Bachelor's Degree in
Aerospace Engineering

Introduction to the degree

The Bachelor’s Degree in Aerospace Engineering aims to provide its future graduates with scientific and technical training, so that they can meet the needs of the aviation industry and administration, of air transport, and of research in the aeronautics and aerospace fields. The solid and profound scientific and technical training that it provides culminates in one of the following specific technology modules: Aircrafts, Air Navigation, Airports, Aerospace Equipment and Materials, and Propulsion. These modules qualify students for practising the profession of aeronautical technical engineer in each of the areas that it comprises.

Internships

Students of the Bachelor’s Degree in Aerospace Engineering can do internships in companies (which in some cases include the preparation of the student’s bachelor’s thesis). Practices will be held in companies belonging to different industrial sectors -especially to the aerospace sector-, and their aim will be for students to get to know professional reality, under the tutelage of a company technician and a professor of the degree.

International mobility

Students can complete their training abroad thanks to the numerous agreements with universities in Europe (Technische Universität München, Università degli Studi di Roma La Sapienza, University of Leeds...), America (University of Illinois, Georgia Institute of Technology...) and Australia (University of New South Wales).

Continuation of studies

With this degree, you will be able to access to:

- MD in Aeronautical Engineering
- MD in Mechanical Engineering
- MD in Reciprocating Internal Combustion Engines
- MD in Maintenance Engineering
- MD in Automation and Industrial Informatics
- MD in Project Management
- MD in Integrated Computer-Aided Design and Manufacturing
- MD in Business, Product and Service Management
- others MD + levelling subjects

Professional opportunities

With this degree, which presents many varied job opportunities, you will be able to work in the aviation sector, in airlines, in the aviation and aerospace industry and infrastructure, in military aviation, in airport management... and also in the following sectors: car industry, transportation, telecommunications, energy, electronics, IT consulting... You can create your own business, or freely practise as an engineering advisor and consultant. Moreover, you can also choose a public administration career (as a European Union, national, regional or local administration civil servant or employee); or a career in research, development and innovation (at public or private education centres, or in R&D departments of large companies) or in teaching.

Study at the

Enjoy our huge campuses with spaces designed for you such as the Student Recreation House.

You can do up to 70 sports in our facilities.

You will find many services at your disposal: language classes, discounts in public transport, counselling, employability support...
Bachelor's Degree in Aerospace Engineering

Credits for obtaining the degree

<table>
<thead>
<tr>
<th>Basic courses</th>
<th>Compulsory</th>
<th>Optional</th>
<th>Internship</th>
<th>TFG</th>
<th>Total</th>
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<tr>
<td>60.00</td>
<td>88.50</td>
<td>79.50</td>
<td>0.00</td>
<td>12.00</td>
<td>240.00</td>
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The subjects that you will be able to take

**Basic courses**
- Business Administration
- Chemistry
- Computer Science
- Mathematics I - II
- Physics
- Statistics
- Technical Drawing

**Compulsory courses**
- Aerodynamics
- Aerospace Manufacturing
- Aerospace Technology
- Air Transport, Air Navigation, and Air Traffic Management
- Airport Engineering
- Automatic Control
- Electrical Engineering
- Electronic Engineering
- Flight Mechanics
- Fluid Mechanics
- Material Science
- Mathematics III
- Mechanics
- Propulsion
- Strength of Materials
- Thermodynamics

**Elective courses**
- A. Mechanics
- Academic and Professional German A1 - A2 - B1 - B2
- Academic and professional Italian A1 - A2
- Academic Writing Skills for Final Degree Projects
- Advanced Fluid Mechanics
- Advanced Topics in Strength of Materials
- Aerodynamics II
- Aeroelasticity
- Aeronautical Cartography
- Aerospace Structures
- Aerospace Technology II
- Air Navigation, Cartography, and Cosmography
- Air Navigation Infrastructures
- Air Navigation Systems Engineering I - II
- Air Traffic Management I
- Air Transport Operation
- Aircraft Design
- Aircraft Maintenance
- Airport Installations
- Airport Planning and Design
- Airspace Management II
- Applications of Geographic Information Systems to Aerospace Engineering
- Automatic Control Technology
- Combustion
- Computer-Aided Aeronautic Design
- Efficiency in Airport Electrical Grids
- Electronic Technology
- Embedded System Design, Validation and Certification
- Embedded Systems for Navigation and Control
- English Level B2
- European Project Semester (EPS)
- Experimental Techniques for Propulsion Systems
- Flight Control Systems
- Flight Dynamics (II)
- Heat and Mass Transfer
- Helicopters and Other Aircraft
- Intercambio I - II
- Introduction to Aeronautical Engineering
- Jet Engines and Aeroacoustics
- Maintenance of Engines. Fuels and Lubricants
- Materials for Aircrafts
- Mechanical Vibrations
- Orbits, Satellites and Relativity
- Reciprocating Internal Combustion Engine
- Rocket Engines
- Scientific and Technical French B1
- Space Vehicles and Missiles
- Structural Analysis of Propulsion Systems
- Sustainable Development and Environmental Ethics
- Technical English
- Thermal Turbomachinery
- University Cooperation for Development
- Valencia Tècnic C1 - C2
- Waves and Electromagnetic Propagation

Internationally accredited bachelor's degree (EUR-ACE – ABET)