UCLouvain

2019

lbio1352a

Practical work in ecology and biogeography

In view of the health context linked to the spread of the coronavirus, the methods of organisation and evaluation of the learning units could be adapted in different situations; these possible new methods have been - or will be - communicated by the teachers to the students.

4 credits

15.0 h + 25.0 h

Q1 and Q2

Teacher(s)	Wesselingh Renate ;			
Language :	French			
Place of the course	Louvain-la-Neuve			
Main themes	BIO1352A : The students learn the biogeography of Belgium : the different biogeographical zones that are characterized by their climate, bedrock, and topography, and how these factors influence the composition of the local flora and fauna. In each zone, different successional stages can be found, and the students learn how to link these stages and determine the factors that are responsible for the transitions between stages. The role of human activities in determining the composition of flora and fauna, and the successional stage is an important element of the course. BIO1352B : The students refine their skills in identifying the different taxonomical groups (seed plants, insects, birds), for which they will put together a herbarium and a collection of insects. They have to relate their observations with the environment : soil type, plant community, biogeographical zone, etc. Experiments with germinating the seeds in the soil seed bank teach them how to use this important technique used in determining the restoration potential of a site. Overall, the work will give them the opportunity to fully understand the notions of ecosystems and biodiversity and the problems linked to its conservation.			
Aims	The contribution of this Teaching Unit to the development and command of the skills and learning outcomes of the programme(s) can be accessed at the end of this sheet, in the section entitled "Programmes/courses offering this Teaching Unit".			
Evaluation methods	Due to the COVID-19 crisis, the information in this section is particularly likely to change. BIO1352A : a written report is to be made for each region, and the student will have to demonstrate his/her capacity to synthesize the information obtained during the whole course at an oral exam in June. BIO1352B : Each group has to hand in the herbarium collection and the insects collected, with a written report that describes the flora, fauna and soil seed bank. They will present their results orally in front of the other students.			
Content	BIO1352A : Several excursions are organized to different regions in Belgium (Brabant Wallon, Ardennes, the coast, Condroz, Fagne-Famenne, Calestienne), where we will visit sites with typical vegetations and animal communities. The students identify the plants present and measure pH of the soil, while information on geology, geomorphology and climate necessary to explain the composition of flora and fauna will be given. The excursions take place in September-October, plus one at the end of November (1st semester), and in April-May (2nd semester). BIO1352B : At the very start of the year (first week of the 1st semester), the students are subdivided into groups of (3-)4 or 5 people, and each group will get a different biologically interesting site in Brabant Wallon. They will have to make a complete inventory of the flora, complete with a herbarium collection, and they must identify the insects and birds they encounter. Sessions to learn how to identify insects are organized at the start of the 1st semester, plus an excursion to learn to recognize birds by their song in April in the 2nd semester. During winter, the students study the seed bank in soil samples taken in their site, by germinating the seeds in the greenhouse and identifying the seedlings.			
Other infos	identification guides, bird song recordings on moodle.			
Faculty or entity in charge	SC			

Programmes containing this learning unit (UE)						
Program title	Acronym	Credits	Prerequisite	Aims		
Additionnal module in Biology	LBIOL100P	4		٩		