

Module descriptor

Module code:	ENGM067	
Module title:	Sustainable Development Applications	
FHEQ level:	7	
Module Leader:	Stephen Morse	
Other contributors:	Ian Christie plus various guest speakers from the public, private and 'Third' sectors	
Number of credits:	15 credits	
Number of ECTS credits:	7.5	
Module availability:	Semester 1	
Overall student workload:	150 hours overall student workload.	
Date of production/revision of the descriptor:	March 2017	
Assessment pattern		
<u>Units of assessment</u>	Weighting towards module mark (%)	
Pre-module individual critical review (maximum 1000 words) of a corporate sustainability report or similar document from a public agency	25%	
Post-module individual written assignment (maximum 3000 words)	75%	
<u>Alternative assessment</u> : repeat of assignment with different subject from supplied list		
<u>Qualifying condition(s)</u> A weighted aggregate mark of 50% is required to pass the module		

Pre-requisite/co-requisites

None

Module overview

This module provides an introduction to Sustainable Development for students primarily concerned with industrial ecology, and a consolidation and deepening of understanding for students focusing on sustainable development and corporate environmental management, who also take the Foundations of Sustainable Development module.

Module aims

This module aims to:

The module aims to raise awareness among students as to the meaning of sustainable development but in particular its application in a variety of contexts spanning the public, private and 'Third' sectors. The emphasis is very much upon a critical analysis of practice rather than the theoretical and ethical basis for sustainable development (covered in the SD-Foundations module).

Learning outcomes

On successful completion of this module, students will be able to:

- Understand the basic issues in implementing and managing sustainable development (K)
- Understand challenges and emerging solutions in public and private sector organisations (P, C)
- Understand issues in the integration of SD in national and local development policies and plans (C)
- Engage in debates about the practical implementation and management of sustainable development policies and plans in business and governance (P, T)

Key: C-Cognitive/Analytical; K-Subject Knowledge; T-Transferable Skills; P- Professional/ Practical skills

Module content

Indicative content includes:

The module will cover the following topics:

- Summary of foundational issues in SD: origins, Brundtland, I=PAT equation, SD strategies and contested ideas
- Measuring sustainable development (indicators. Sustainable Livelihood Approach, remote sensing)
- Sustainable production and consumption: SD in relation to Industrial Ecology, concept and practice of the Maximum Sustainable Yield (MSY) in fishery management
- Case studies of SD challenges, policies and management in mining, production of consumer goods, retailing, finance, health services
- Case studies of SD and Sustainable Livelihood Approach in the Global South
- Case study of SD communications
- Communication and leadership issues in management for SD
- Issues in implementation of SD policies
- Analysis of key texts and discussion of films offering case studies

Methods of teaching/learning

The learning and teaching strategy is designed to:

The module is designed to provide an introduction to sustainable development, including an awareness of some of the key issues in implementation being faced today. The module is very much geared towards application rather than theory. Hence a number of guest speakers from the public, private and 'Third' sectors are invited to talk about some of the key issues that they have faced making sustainability a reality in their own context.

The learning and teaching methods include:

1. Pre course study involving the analysis of a sustainability report
2. Lectures from module team and various guest lecturers from the public, private and 'Third' sectors.
3. Group exercises
4. Audio and video presentations
5. Post course study linked to main assessment

Items 2, 3 and 4 = 35 hours contact time in one week (Monday to Friday)

Item 1 = 30 hours

Item 5 = 85 hours

Assessment strategy

The assessment strategy is designed to provide students with the opportunity to demonstrate

The pre- and post-module assignments are designed to build upon the topics covered in the module and give the students a chance to explore them in a context that they are especially interested in.

Thus, the summative assessment for this module consists of:

- Pre-module individual critical review (maximum 1000 words) of a corporate sustainability report or similar document from a public agency (25%)
- Post-module individual written assignment (maximum 3000 words) from a supplied list of essay topics (75%)

Formative assessment and feedback

Feedback from the pre-module assignment will help students with their post-module assignment. Sessions at the start and end of the module will cover – in part – the module assignment. Students will submit their work via Surrey Learn.

Reading list

Essential reading

Callum Hill, An Introduction to Sustainable Resource Use, Earthscan, London, 2011

Stephen Morse, Sustainability: a biological perspective, Cambridge UP, Cambridge, 2010

WCED, Our Common Future, OUP, Oxford, 1987 (aka The Brundtland Report)

This document is in many ways the documented underpinning of what today we call sustainable development.

Recommended reading

Anne Augustine, The First 100 Days on the Job: how to plan, prioritise and build a sustainable organisation, Do Shorts, Oxford, 2012

Adisa Azapagic and Slobodan Perdan (eds.), Sustainable Development in Practice: case studies for engineers and scientists, Wiley-Blackwell, Chichester, 2011

Janis Birkeland, Positive Development, Earthscan, London, 2008

William Blackburn, The Sustainability Handbook: the complete management guide to achieving social, economic and environmental responsibility, Earthscan, London, 2008

Bob Doppelt, Leading Change Toward Sustainability, Greenleaf, London, 2001

Tim Jackson (ed), The Earthscan Reader in Sustainable Consumption, Earthscan, London, 2006

David Mackay, Sustainable Energy - without the hot air, UIT, Cambridge, UK, 2009

Sara Parkin, The Positive Deviant, Routledge, London, 2010

Jonathon Porritt, Capitalism as if the World Matters, Earthscan, London, 2007

Jonathon Porritt, The World We Made, Phaidon, London, 2013

Kristiina Vogt et al, Sustainability Unpacked: Food, Energy and Water for Resilient Environments and Societies, Earthscan, London, 2010

Background reading

N/A