



BIOL2283 Plant molecular and cellular biology

[30h+15h exercises] 3.5 credits

This course is taught in the 1st semester

Teacher(s): François Chaumont

Language: French
Level: Second cycle

Aims

To understand the way the expression of genes and proteins is specifically regulated in the cells and tissues during the development of the plant under the effect of internal or external stimuli. After this course the student will be capable of understanding and explaining the strategies and methodologies of molecular and cellular biology used to discover the functioning of a plant.

Main themes

This course completes by molecular data the teaching of morphogenesis and vegetal development seen at the level of the organism and its physiology. The starting point is the plant in development exposed to various environmental stimuli. The regulation of gene and protein expression at different developmental stages and in different environmental conditions will be studied. The subjects in this course will have to be adaptable to scientific actuality and correspond to the interests of students.

Other information (prerequisite, evaluation (assessment methods), course materials recommended readings, ...)

Prerequisites: basic courses in plant biology (physiology and morphogenesis), cellular biology and molecular genetics. Evaluation: students choose a theme in accordance with the teacher, they go thoroughly into it by searching and analysing recent scientific articles. Students present their own work in the form of about ten pages assay that they set out to other students. The teacher evaluates written work, oral presentation and defense. Support: books, research and review articles.

Other credits in programs

BIOL22/A Deuxième licence en sciences biologiques (Biologie (3.5 credits)

moléculaire, cellulaire et humaine)

BIOL22/B Deuxième licence en sciences biologiques (Biologie des (3.5 credits)

organismes et des populations)