



## Subject card

Subject name and code	Practice environmentally-geodesic, PG_00054662						
Field of study	Environmental Engineering						
Date of commencement of studies	October 2020		Academic year of realisation of subject		2020/2021		
Education level	first-cycle studies		Subject group		Obligatory subject group in the field of study Subject group related to scientific research 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	2		ECTS credits		2.0		
Learning profile	general academic profile		Assessment form		assessment		
Conducting unit	Department of Environmental Engineering Technology -> Faculty of Civil and Environmental Engineering						
Name and surname of lecturer (lecturers)	Subject supervisor		dr inż. Alina Wargin				
	Teachers						
Lesson types and methods of instruction	Lesson type	Lecture	Tutorial	Laboratory	Project	Seminar	SUM
	Number of study hours	2.0	0.0	0.0	13.0	0.0	15
	E-learning hours included: 0.0						
	Adresy na platformie eNauczanie:						
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		10.0		25.0	50
Subject objectives	The aim of the internship is to enable students to use the acquired knowledge in practice through their participation in geodetic measurements. Additionally, the classes are aimed at using the results obtained during the measurements to prepare a design study.						

Learning outcomes	Course outcome	Subject outcome	Method of verification
	[K6_U05] can apply in engineering practice the basic geodetic instruments and instruments, make measurement sketches and read information from the map and surveying documents	Performing a leveling measurement with the use of self-leveling levels. Preparation of leveling sketches and measurement logs	[SU1] Assessment of task fulfilment [SU4] Assessment of ability to use methods and tools
	[K6_W16] knows the rules of descriptive geometry and technical drawing regarding the recording and reading of architectural drawings, construction and surveying drawings, as well as their preparation with the use of CAD	He can prepare technical documentation related to the development of the results of conducted field measurements in accordance with the rules.	[SW3] Assessment of knowledge contained in written work and projects
	[K6_W17] has basic knowledge of geodesy in the range of applied measurement equipment and techniques, geodetic information systems and documentation necessary in the preparation process, investment implementation	Planning and carrying out simple geodetic measurements. Measurement of the fall of the water table in Potok Jelitkowski. Preparation of relevant documentation.	[SW3] Assessment of knowledge contained in written work and projects
	[K6_U02] can work individually and in a team; knows how to estimate the time needed to complete the task ordered; is able to develop and implement a work schedule that ensures deadlines	Planning and carrying out measurements in the measurement group. Assigning tasks and responsibilities for each person in the team	[SU1] Assessment of task fulfilment [SU3] Assessment of ability to use knowledge gained from the subject
	[K6_U03] can prepare documentation regarding the implementation of an engineering task/project and prepare a text or presentation including a discussion of the results of the implementation	Preparation of measurement documentation, development of measurement results. Execution of cross-sections and longitudinal sections of the measured section of the Jelitkowski Stream	[SU1] Assessment of task fulfilment
Subject contents	Altitude measurement, assumption of the (altitude) measurement network, measurement of the water table drop in the Jelitkowski Stream, execution of the leveling line with connection to the national network. preparation of documentation on the basis of the performed measurement, execution of cross-sections and longitudinal sections of the measured object, determination of the value of the bottom slope and the water table. In addition, students will be familiarized with the basic issues in the field of broadly understood environmental protection, as well as with the processes taking place in industrial plants, such as the Sewage Treatment Plant and Waste Disposal Plant.		
Prerequisites and co-requisites			
Assessment methods and criteria	Subject passing criteria	Passing threshold	Percentage of the final grade
	Report	60.0%	30.0%
	Conversation	60.0%	70.0%
Recommended reading	Basic literature	<ul style="list-style-type: none"> <li>Praca zbiorowa. Ćwiczenia z geodezji pod redakcją Adama Żurowskiego. Gdańsk, Politechnika Gdańska.</li> <li>Przewłocki, S., Żurowski, A. (2006). Przewodnik do ćwiczeń z geodezji inżynierskiej. Kutno, Wyższa Szkoła Gospodarki Krajowej.</li> </ul>	
	Supplementary literature	<ul style="list-style-type: none"> <li>Kurałowicz Z., (2009) Geodezja Podstawowe obliczenia Geodezyjne, Gdańsk, Politechnika Gdańska</li> </ul>	
	eResources addresses	Podstawowe <a href="https://www.sng.com.pl/Portals/2/dok/Ulotki%20i%20foldery/Prezentacja_Oczyszczalnia_Wschod.pdf">https://www.sng.com.pl/Portals/2/dok/Ulotki%20i%20foldery/Prezentacja_Oczyszczalnia_Wschod.pdf</a> - Sewage treatment plant in Gdańsk <a href="https://zut.com.pl/">https://zut.com.pl/</a> - Waste Disposal Plant	

<p>Example issues/ example questions/ tasks being completed</p>	<p>Development of longitudinal sections of the river bed</p> <p>Development of river bed cross-sections</p> <p>Overview of the method of measuring the leveling of the river bed</p> <p>Overview of the method of calculating measurement data obtained during the course</p> <p>Environmental degradationForms of natural and anthropogenic environmental devastationInstitutions dealing with nature protection in Poland</p>
<p>Work placement</p>	<p>Not applicable</p>