

CODE: ECO 3.4	COURSE TITLE: METEOROLOGY AND CLIMATOLOGY		ECTS: 3	
COORDINATOR: Prof. Janusz Olejnik		DEPARTMENT: Dpt. of Meteorology		
COURSE CATEGORY				
Open				
VOLUME:30 H			PERSONAL WORK: 15 H	
LECTURES: 15 H	PRACTICALS (CLASSES) (15 H)	PLACEMENT: (H)	PROJECT:	OTHER MODALITIES: (H)
EVALUATION:		OTHER MODALITIES:		LECTURER(S)
EVALUATION MODALITIES				Janusz Olejnik
ORAL INDIVIDUAL REPORT				
WRITTEN INDIVIDUAL REPORT				
FINAL ORAL EXAM				
FINAL WRITTEN EXAM	X			
COMMENTS OF EVALUATION:		TEACHING METHODS: Lectures, classes		
SEMESTER: SUMMER/WINTER		LANGUAGE: ENGLISH		
PERIOD: 15 WEEKS		YEAR OF STUDY: OPEN		
OBJECTIVES				
Presentation of knowledge of meteorology and climatology and climate change				
CONTENTS				
1) Composition, structure and development of the atmosphere, 2) Solar and the Earth radiation, energy balance, 3) Air and soil temperature, thermodynamics of the atmosphere, the atmosphere stability conditions 4) Atmospheric moisture, 5) Atmospheric pressure and global circulation, 6) Air mass and fronts, 7) Global circulation models and weather forecasts, 8) Basics of climatology and climates of the Earth, 9) Current and future climate changes, causes and consequences of climate change 10) Impact of climate change on terrestrial ecosystems, 11) Measurements and balances of greenhouse gases fluxes,				
GROUP SIZE: 15		PRE-REQUIRES: Basics of physics		