

Title: **The first year of the Bachelor Degree in Chemistry at the University of Barcelona and other Spanish universities:
Analysis of the characteristics, structure and contents**

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Bachelor Degrees in Science devote the first year to basic training. Despite are the same Degree there may be some differences: the content of the subjects is not identical, nor are the same hours devoted to the different teaching activities (theoretical classes, laboratory practices, etc.).

This study compares the chemistry subjects of the first year of the Bachelor Degrees in Science in Chemistry at the Universitat de Barcelona (UB) with other universities of interest to see how similar or different the organization of subjects, the syllabus and the ECTS can become.

To compare universities, three kinds of studies are performed: the organizational model of subjects; the contents, with a qualitative study of what types of thematic blocks are taught in chemistry subjects; and the planning of teaching activities, with a quantitative study of the hours and ECTS related to them.

For the qualitative study, the content of the subjects destined to chemistry is classified in the following thematic blocks: Chemical Foundations, Chemical Structure and Bonding, Balance, Thermodynamics, Kinetics, Electrochemistry and Basic Laboratory Operations. It will be analysed which universities teach these blogs.

The quantitative study focuses on the chemistry subjects and calculates how many ECTS are allocated to the most important face-to-face (contact) teaching activities: those taught in classrooms (Lecture: theoretical classes, problems, seminars) and laboratory practices. This study is based on the information provided by the curricula: number of hours of laboratory practice, hours of theory and problems, among others.

Finally, all the information is analysed to determine if there are substantial differences between the UB and the others the universities.