Introduction à l'étude des plantes médicinales

Lecturer

Caroline STEVIGNY (Coordinator)

Course mnemonic BIOL-J201

ECTS credits 5 credits

Language(s) of instruction French

Course period Second term

Course content

A brief history of the systematic and presentation of the main systematic classifications of flowering plants. Interest in Botany and Systematics aspects for pharmacists. Introduction to the secondary metabolites. Presentation of the botanical families of interest to pharmacists following the ultimate version of the systematic classification of the Angiosperm Phylogeny group. For each of the botanical families, presentation of morphological characteristics and tools/features that distinguish them from each other. For each of these families, presentation of major medicinal plants and their medicinal uses and the secondary metabolites responsible of their activities. At the same time presentation by family of most toxic plants and the molecules responsible of their toxicities.

Achieving a personal herbarium of medicinal plants as well as practical work and excursions are designed to help students to differentiate the different botanical families of our regions and to distinguish poisonous and medicinal plants. The practical work will also help students with the use of identification key (Flora)

Objectives (and/or specific learning outcomes)

At the conclusion of this course, students will be able to distinguish and identify the main toxic and medicinal plants of our regions (organography aspects). They will also be familiar to the different classes of secondary metabolites and teir therapeutic indications. At the end of the course, students will know the Latin names and main uses of medicinal plants

The knowledge acquired at the end of this course is essential and is the basis for learning the BA3 course entitled PHAR-J-303

Pre-requisits and co-requisits

Pre-requisites courses

BIOL-J102 | Biologie végétale | 5 crédits

Courses having this one as pre-requisit

PHAR-J303 | Etude des médicaments : Pharmacognosie et médicaments d'origine naturelle | 5 crédits and TRAN-J312 | Pratique officinale | 10 crédits

Teaching method and learning activities

Lecture (PowerPoint presentations), practical work (demonstrations, botanical excursion, analysis of fresh plants, guided tour of the Museum of medicinal plants of the Faculty of Pharmacy). Realization by the students of a herbarium of medicinal plants.

An optional course is organized every year (July) in Peyresq (Alpes de Haute Provence, France). Title of course: "Plantes Médicinales en Haute Provence". This course is dedicated to students who want to progress on the achievement of the personal work: the herbarium of medicinal plants. More details on the Faculty website.

References, bibliography and recommended reading

GUIGNARD J.L. and DUPONT f., 2012. Botany. Molecular systematics. 15th edition. Masson

Other information

Contact(s)

Caroline Stevigny, Laboratory of Pharmacognosy, Bromatology and Human Nutrition, CP 205/09

Evaluation method(s)

Other

Evaluation method(s) (additional information)

During the June session :

- > Theoretical written exam, on the entire course : true ar false, short questions, recognizing chemical structures, fresh plant identification
- Oral theoretical exam, on the entire course, as well as the herbarium. Starting point of the oral examination: the teacher chooses 5 boards of the student's herbarium.
- > Evaluation of the respect of the herbarium's guidelines

All students come at 8am to Jardin Jean Massart carrying their herbarium. If the student has an incomplete herbarium, it will not be admitted to the examination.

During the academic year, second semester:

> Practical work (evaluation during the practical sessions)

Determination of the mark (including the weighting of partial marks)

Written theoretical exam: 30% of the mark

Oral theoretical exam + evaluation of the herbarium: 50% of the mark

Assessment of practical work (continuous assessment during the year, is organized only once per academic year): 20% of the mark

Main language(s) of evaluation French

Programmes

Programmes proposing this course at the faculty of Pharmacy

BA-PHAR | Bachelor in Pharmacy | unit 2