic understanding of biomolecular science and bioelectrical phenomena, and comprehends how to use this understanding in the development of biosensing devices and bioelectrical instruments.

Content and structure

Code	Name	Credits	Period
Mandatory courses of the minor (20 Credits)			
ELECE8728	Tissue-foreign body interaction	5	I-II
ELEC-E8734	Biomedical Instrumentation	5	II
ELEC-E3260	Biomolecules P	5	III
ELEC-E8726	Biosensing	5	III-IV