



The University of Southern Queensland

Course specification

Description: Sustainability Science						
Subject	Cat-nbr	Class	Term	Mode	Units	Campus
REN	8203	55201	2, 2006	EXT	1.00	Toowoomba

Academic group:	FOSCI
Academic org:	FOS002
Student contribution band:	2
ASCED code:	050999

STAFFING

Examiner: Grant Daggard
Moderator: Geoff Cockfield

REQUISITES

Pre-requisite: REN8101

RATIONALE

The concept of sustainability and its application through the approaches of ecologically sustainable development are growing in prominence in government policies and in business planning, both domestically and internationally. A conceptual understanding of what sustainability means and an appreciation of the range of methods and practices developed by the emerging discipline of sustainability science is required by scientists, government managers and industry. This course aims to provide an understanding of the interdisciplinary nature of sustainability science and its contribution to resource management.

SYNOPSIS

Modern environment and natural resource management requires the credible integration of social, environmental and economic issues within an interdisciplinary framework. It also requires different methods of analysis and different approaches to governance and community engagement. In recent years sustainability science has emerged as a new multi-disciplinary approach to science that recognizes the limitations of traditional scientific inquiry in dealing with the complex reality of social institutions interacting with natural phenomena. It provides a foundation for placing sustainability issues into a rigorous conceptual and analytical framework. This course provides a comprehensive overview of the theory of sustainability and the emergence of new approaches for addressing complex environment and natural resource management issues. Examples are drawn from how Australia and other nations have addressed regional and global issues.

OBJECTIVES

On completion of this course students will be able to:

1. demonstrate an understanding of the core questions of sustainability science;
2. demonstrate an understanding of the implications of governmental and political dimensions of sustainability;
3. evaluate the differences, linkages and conflicts in economic development, sustainable development and sustainability;
4. critically analyse scientific, social and economic information to provide informed decision-making in relation to sustainability issues;
5. demonstrate a capacity to assess potential options, strategies and outcomes for achieving sustainability

TOPICS

Description	Weighting (%)
1. Theories of sustainability	25.00
2. Institutional approaches for sustainable development	25.00
3. Community engagement & participatory planning	25.00
4. Measuring and modelling sustainability	25.00

TEXT and MATERIALS required to be PURCHASED or ACCESSED

ALL textbooks and materials are available for purchase from USQ BOOKSHOP (unless otherwise stated). Orders may be placed via secure internet, free fax 1800642453, phone 07 46312742 (within Australia), or mail. Overseas students should fax +61 7 46311743, or phone +61 7 46312742. For costs, further details, and internet ordering, use the 'Textbook Search' facility at <http://bookshop.usq.edu.au> click 'Semester', then enter your 'Course Code' (no spaces).

REFERENCE MATERIALS

Reference materials are materials that, if accessed by students, may improve their knowledge and understanding of the material in the course and enrich their learning experience.

Christie I & Warburton D 2001, *From Here to Sustainability: Politics in the Real World*, Earthscan Publications,

Common M 1995, *Sustainability and Policy: Limits to Economics*, Cambridge University Press, England.

Gunderson L & Holling C 2001, *Panarchy: Understanding Transformations in Human and Natural Systems*, Island Press,

Kasemir B, Jager J, Jaeger C & Gardner M 2003, *Public Participation in Sustainability Science*, Cambridge University Press, England.

Norton B 2003, *Searching for Sustainability*, Cambridge University Press, England.

Sayer J & Campbell B 2004, *The Science of Sustainable Development*, Cambridge University Press, England.

STUDENT WORKLOAD REQUIREMENTS

ACTIVITY	HOURS
Directed Study	80.00
Private Study	86.00

ASSESSMENT DETAILS

Description	Marks out of	Wtg(%)	Due date
ASSIGNMENT 1	50.00	50.00	25 Jul 2006 (see note 1)
ASSIGNMENT 2	50.00	50.00	25 Jul 2006 (see note 2)

NOTES

1. The due date for Assignment 1 will be advised by the examiner.
2. The due date for Assignment 2 to be advised by the examiner.

IMPORTANT ASSESSMENT INFORMATION

- 1 Attendance requirements:
There are no attendance requirements for this course. However, it is the students' responsibility to study all material provided to them or required to be accessed by them to maximise their chance of meeting the objectives of the course and to be informed of course-related activities and administration.
- 2 Requirements for students to complete each assessment item satisfactorily:
To complete each of the assignments satisfactorily, students must obtain at least 50% of the marks available for each assignment.
- 3 Penalties for late submission of required work:
If students submit assignments after the due date without prior approval then a penalty of up to 20% of the total marks gained by the student for the assignment will apply for each working day late.
- 4 Requirements for student to be awarded a passing grade in the course:
To be assured of receiving a passing grade a student must submit all of the summative assessment items, and achieve at least 50% of the available weighted marks for the summative assessment items.
- 5 Method used to combine assessment results to attain final grade:
The final grades for students will be assigned on the basis of the weighted aggregate of the marks obtained for each of the summative assessment items in the course.
- 6 Examination information:
There is no examination for this course.
- 7 Examination period when Deferred/Supplementary examinations will be held:
There are no Deferred or Supplementary examinations for this course.
- 8 University Regulations:
Students should read USQ Regulations 5.1 Definitions, 5.6. Assessment, and 5.10 Academic Misconduct for further information and to avoid actions which might contravene University Regulations. These regulations can be found at the URL <http://www.usq.edu.au/corporateservices/calendar/part5.htm> or in the current USQ Handbook.

ASSESSMENT NOTES

- 9 The due date for an assignment is the date by which a student must despatch the assignment to the USQ. The onus is on the student to provide proof of the despatch date, if requested by the Examiner. Students must retain a copy of each item submitted for assessment. This must be produced within five days if required by the Examiner. In the event that a due date for an assignment falls on a local public holiday in their area, such as a Show holiday, the due date for the assignment will be the next day. Students are to note on the assignment cover the date of the public holiday for the Examiner's convenience. Students who, for medical, family/personal, or employment-related reasons, are unable to complete an assignment or to sit for an examination at the scheduled time may apply to defer an assessment in a course. Such a request must be accompanied by appropriate supporting documentation. One of the following temporary grades may be awarded IDS (Incomplete-Deferred Examination); IDM (Incomplete Deferred Make-up); IDB (Incomplete-Both Deferred Examination and Deferred Make-up).
- 10 A Course Assignment Cover Sheet must be signed by the student and attached to all assignments submitted for assessment. Failure to do so may result in the assignment not being marked.