EK-3

CUMHURİYET UNIVERSITY ENGINEERING FACULTY

Environmental Engineering Department Course Information Form

Department	**Environmental Engineering**		
Semestr/Year	**2**		
Name of Course	**Natural Resources Management**		
Level of Course	**Postgratuate**		
Mandatory / Selective of Course	**Mandatory**		
Language of Course	**Turkish**		
Code	**Env. 9002**		
(T+P) hours	**3+0**		
Credit	**3**		
ECTS	**10**		
Prerequest Courses	**none**		
Category of Course	**Environmental Science**		
Course Coordinator	Prof. Dr. Ali YILMAZ	e-mail:ayilmaz	Phone:1298
Course Lecturer	Prof. Dr. Ali YILMAZ		
Other Supplementary Lecturers	none		
Course Objectives	Introducing natural resources and contribution to environmental management by assessing environmental impacts of the resources		
Course Content	Natural resources concepts in environmental science, Importance of unrenewable natural resources, Some natural raw-materials: clays, evaporites, zeolites, Metalic resources: gold, cupper, zinc, cromite and iron, Energy resources: coal, oil, natural gas and renewable resources, Definition and characteristics of these resources, Technology and production methods, Using of natural resources in environmental technologies, Environmental problems and precautions related to the planning, constraction and operation phases of natural resources, Planning of natural resources.		

Education System	

WEEKLY BASED COURSE CONTENTS		
Week	**Detailed Content**	**Suggested preliminary preperation** (name, page no, etc)
Week 1	Natural resources concepts in environmental science, Importance of unrenewable natural resources,	Yılmaz, A. , 2009**,** Çevre Kaynakları: Cumhuriyet Üniversitesi Yayınları no. 117, Sivas, 348s.
Week 2	Mainly industrial raw-materials I: clays, evaporites, zeolites,	
Week 3	Mainly industrial raw-materials II: asbestos, perlite, marble, diatomite, ponzia, trona.	
Week 4	Metalic resources I: gold, cupper, zinc, cromite and iron,	
Week 5	Metalic resources II: cromite and iron,	
Week 6	Energy resources I: Unrenewable resources; Coal, oil, natural gas	
Week 7	Energy resources I: Renewable resources; Solar and wind resources, geothermal energy	
Week 8	Water resources	
Week 9	Oceanic resources	
Week10	Land resources I- Food production	
Week11	Land resources II- Forests	
Week12	Land resources III- Biodiversity and protected resources	
Week13	Environmental wealth and limits to growth	
Week14	Sustainability phenomena	

SHARING EDUCATION MATERIAL AND ADVANCED SOURCES	
Education Materials and Course	Homeworks and seminars are encouraged to improve student interactions.

Notes	
Advanced Sources	Mather, A.S. ve Chapman, K., 1998. Environmental Resources: Addison Wesley Longman Edinburg Gate Harlow Essex CM 202 JE, England, 279s. Kay, J., 1985, Preconditions of natural resource conservation; Agricultural History, 59, 275-300.
Solution of Examination	Evaluation is done on the basis of final exam. Students must score minimum 75 over 100.

LEARNING OUTCOMES OF THE COURSE AND CONTRIBUTION OF PROGRAM LEARNING OUTCOMES			
Program Learning Outcomes*	**Knowledge and Skills earned**	**CPLOC**	**MEM**
LO-1			
LO-2			
LO-3			
LO-4			
LO-5			
LO-6			
LO-7			
***LO**: Learning Outcomes of Course* ***CPLOC**: Code of Program Learning Outcome that contributed* ***MEM**: Measurement and Evaluation Method*			

* Learing Outcomes of Course (LO) shouldn't exceed 10

CONTRIBUTION LEVEL OF COURSE TO PROGRAM OUTCOMES						
No	**Program Learning Outcomes ***	**Contribution level ****				
		1	**2**	**3**	**4**	**5**
P1						
P2						
P3						
P4						

P5						
P6						
P7						
P8						
P9						
P10						
P11						

* ıProgram outcomes must be in the range of 8 – 14. ** at least=1

METHODS OF MEASUREMENT AND EVALUATION			
Method	**Number**	**Date**	**Contribution ratio**
Midterm			
Short exam			
Final Exam			
Homework			

ECTS/ WORK LOAD TABLE			
Efforts required fort the course	**Number**	**Time (hour)**	**Total work load (hour)**
Lecture hours (Including exam week.i.e., 16x total lecture hours)			
Study hours of student out of lecture hours			
Short exams			
Preperation for midterm			
Midterm			
Preperation for final exam			
Final exam			
		Total work load	

Total work load /30 (h)	
ECTS credit of course	