Bachelor's degree in Biomedical Engineering

The bachelor's degree in Biomedical Engineering provides the knowledge needed to supervise and manage engineering projects related to the design of equipment for monitoring, diagnosis and treatment, and projects involving information and communication systems for healthcare, remote medicine, remote monitoring and equipment quality control. It takes a multidisciplinary approach to equipping students for careers in the fields of e-medicine, the capture of biosignals such as cardiovascular signals, neurosurgery and the treatment of pain, implants for orthopaedic surgery and traumatology, sports medicine, disposable medical devices, the management of biomedical teams and systems and the provision of technical advice, and the assessment and certification of medical technology. You will acquire skills in the analysis and interpretation of biomedical signals and images; biomechanics and biomaterials; sensors; quality-of-care improvement; and equipment and process optimisation. Although the bachelor's degree has been introduced recently, it is very popular, because it trains students to fulfil a new professional role for which the graduate employment rate is very high and in which graduates are quick to find employment.

GENERAL DETAILS

Duration
4 years

Study load
240 ECTS credits (including the bachelor's thesis). One credit is equivalent to a study load of 25-30 hours.

Delivery
Face-to-face

Language of instruction
Check the language of instruction for each subject (and timetable) in the course guide in the curriculum.

Information on language use in the classroom and students’ language rights.

Fees and grants
Approximate fees per academic year: €1,107 (€1,661 for non-EU residents). Consult the public fees system based on income (grants and payment options).

Location
Barcelona East School of Engineering (EEBE)

Official degree
Recorded in the Ministry of Education's degree register

ADMISSION

Places
55

Registration and enrolment
What are the requirements to enrol in a bachelor's degree course?

Legalisation of foreign documents
All documents issued in non-EU countries must be legalised and bear the corresponding apostille.

DOUBLE-DEGREE AGREEMENTS
PROFESSIONAL OPPORTUNITIES

Professional opportunities

- Supervision and management of projects involving the conception, design, manufacture, assessment and certification of biomedical healthcare products and services.
- Design of equipment for monitoring, diagnosis and treatment for healthcare and remote medicine.
- Supervision and management of projects for quality-of-care and process improvement.
- Assessment and certification of medical technology.
- Biomedical technology companies.
- Departments of clinical engineering for healthcare.
- Teaching and research.
- Professions in which engineering principles are applied to medicine in the fields of biomedical equipment related to e-medicine, cardiovascular signals, neurosurgery and the treatment of pain, implants for orthopaedic surgery and traumatology, dental technology, sports medicine, disposable medical devices, the management of biomedical teams and systems and the provision of technical advice, and the assessment and certification of medical technology.

ORGANISATION: ACADEMIC CALENDAR AND REGULATIONS

Academic calendar
General academic calendar for bachelor’s, master’s and doctoral degrees courses

Academic regulations
Academic regulations for bachelor’s degree courses at the UPC

Language certification and credit recognition
Queries about language courses and certification

Barcelona East School of Engineering (EEBE)

CURRICULUM

<table>
<thead>
<tr>
<th>Subjects</th>
<th>ECTS credits</th>
<th>Type</th>
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<td><strong>FOURTH SEMESTER</strong></td>
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October 2022. [UPC](http://www.upc.edu). Universitat Politècnica de Catalunya · BarcelonaTech