University of Gdańsk

Subject card

Subject name and code	Environmental change reconstructions - tutorial, PG_00135490		
Field of study	Physical geography and geoinformation		
Date of commencement of studies	October 2024	Academic year of realisation of subject	2024/2025
Education level	postgraduate studies	Subject group	Obligatory subject group in the field of study
Mode of study	full-time studies	Mode of delivery	at the university
Year of study	1	Language of instruction	Polish
Semester of study	1	ECTS credits	2.0
Learning profile	academic	Assessment form	
Conducting unit	Pracownia Rekonstrukcji Geomorfologicznych -> Katedra Geomorfologii i Geologii Czwartorzędu -> Faculty of Oceanography and Geography		
Name and surname of lecturer (lecturers)	Subject supervisor	dr hab. Piotr Woźniak	
	Teachers	dr Sambor Czerwiński	

Lesson types

Lesson type	Lecture	Tutorial	Laboratory	Project	Seminar	SUM
Number of study hours	0.0	0.0	15.0	0.0	0.0	15

E-learning hours included: 0.0

Learning activity and number of study hours

Learning activity	Participation in didactic classes included in study plan	Participation in consultation hours	Self-study	SUM
Number of study hours	15	15.0	30.0	60

Subject objectives

1. Introduction to selected methods used in paleoenvironmental research.

2. Learning the preliminary palaeogeographic interpretation of the results of selected laboratory and field analyses.

Learning outcomes

Course outcome	Subject outcome	Method of verification
[GFGMU2_U03] effectively use selected scientific literature in the field of physical geography and geoinformation, both in Polish and English	Can effectively use scientific literature on the issues of environmental changes in the past.	[SU2] presentation/project/paper/ report
[GFGMU2_U05] integrate knowledge from the discipline of Earth and environmental sciences, explaining and interpreting the interrelationships between environmental processes and phenomena in order to solve research problems in physical geography and geoinformation	Is able to integrate knowledge in the field of Earth and environmental sciences, correctly explaining and interpreting the mutual relations between processes and phenomena accompanying environmental changes at different time scales.	[SU2] presentation/project/paper/ report [SU4] test/exam - oral or written
[GFGMU2_K01] critical assessment of knowledge in the field of Earth and environmental sciences and geoinformation, its completion and verification through critical analysis of scientific literature	Is ready to critically evaluate his/ her knowledge of environmental change, supplement and verify it through critical reading of the appropriate literature.	[SK2] presentation/project/paper/ report
[GFGMU2_U02] precisely and appropriately use terminology in the field of physical geography and geoinformation in oral statements and written works	Can properly apply terminology used in the reconstruction of various sedimentary environments in a written work.	[SU2] presentation/project/paper/ report [SU4] test/exam - oral or written
[GFGMU2_W08] the most important contemporary problems on a regional and global scale, their essence, genesis and possible consequences	Knows the most important anthropogenic factors that could have influenced the characteristics of the studied sediments.	[SW2] presentation/project/paper/ report
[GFGMU2_W02] issues in the field of exact sciences enabling the understanding of complex processes and phenomena occurring in the Earth's natural environment, and in their interpretations consistently relay on empirical foundations, using qualitative and quantitative methods	Knows and understands the interdisciplinary approach in Earth and environmental sciences, as well as qualitative and quantitative methods used in environmental reconstructions.	[SW2] presentation/project/paper/ report
[GFGMU2_W01] the specificity of Earth sciences in the field of physical geography, its internal structure, research subject and main research directions, conceptual apparatus, as well as practical applications of scientific achievements	Knows and understands the subject of research, the main research directions and the conceptual apparatus of palaeogeography, as well as the practical applications of scientific research in the field of reconstruction of environmental changes.	[SW2] presentation/project/paper/ report

Subject contents

1. Analysis of main components of a sediment.

2. Selected microscopic methods used in environmental reconstructions.

3. Palaeogeographic interpretation of laboratory and field analyses results.

Prerequisites and co-requisites

Assessment methods and criteria

Subject passing criteria	Passing threshold	Percentage of the final grade
research report	51.0%	40.0%
written test	51.0%	30.0%
oral presentation	51.0%	30.0%

Recommended reading	Basic literature	Beug, H.J. 2004. Leitfaden der Pollenbestimmung für Mitteleuropa und angrenzende Gebiete. Verlag Dr. Friedrich Pfeil, München. Mycielska-Dowgiałło E., Rutkowski J. (red.), 2007, Badania cech teksturalnych osadów czwartorzędowych. SWPR, Warszawa. Ralska-Jasiewiczowa M., Latałowa M., Wasylikowa K., Tobolski K., Madeyska E., Wright H.E., Jr., Turner Ch. (red.) Late Glacial and Holocene History of Vegetation in Poland Based on Isopollen Maps. W. Szafer Institute of Botany, Polish Academy of Sciences, Kraków, s. 327-336. Tobolski K., 2000, Przewodnik do oznaczania torfów i osadów jeziornych, PWN, W-wa. Zieliński T., 2014, Sedymentologia. Osady rzek i jezior. UAM, Poznań.
	Supplementary literature	Regional and palaeogeographic literature on the area from which the research material originates.
	eResources addresses	Adresy na platformie eNauczanie:
Example issues/ example questions/ tasks being completed	What are multi-proxy reconstructions? How does core sampling affect the reliability of the interpretation of palaeoenvironmental reconstruction? List and characterize 3 hypotheses about the beginning of the Younger Dryas.	
Work placement	Not applicable	

Document generated electronically. Does not require a seal or signature.