Artificial intelligence in medical practice – more benefits or threats?

1. IMPRINT	
Academic Year	2024/2025
Department	Faculty of Medicine
Field of study	Medicine
Main scientific discipline	Medical sciences
Study Profile	General academic
Level of studies	Uniform MSc
Form of studies	Full time studies
Type of module / course	Non-compulsory (optional)
Form of verification of learning outcomes	Completion
Educational Unit / Educational Units	Department of Social Medicine and Public Health Medical University of Warsaw 3a Pawińskiego St., 02-106 Warsaw E-mail: zmsizp@wum.edu.pl
Head of Educational Unit / Heads of Educational Units	Prof. Aneta Nitsch-Osuch, MD, PhD

Course coordinator	Magdalena Bogdan, PhD mbogdan@wum.edu.pl
Person responsible for syllabus	Magdalena Bogdan, PhD mbogdan@wum.edu.pl
Teachers	Magdalena Bogdan, PhD

2. BASIC INFORMATION

Year and semester of studies	I-VI year, summer and winter semester	**Number of ECTS credits**	2.00

FORMS OF CLASSES	**Number of hours**	**ECTS credits calculation**
Contacting hours with academic teacher		
Lecture (L)		
Seminar (S)	30 (e-learning)	1.00
Classes (C)		
e-learning (e-L)		
Practical classes (PC)		
Work placement (WP)		
Unassisted student's work		
Preparation for classes and completions	30	1.00

3. COURSE OBJECTIVES

O1	This course will cover the major information about artificial intelligence and innovations in medical practice.

4. STANDARDS OF LEARNING – DETAILED DESCRIPTION OF EFFECTS OF LEARNING

Code and number of effect of learning in accordance with standards of learning	**Effects in the field of:** *(in accordance with appendix to the Regulation of Minister of Science and Higher education from 26th of July 2019)*
Knowledge – Graduate* knows and understands:	

Skills– Graduate* is able to:	
D.U12	demonstrate responsibility for improving their qualifications and passing on knowledge to others

* In appendix to the Regulation of Minister of Science and Higher education from 26th of July 2019 „graduate", not student is mentioned.

5. ADDITIONAL EFFECTS OF LEARNING *(non-compulsory)*

Number of effect of learning	Effects in the fields of:
Knowledge – Graduate knows and understands:	
Skills– Graduate is able to:	
Social Competencies – Graduate is ready for:	
K.1.	using objective sources of information

6. CLASSES

Form of class	Class contents	Effects of Learning
(S) seminar 1 online	Introduction. AI and innovations in medical field and doctor's practice.	D.U12., K.1.
(S) seminar 2 online	What are the current threats and benefits to doctors from the use of artificial intelligence in medical practice?	D.U12., K.1.
(S) seminar 3 online	Doctor as innovator – how to become? Main applications of artificial intelligence in medicine and doctor's practice.	D.U12., K.1.
(S) seminar 4 online	Using AI and innovation to prevent health care crises on a global scale.	D.U12., K.1.
(S) seminar 5 online	E-health and telemedicine and their role in the post-pandemic world.	D.U12., K.1.
(S) seminar 6 online	Artificial intelligence in practice - individual student project divided into 3 parts.	D.U12., K.1.

7. LITERATURE

Obligatory

1. Lawry T., AI in Health, 2020.
2. Burns L.R., he Business of Healthcare Innovation, 2nd Edition, 2012.
3. Blumenthal D., Glaser J.P., Information Technology Comes to Medicine, N Engl J Med 2007.
4. Slack, Warner V., Cybermedicine for the Patient, Am J Prev Med 32, no. 5S, 2007.

Supplementary

8. VERIFYING THE EFFECT OF LEARNING

Code of the course effect of learning	Ways of verifying the effect of learning	Completion criterion
D.U12., K.1.	E-learning seminars attendance, 3 written assignments in frame of the project and final test at the e-learning platform.	Test pass >70% correct answers.

9. ADDITIONAL INFORMATION

The course is available on the platform www.e-learning.wum.edu.pl. Student must learn all materials uploaded to the modules on the platform. After each module there are questions (quizzes) or task related to its subject.

Student must send written assignments (tasks) to the teacher (using e-learning platform) and receive a positive evaluation. Student must sent them before proceeding to the final test.

Student must pass the final test (available on the e-learning platform) to obtain a credit.

Students are obligatory to check MUW student email account as all information are sent only by formal MUW mails.

ATTENTION
The final 10 minutes of the last class in the block/semester/year should be allocated to students' Survey of Evaluation of Classes and Academic Teachers.