

Sustainable Development (K000253)

Due to Covid 19, the education and evaluation methods may vary from the information displayed in the schedules and course details. Any changes will be communicated on Ufora.

Course size (nominal values; actual values may depend on programme)
Credits 5.0 Study time 150 h Contact hrs 45.0 h

Course offerings and teaching methods in academic year 2020-2021

Offering	Language	Location	Teaching Method	Hours
A (semester 2)	English	Gent	seminar	5.0 h
			lecture	32.5 h
			microteaching	7.5 h

Lecturers in academic year 2020-2021

Mazijn, Bernard PS05 lecturer-in-charge

Offered in the following programmes in 2020-2021

Programme	crdts	offering
Master of Science in Teaching in Science and Technology (main subject Geography)	5	A
Master of Science in Physical Land Resources (main subject Land Resources Engineering)	5	A
Master of Science in Physical Land Resources (main subject Soil Science)	5	A
Master of Science in Geography	5	A
Master of Science in Bioscience Engineering: Forest and Nature Management	5	A
International Master of Science in Sustainable and Innovative Natural Resource Management	5	A

Teaching languages

Dutch, English

Keywords

Sustainable development, Agenda 21, UN conventions and conferences (incl. political power relationships), Agenda 2030, ecosystem services, energy and climate change, agriculture and food, policy (VN, EU ...), indicators (incl. SDGs), transition towards a circular economy (incl. innovation), CSR, integrated chain management (incl. LCA)

Position of the course

This course aims to impart to students an insight into the complexity of implementing the concept of sustainable development, in terms both of content and of policy.

Contents

Since the beginning of the 90s, the term 'sustainable development' has been widely adopted in common language. The concept of 'sustainable development' is defined as a 'development that meets the needs of today without jeopardizing the provision of needs for future generations'. The global pursuit of this objective gained momentum in the UN report 'Our Common Future' (1987) and during the UN Conference on Environment and Development (Rio de Janeiro, 1992). Yet, the results of both the report and the conference need to be seen as a provisional synthesis of what preceded. Later on, the international conferences on issues such as population growth, social development, human settlement ... and the 'millennium development goals', however, cannot be seen as anything other than part of this preliminary synthesis. The most recent overall synthesis was made at the United Nations Conference on Sustainable Development (Rio de Janeiro, June 2012), the so-called Rio+20 conference. In the meantime, de Sustainable Development Goals (SDGs) together with the Agenda 2030 have been decided (New York, September 2015). In the first section of the course, we will go briefly into the history and the conceptual framework. Next, the international agreements emerging from the UN Conference in

Rio de Janeiro (1992) constitute an important starting point from which the developments of the past decades will be outlined, on the basis of, among other things, the UN Framework Convention on Climate Change/Kyoto Protocol/Paris Agreement and other UN conventions and conferences (biodiversity, desertification, forests ...). We will also discuss the results of the so-called Rio+20 conference to make up a state of play. Finally, we will present a state of affairs concerning the implementation at the different levels of policy: the United Nations, European ... strategy with respect to sustainable development. During this first part students are asked in small groups to read a paper, to discuss and to present it.

The second section of the course is a 'status questionis' of the way in which the concept is operationalized. We will try to come up with an answer to different questions: how can sustainable development be measured at various levels of policy? does environmental utilization space constitute a framework for testing, for example, for calculating the 'ecological debt' or the 'planetary boundaries'? what are the patterns in sustainable production and consumption? does innovation plays a role? what is 'transition towards a circular economy'? what about the worldwide 'War on Resources'? what are the criteria employed in assessing goods and services? Central to our elaboration are the mutual relations between the different dimensions of sustainable development. In this second section of the course, the lectures will be alternated with workshops presupposing active participation by the students.

Note: because of COVID-19, changed working methods - on campus and / or online - can be rolled out if this proves necessary. In any case, students residing outside Belgium will be able to follow this course.

Initial competences

To give evidence of an academic level of thinking and working, and of a frame of thought that enables to go deep into the scientifically sound study of the problems of environment and development, i.e. 'sustainable development'.

Final competences

- 1 To have knowledge of the general conceptual framework and the historical and current evolutions concerning sustainable development, including from a global perspective (cf. the relation with the Global South).
- 2 To gain insight in the complexity of operationalising sustainable development, incl. from a global perspective (cf. the relation with the Global South).
- 3 To be able to assimilate and formulate a critical comment on whether or not scientific analyses concerning sustainable development.
- 4 To have the capability to work together in a inter- and multidisciplinary setting, as well as to communicate about the results of this cooperation.

Conditions for credit contract

Access to this course unit via a credit contract is determined after successful competences assessment

Conditions for exam contract

Access to this course unit via an exam contract is unrestricted

Teaching methods

Lecture, microteaching, seminar

Extra information on the teaching methods

Ex cathedra teaching and interactive workshops, micro teaching by students. Participation at the micro teaching is mandatory.

Learning materials and price

Documents and slides made available for free through Ufora.

References

WCED (World Commission on Environment and Development), (1987), Our Common Future, Oxford University Press, Oxford/New-York.

International scientific reports.
List with references for each chapter.

Course content-related study coaching

By appointment.

Evaluation methods

end-of-term evaluation and continuous assessment

Examination methods in case of periodic evaluation during the first examination period

Written examination with open questions, written examination with multiple choice questions,

open book examination, assignment

Examination methods in case of periodic evaluation during the second examination period

Written examination with open questions, written examination with multiple choice questions, open book examination, assignment

Examination methods in case of permanent evaluation

Possibilities of retake in case of permanent evaluation

examination during the second examination period is possible

Extra information on the examination methods

Participation in the microteaching is a mandatory prerequisite to participate in the periodic evaluation, unless otherwise agreed with the teacher (see Facilities for working students).

Calculation of the examination mark

Microteaching (in case a paper for working students) (10 %)

Written exam open questions and/or with multiple-choice questions (45%), open book examination (45%)

Facilities for Working Students

The mandatory micro teaching can be substituted by the writing of a short paper. The topic should be agreed upon by the lecturer.