

DEREE COLLEGE SYLLABUS FOR: : ES 3220 PRINCIPLES OF ENVIRONMENTAL MANAGEMENT		3/0/3
(Updated Fall 2023)		UK LEVEL: 5 UK CREDITS: 15
PREREQUISITES:	ES 1000 Environmental Science: Ecosystems and Biodiversity ES 1010 Environmental Science: Energy Resources and Pollution	
CATALOG DESCRIPTION:	An introduction to the basic principles, significant underlying concepts and techniques of environmental management. Issues like uncertainty and public goods and their relation to environmental management as well as cases of environmental management practices in different settings are discussed.	
RATIONALE:	<p>All human activities impact on the environment. Economic development, as it has been implemented in recent decades, has negative impacts on the environment and our societies. We need to reconsider how we use and manage natural resources so that sustainable development is possible.</p> <p>Environmental management is a political process. Its different dimensions (technical, political, socio-economic and cultural) as well as basic issues that underlie an environmental management plan should be understood. As a field of study, environmental management has evolved in the recent decades, following developments in our perception of the environment, in related fields (like environmental technology) and in available tools.</p> <p>Environmental management can be applied to different settings: from a protected habitat or a river basin, to an urban setting, a building or a corporation. Environmental management approaches may differ in some ways depending on the setting they are applied; however, their basic principles and underlying tenants are similar. These will be explored in this course.</p>	
LEARNING OUTCOMES:	<p>As a result of taking this course, the student should be able to:</p> <ol style="list-style-type: none"> 1. Demonstrate knowledge of environmental management by being able to firstly, describe what environmental management entails and secondly, discuss the basic principles and aspects of environmental management. 2. Analyse important dimensions of an environmental management process. 3. Briefly and critically discuss and explain selected policies or tools (e.g. environmental impact assessment) related to environmental management. 4. Apply environmental management principles and theories to an analysis of selected case studies. 5. Demonstrate ability to communicate effectively in several forms (e.g. written, graphical and verbal), engage in debate in a professional manner and produce detailed and coherent project reports. 	
METHOD OF TEACHING AND LEARNING:	<p>In congruence with the learning and teaching strategy of the college, the following tools are used:</p> <ul style="list-style-type: none"> • Class lectures, interactive learning (class discussions, group work), video presentations, and case studies discussed in class. • Invited speakers and/or visits to selected sites. • Formative activities (e.g. critical response to selected questions, discussion of case studies) • Office hours: students are encouraged to make full use of the office hours of their instructor, where they can discuss class material or any aspect related with the course. 	

	<ul style="list-style-type: none"> Use of a blackboard site, where instructors post lecture notes, assignment instructions, timely announcements, as well as additional online resources 						
<p>ASSESSMENT:</p>	<p>Summative:</p> <table border="1" data-bbox="630 338 1372 499"> <tr> <td>Project (with 3 different components – one in class)</td> <td>45%</td> </tr> <tr> <td>Critical response to selected questions (comprehensive – in class)</td> <td>45%</td> </tr> <tr> <td>Portfolio</td> <td>10%</td> </tr> </table> <p>The Portfolio assessment includes formative activities that aim to prepare students for the final examination and the preparation of an effective paper. It addresses all learning outcomes. The student papers and the final examination test all learning outcomes.</p> <p><i>The final grade for this module will be determined by averaging all summative assessment grades, based on the predetermined weights for each assessment. If students pass the comprehensive assessment that tests all Learning Outcomes for this module and the average grade for the module is 40 or higher, students are not required to resit any failed assessments.</i></p>	Project (with 3 different components – one in class)	45%	Critical response to selected questions (comprehensive – in class)	45%	Portfolio	10%
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<p>INDICATIVE READING:</p>	<p>REQUIRED MATERIAL:</p> <p>Antweiler, W. (2014). <i>Elements of Environmental Management</i>. University of Toronto Press. http://www.jstor.org/stable/10.3138/j.ctt7zwbx7 (open access book)</p> <p>Waters, B. (2013). <i>Introduction to Environmental Management</i>. For the NEBOSH Certificate in Environmental Management. Routledge.</p> <p>RECOMMENDED MATERIAL:</p> <p>Mitchell, B. (2002). <i>Resource and Environmental Management</i>. Pearson Education Ltd.</p> <p>Sarkar, D., Datta, R., Mukherjee, A., & Hannigan, R. (Editors) (2015). <i>An Integrated Approach to Environmental Management</i>. Wiley. ISBN: 978-1-118-74435-2 (624 pages)</p>						
<p>INDICATIVE MATERIAL: (e.g. audiovisual, digital material, etc.)</p>	<p>REQUIRED MATERIAL:</p> <p>RECOMMENDED MATERIAL: Environmental Management (journal) (http://link.springer.com/journal/267) Journal of Environmental Management (http://www.journals.elsevier.com/journal-of-environmental-management/)</p>						

COMMUNICATION REQUIREMENTS:	In all presentations using proper English, written or spoken.
SOFTWARE REQUIREMENTS:	Microsoft Word, Microsoft PowerPoint, Blackboard CMS.
WWW RESOURCES:	http://www.epa.gov/ebtpages/environmentalmanagement.html http://ec.europa.eu/environment/emas/index_en.htm
INDICATIVE CONTENT:	<ol style="list-style-type: none"> 1. Introduction: what is environmental management 2. Environmental management? A historical perspective 3. Environmental management for whom? (social inequalities; anthropocentric vs. ecocentric approach) 4. Basic underlying concepts of environmental management 5. Integrated environmental management and sustainability (uncertainty and predictability; public good vs. private interest; sustainability) 6. Important elements / dimensions: e.g. policy making and communication 7. Environmental Management Systems (EMAS and ISO14001) 8. Relevant policies and tools (e.g. EMAS, Eco-label and Integrated Product Policy, Environmental Impact Assessments) 9. Discussion of selected environmental management technical issues & cases – good practices