CourseAnatomy I - Osteology and MyologyCourse coordinatorAssoc. Prof. Antonio Kokot, MD, PhDAssist coordinatorProf. Robert Selthofer, MD, PhDAssist ant/AssociateProf. Robert Selthofer, MD, PhDAssist Prof. Darija Šnajder Mujkić, MD, PhDAsst. Prof. Darija Šnajder Mujkić, MD, PhDAsst. Prof. Tanja Kovač, MD, PhDAsst. Prof. Damir Hudetz, MD, PhDAsst. Prof. Damir Hudetz, MD, PhDAntun Šumanovac, MD, PhDAntun Šumanovac, MD, PhDStudy ProgrammeStudy ProgrammeStatus of the courseMandatory	GENERAL INFORMATION				
Assistant/AssociateProf. Robert Selthofer, MD, PhD Prof. Mislav Gjurić, MD, PhD Asst. Prof. Darija Šnajder Mujkić, MD, PhD Asst. Prof. Danija Kovač, MD, PhD Asst. Prof. Damir Hudetz, MD, PhD Asst. Prof. Damir Hudetz, MD, PhD Antun Šumanovac, MD, PhD Zvonimir Popović, MD Marko Sablić, MDStudy ProgrammeIntegrated undergraduate and graduate university study of Medicine in German language	Course	Anatomy I - Osteology and Myology			
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Status of the course     Mandatory	Study Programme	Integrated undergraduate and graduate university study of Medicine in German language			
	Status of the course	Mandatory			
Year of study, semester 1st year, 1st semester	Year of study, semester	1st year, 1st semester			
Grading scale and workload         ECTS         9           Hours (L+S+E)         120 (40+40+40)	•				

## **COURSE DESCRIPTION**

#### Course objectives

Through lectures, seminars and exercises, students will get to know human osteomuscular anatomy in a systematic and topographical way. Osteomuscular anatomy will be discussed from a functional point of view, with special emphasis on clinical anatomy. Students will acquire anatomical knowledge as a basis for connecting with clinical medicine in that area. Special emphasis will be placed on connecting the structure and function of muscles, skeletal elements and joints as a whole. Within the scope of the course, students will also be familiarized with the basics of biomechanics of large joints and the spine. On the extremities, they will learn the mechanics of joint movement and understand its significance during clinical examinations in modern medicine.

## **Enrolment requirements and entry competencies**

No preconditions are required.

## Learning outcomes at the Programme level

1.1., 1.2., 2.1., 2.2., 2.3., 3.4., 3.5., 4.2.

## Learning outcomes (5-10)

#### Knowledge

1. Determine the logic and meaning behind the anatomical nomenclature and define the basic principles of the muscular, bone and joint system structure.

2. Interpret the parts and mutual relationships of individual anatomical structures of each organ or organ system

3. Assess the irrigation and innervation of each organ and conclude on their physiological significance in the context of the organism as a whole

4. Analyze the structures of the locomotor apparatus and explain their function

5. Theoretically and practically review the content and function of individual anatomical regions and explain the complex topographical relationships within and between individual anatomical structures

6. Compare anatomical differences and use basic anatomical knowledge to connect and explain clinically significant entities with their consequences on the organism

7. Connect the knowledge of anatomy with the principles of physical examination in modern medicine, as well as the presentation of anatomical structures with different imaging diagnostic procedures

## Skills

1. Recognize the defined anatomical boundaries of individual regions and their entire content on the cadavers and isolated organs

2. Determine and explain the topographic relationships in each studied region

3. Independently explain and analyze the structures and functional parts of the individual tissues studied in different sections

## **Course content**

Upper extremities: bones, doctrine of joints, functional anatomy of joints, muscle doctrine, skeletal muscles in the human body, functional anatomy of muscles.

Lower extremities: bones, functional anatomy of joints and ligaments, functional anatomy of muscles, arches of the feet.

Chest: bones, functional anatomy of joints and muscles, diaphragm, topographic regions, breathing mechanics.

Abdomen: abdominal wall and inguinal canal, muscles of the abdominal wall, connection and role of the abdominal musculature in the transmission of movements from the trunk to the pelvis and legs.

Mode of teaching	<ul> <li>☐lectures</li> <li>☐seminars and</li> <li>workshops</li> <li>☐exercises</li> <li>☐distance education</li> <li>☐field teaching</li> </ul>	<ul> <li>➢independent tasks</li> <li>➢multimedia and network</li> <li>☐laboratory</li> <li>☐mentoring work</li> <li>☐other</li> </ul>
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## **Student obligations**

Students are expected to attend all class sessions, as well as to take all the examinations. However, they are allowed for excused absences, totalling 30% of all classes. Active involvement of students in all forms of the teaching process will be encouraged. The student must pass all knowledge tests. Uncompleted exercises and seminars must be retaken and passed.

## Monitoring student work

-							
Attending classes	x	Class activity	x	Seminar work		Experimental work	
Written exam	Х	Oral exam	х	Essay		Research	
Project		Continuous knowledge verification		Paper		Practical work	x
Portfolio							
Grading and evaluation of student work during classes and of the final examination							

Teaching	ECTS	Learning	Student	Assessment	Grade points	
activity		outcome	activity	methods	Min.	Max.
Class attendance nastave (lectures)		Mastering	Attendance at classes,	Attendance list		
Seminars	2	the anatomical learning material, acquiring theoretical and	Seminar work, active participation in discussions	Presentation	5	10
Exercises		practical knowledge provided by the course	Entrance colloquium, preparation of exercises, writing the laboratory exercise diary	Diary, entrance colloquium		
Testing	2	Testing the theoretical knowledge	Learning for the written exam	Written exam	15	30
	2	Testing the practical knowledge	Preparations for the practical exam	Practical exam	10	15
	3	Testing the overall knowledge and its integration	Learning and preparations for the oral exam	Oral exam	20	50
Total	9	litegration			50	100

Calculation of final grade:

Based on the total sum of the points awarded during the course and the final exam, the final grade is determined according to the following distribution:

A – excellent (5): 90-100 grade points;

B – very good (4): 70-79,99 grade points;

C – good (3): 60-69,99 grade points;

D – sufficient (2): 50-59,99 grade points.

# **Required reading**

1) Aumüller G. et al. Duale Reihe Anatomie, 2020, Thieme.

2) Sobotta. Atlas der Anatomie - 3 Bände und Tabellenheft im Schuber, 2017, Elsevier

# Additional reading

1) Waldeyer A. Anatomie des Menschen (Lehrbuch und Atlas in einem Band), 2012, De Gruyter.

2) Schünke M. et al. PROMETHEUS Allgemeine Anatomie und Bewegungssystem (LernAtlas der Anatomie), 2014, Thieme

3) Platzer W. Taschenatias Anatomie, Band 1: Bewegungsapparat, 2013, Thieme 4) Fritsch H, Kühnel W. Taschenatias der Anatomie, Band 2: Innere Organe, 2013. Thieme.

5) Frotscher M, Kahle W. Taschenatlas Anatomie, Band 3: Nervensystem und Sinnesorgane, 2013, Thieme.

Number of copies of required literature in relation to the number of students currently attending classes in the course

Title	Number of copies	Number of students
<ol> <li>Aumüller G. et al. Duale Reihe Anatomie, 2020, Thieme.</li> <li>Sobotta. Atlas der Anatomie - 3 Bände und Tabellenheft im Schuber, 2017, Elsevier</li> </ol>	The purchased license for o used online.de/login.htm?back=http d-online.info.bfdproxy48.bfd-o 2fameos%2fbfdAboGateway9 All students enrolled in the s access to the materials.	https://bfdproxy48.bfd- o%3a%2f%2fpartner.bf online.de% %3fabold%3d264117;

## **Course evaluation procedures**

Anonymous, quantitative, standardized student survey providing feedback on the course as well as on the work of course coordinators and their assistants/associates is being conducted by the QA Office of the Faculty of medicine Osijek as well as the University survey conducted by the Quality Center of the Josip Juraj Strossmayer University in Osijek. The usefulness of the lectures from the students' perspective, the teaching content, the teacher's preparation, clarity of the presentation, the amount of new content and the quality of the presentation are all evaluated. Administratively, the curriculum and its execution are compared. Student participation in lectures and exercises and the reasons for absences are controlled and analyzed.