

COURSE OUTLINE

1. GENERAL

SCHOOL	Environment and Agricultural Engineering		
ACADEMIC UNIT	Natural Resources Management and Agricultural Engineering		
LEVEL OF STUDIES	Undergraduate		
COURSE CODE	2605	SEMESTER	9 th
COURSE TITLE	Management and Modernization of Land Reclamation Projects		
INDEPENDENT TEACHING ACTIVITIES <i>if credits are awarded for separate components of the course, e.g. lectures, laboratory exercises, etc. If the credits are awarded for the whole of the course, give the weekly teaching hours and the total credits</i>		WEEKLY TEACHING HOURS	CREDITS
Theory		2	2
Laboratory		2	2
TOTAL:		4	4
COURSE TYPE <i>general background, special background, specialised general knowledge, skills development</i>	special background, skills development		
PREREQUISITE COURSES:			
LANGUAGE OF INSTRUCTION and EXAMINATIONS:	Greek		
IS THE COURSE OFFERED TO ERASMUS STUDENTS	YES (In English)		
COURSE WEBSITE (URL)			

2. LEARNING OUTCOMES

<p>Learning outcomes <i>The course learning outcomes, specific knowledge, skills and competences of an appropriate level, which the students will acquire with the successful completion of the course are described.</i></p> <p><i>Consult Appendix A</i></p> <ul style="list-style-type: none"> • <i>Description of the level of learning outcomes for each qualifications cycle, according to the Qualifications Framework of the European Higher Education Area</i> • <i>Descriptors for Levels 6, 7 & 8 of the European Qualifications Framework for Lifelong Learning and Appendix B</i> • <i>Guidelines for writing Learning Outcomes</i> 								
<p>This course is aimed at training graduate agronomists in complex land improvement projects management topics. The students, after successful examination have acquired the following skills:</p> <ul style="list-style-type: none"> • To be able to chart an existing land reclamation project (irrigation - drainage) and to assess its condition. • Be able to determine the necessary consolidation and modernization actions • To be able to determine the cost of proposed plans and to complete the necessary studies. 								
<p>General Competences <i>Taking into consideration the general competences that the degree-holder must acquire (as these appear in the Diploma Supplement and appear below), at which of the following does the course aim?</i></p> <table style="width: 100%; border: none;"> <tr> <td style="width: 50%; border: none;"><i>Search for, analysis and synthesis of data and information, with the use of the necessary technology</i></td> <td style="width: 50%; border: none;"><i>Project planning and management</i></td> </tr> <tr> <td style="border: none;"><i>Adapting to new situations</i></td> <td style="border: none;"><i>Respect for difference and multiculturalism</i></td> </tr> <tr> <td style="border: none;"><i>Decision-making</i></td> <td style="border: none;"><i>Respect for the natural environment</i></td> </tr> <tr> <td style="border: none;"><i>Working independently</i></td> <td style="border: none;"><i>Showing social, professional and ethical responsibility and sensitivity to gender issues</i></td> </tr> </table>	<i>Search for, analysis and synthesis of data and information, with the use of the necessary technology</i>	<i>Project planning and management</i>	<i>Adapting to new situations</i>	<i>Respect for difference and multiculturalism</i>	<i>Decision-making</i>	<i>Respect for the natural environment</i>	<i>Working independently</i>	<i>Showing social, professional and ethical responsibility and sensitivity to gender issues</i>
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<i>Decision-making</i>	<i>Respect for the natural environment</i>							
<i>Working independently</i>	<i>Showing social, professional and ethical responsibility and sensitivity to gender issues</i>							

<i>Team work</i> <i>Working in an international environment</i> <i>Working in an interdisciplinary environment</i> <i>Production of new research ideas</i>	<i>Criticism and self-criticism</i> <i>Production of free, creative and inductive thinking</i> <i>.....</i> <i>Others...</i> <i>.....</i>
<ul style="list-style-type: none"> • Search, analysis and synthesis of data and information with the use of the required technologies • Decision making • Project planning and management • Respect for the natural environment 	

3. SYLLABUS

<p>Land reclamation. Irrigation networks. Pressure Networks. Gravity Networks. Drainage networks. Flood protection works. Environmental protection and management projects.</p> <p>Land Reclamation Project Management. Operation. Maintenance. Management - Organization. Legislation. Management problems. Financial data. Socio-economic impact. Environmental impacts of Land Reclamation projects.</p> <p>Modernization. Needs and modernization criteria. Performance analysis. Modernization and rehabilitation projects. Feasibility investigation. Socio-economic impact. Environmental impacts of modernization projects.</p>

4. TEACHING and LEARNING METHODS - EVALUATION

DELIVERY <i>Face-to-face, Distance learning, etc.</i>	The teaching methodology employed in the classroom	
USE OF INFORMATION AND COMMUNICATIONS TECHNOLOGY <i>Use of ICT in teaching, laboratory education, communication with students</i>	Specialized software e-class platform	
TEACHING METHODS <i>The manner and methods of teaching are described in detail.</i> <i>Lectures, seminars, laboratory practice, fieldwork, study and analysis of bibliography, tutorials, placements, clinical practice, art workshop, interactive teaching, educational visits, project, essay writing, artistic creativity, etc.</i> <i>The student's study hours for each learning activity are given as well as the hours of non-directed study according to the principles of the ECTS</i>	Activity	Semester workload (hours)
	Lectures	26
	Class exercises	26
	Team work	28
	Study at home	20
	TOTAL	100
STUDENT PERFORMANCE EVALUATION <i>Description of the evaluation procedure</i> <i>Language of evaluation, methods of evaluation, summative or conclusive, multiple choice questionnaires, short-answer questions, open-ended questions, problem solving, written work, essay/report, oral examination, public presentation, laboratory work, clinical examination of patient, art interpretation, other</i> <i>Specifically-defined evaluation criteria are given, and if and where they are accessible to students.</i>	I. Final written theory examination (60%) comprising: - Multiple choice questions - Open questions - Problem solving II. Laboratory Grade (40%) - Presentation of team project	

5. ATTACHED BIBLIOGRAPHY

Performance analysis of on-demand pressurized irrigation systems, N.Lamaddalena, J.A. Sagardoy, FAO 59.
