COURSE SYLLABUS AND COURSE REQUIREMENTS
ACADEMIC YEAR 2025-2026 SEMESTER SPRING

Course title	***Public Utilities***
Course Code	**MSB418ANEP**
Hours/Week: le/pr/lab	**2/0/0**
Credits	**2**
Degree Programme	**Civil Engineering BSC**
Study Mode	**Full-time schedule**
Requirements	**Exam**
Teaching Period	**Semester 6**
Prerequisites	**none**
Department(s)	**Civil Engineering**
Course Director	**Dr. Pál-Schreiner Judit**
Teaching Staff	**Dr. Pál-Schreiner Judit**

COURSE DESCRIPTION

This course exposes students to an expansive suite of topics and methods within the field of Public Utilities. Engineering networks as a part of technical infrastructure in towns and cities. Public utilities categories, forms of placing, spatial arrangement, forms of construction. Technical requirements for design, structure and operation of public utilities.

SYLLABUS

1. GOALS AND OBJECTIVES

Engineering networks as a part of technical infrastructure in towns and cities. Public utilities categories, forms of placing, spatial arrangement, forms of construction. Technical requirements for design, structure and operation of public utilities.

2. COURSE CONTENT

	TOPICS
LECTURE	*1. Definition of public utilities, public works* *2. Grouping and main features of public utilities* *3. Water utilities* *4. Energy Utilities* *5. Telecommunication* *6. Public utilities Tunnel*

DETAILED SYLLABUS AND COURSE SCHEDULE

LECTURE

week	**Topic**	**Compulsory reading; page number**	**Required tasks**	**Completion date, due date**
1.	Course description; Orientation			
2.	Definition of Public Utilities - Def. Infrastructure; Def. Public Utilities; main features of PU	[2.]		
3.	Grouping of PU (based on sector type, based on their location)	[2.]		
4.	Integrated water management	[2.]		

5.	Site visit 1_ Pécs, Tettye Forrásház Zrt) Pécs Water supply System		Report 1	Via Teams
6.	Municipal Sewer systems	[2.]		
7.	Waste-water treatment process	[2.]		
8.	Site visit 2_Pécs-Pelléd, Waste-water Treatment Plan		Report 2	Via Teams
9.	Easter Holiday – no classes			
10.	Energy Utilities, Telecommunication	[2.]		
11.	Public Utilities Tunnel	[2.]		
12.	Site visit 3_ Public Utilities Tunnel Pécs		Report 3	Via Teams
13.	Exam test			
14.	Retake exam test (if required)			

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3. ASSESSMENT AND EVALUATION

ATTENDANCE

In accordance with the Code of Studies and Examinations of the University of Pécs, Article 45 (2) and Annex 9. (Article 3) a student may be refused a grade or qualification in the given full-time course if the number of class absences exceeds 30% of the contact hours stipulated in the course description.

Method for monitoring attendance

Attendance sheet. Attending is required all classes, and will impact the grade (max. 10%). Unexcused absences will adversely affect the grade, and in case of absence from more than 30% of the total number of lesson will be grounds for failing the class. To be in class at the beginning time and stay until the scheduled end of the lesson is required, tardiness of more than 20 minutes will be counted as an absence. In the case of an illness or family emergency, the student must present a valid excuse, such as a doctor's note.

ASSESSMENT

Course-unit with final examination

Mid-term assessments, performance evaluation and their weighting as a pre-requisite for taking the final exam

Type	Assessment	*Weighting as a proportion of the pre-requisite for taking the exam*
Exam test	*30%*	*30%*
Site visit reports	*3*20%*	*60%*
Class attendance	*10%*	*10%*

Requirements for the end-of-semester signature

Each individual assessment must be at least 40% on its own.

Re-takes for the end-of-semester signature (PTE TVSz 50§(2))

Exam test can be repeated/improved each at least once every semester.

Type of examination: *written*

The exam is successful if the result is minimum 40%

Calculation of the grade *(TVSz 47§ (3))*

Calculation of the final grade based on aggregate performance in percentage.

Course grade	Performance in %
excellent (5)	85 % -100%
good (4)	70 % - 84%
satisfactory (3)	55 % - 69 %
pass (2)	40 % - 54 %
fail (1)	below 40 %

4. SPECIFIED LITERATURE

COMPULSORY READING AND AVAILABILITY

[1.] Knolmár – Fülöp - Darabos: Public works 2014- online booklet
[2.] Lecture notes ppt.

RECOMMENDED LITERATURE AND AVAILABILITY

[3.] Hamada, M. et al (2014): Critical Urban Infrastructure Handbook, CRC Press ISBN-13:978-1466592049 ISBN-10:1466592044
[4.] Every Drop Counts-Environmentally Sound Technologies for Urban and Domestic Water Use Efficiency URL://www.unep.or.jp/