

Course description Part 1

General Information about the Course			
1. Major of study: Physiotherapy 2. Study profile: general academic		3. Study level: Master's studies 4. Form of study: intramural 5. Study cycle: 2026-2031	
6. Year: : IV		7. Semester: VIII	
8. Course name: Imaging Diagnostics in Physiotherapy			
9. Course status: elective			
10. Course content: The main objective of the course is to equip students with knowledge and skills in interpreting imaging test results (X-ray, ultrasound, MRI, CT) in correlation with clinical examination, enabling safe and precise planning of the physiotherapy process and identification of “red flag” symptoms. Learning outcomes/reference to learning outcomes contained in (underline as appropriate): education standards (Regulation of the Minister of Science and Higher Education)/Resolution of the Senate of the Medical University of Silesia (provide terms contained in education standards/symbols of outcomes approved by the Resolution of the Senate of the Medical University of Silesia) in terms of knowledge, the student knows and understands: A.W2 in terms of skills, the student is able to: - in terms of social competences, the student is ready to: -			
11. Number of hours for the subject (contact hours/including communication hours*/self-study*)	30/ - / -/	12. Number of ECTS points for the course	2
13. Form of course completion: graded credit			
14. Methods of verification and evaluation of learning outcomes			
Learning outcomes	Methods of verification	Methods of evaluation*	
Knowledge	Single choice test	*	
Skills	Observation Practical exam	*	
Competencies	-	*	

* if required by the education standard

**in the case of an exam/grade assessment, it is assumed that the grade corresponds to the following level:

*** in accordance with the course regulations

Very good (5.0) – learning outcomes achieved and significantly exceed the required level

Good plus (4.5) – learning outcomes achieved and clearly exceed the required level

Good (4.0) – learning outcomes achieved and exceed the required level to some extent

Satisfactory plus (3.5) – learning outcomes achieved at a level slightly exceeding the required level

Satisfactory (3.0) – learning outcomes achieved at the required level

Fail (2.0) – learning outcomes not achieved

Course card
Part 2

Other useful information about the course		
15. Unit responsible for the course, address, e-mail: Department of Physical Medicine, Chair of Physiotherapy Faculty of Health Sciences in Katowice 12 Medyków Street, 40-752 Katowice e-mail: medycynafizykalna@sum.edu.pl		
16. Name of the course coordinator: Tomasz Piętka, MSc		
17. Prerequisites for knowledge, skills and other competencies: Knowledge of anatomy, biophysics, biomechanics, and tissue pathophysiology. The student should be able to conduct subjective and objective examinations, identify key topographical landmarks on the patient's body corresponding to structures visible in radiological images, analyze the mechanism of injury and, on this basis, identify potentially damaged structures, and use medical literature and databases to search for medical standards.		
18. Group size	In accordance with the Rector's Regulation of the Medical University of Silesia	
17. Teaching materials / teaching aids:	Laptop, multimedia projector, ultrasound machine	
19. Venue:	Teaching rooms of the Faculty of Health Sciences in Katowice	
21. Location and time for contact hours	According to the schedule available on the notice board of the Department of Physical Medicine	
22. Learning outcomes		
Course learning outcome number	Course learning outcomes	Reference to education standards
P_W01	Able to characterize imaging diagnostics	A.W2
P_W02	Able to discuss the physical basis, principles of performing, and interpret the result of an X-ray examination (RTG)	A.W2
P_W02	Able to discuss the physical basis, principles of performing, and interpret the result of an ultrasound examination (USG)	A.W2
P_W04	Able to discuss the physical basis, principles of performing, and interpret the result of a magnetic resonance imaging examination (MRI)	A.W2
P_W05	Able to discuss the physical basis, principles of performing, and interpret the result of a computed tomography examination (CT)	A.W2
23. Teaching methods: expository, activating, problem-based		
24. Forms and topics of classes:*		Number of hours
24.1. Lectures		15
Introduction to imaging diagnostics		5
X-ray, CT, MRI examinations		5
Application of ultrasonography in physiotherapy		5
24.2. Seminars		-
24.3. Labs		15
Evaluation and interpretation of X-ray examinations		5
Evaluation and interpretation of MRI and CT examinations		5
Evaluation and interpretation of ultrasound examinations		5
24.4. Clinical classes		-
24.5. Practical sessions		-
24.6. Low-fidelity simulations		-
24.7. High-fidelity simulations		-
24.8. Self-study		-
25. ECTS Credit Balance		
Scheduled classes with teacher (contact hours)	30	

Preparation for various forms of classes	-
Participation in consultations	-
Time for project/documentation/self-study	-
Self-study	-
Exam preparation	-
Participation in exam	-
Practical classes	-
Professional internships	-
TOTAL HOURS:	30
TOTAL ECTS CREDITS:	2
26. Literature	
1. Greenspan A., Beltran J. Imaging in Orthopedics for the Practicing Physician. Medipage, Warsaw, 2018.	
2. Sieroń D. Imaging Diagnostics in Physiotherapy and Rehabilitation. PZWL, Warsaw, 2017.	
3. Silvestri E., Muda A., Sconfienza L. Ultrasound Anatomy of the Musculoskeletal System. Medipage, Warsaw, 2014.	
27. Detail evaluation criteria	
In accordance with the recommendations of the inspection bodies	
Completion of the course – student has achieved the assumed learning outcomes	
Detail criteria for completion and evaluation of the course are specified in the course regulations	

* if required by the education standards, the self-study content is provided by the course instructor

** complete as appropriate in accordance with the guidelines of the Council/Programme Committee of the given field of study after approval by the Dean