



TOTAL per year: 40																	
	5			35													
<p>Educational objectives (max. 6 items)</p> <p>C1. During the course of <u>histology</u> students should become acquaint:</p> <ul style="list-style-type: none"> the principles of the basic techniques used in the morphological studies, the organization of the cell model with cell organelles, their structure and functions, structure and function of selected, important specialized cells, classification, characteristics, origin, histological organization and role of the tissues, histological organization of organs and systems and their role and the basic mechanisms that regulate their functions. <p>C2. During the course of <u>embryology</u> students should become acquaint:</p> <ul style="list-style-type: none"> with prenatal part of the human development (including all stages of human pre-embryonic, embryonic and fetal development) with development of pharyngeal apparatus and birth defects associated with the development of head and neck 																	
Education result matrix for module/course in relation to verification methods of the intended education result and the type of class																	
Number of course education result	Number of major education result	Student who completes the module/course knows/is able to	Methods of verification of intended education results (forming and summarising)	Form of didactic class <i>**enter the abbreviation</i>													
W 01	AW1	demonstrates the knowledge of human organism's structures: cells, tissues, organs and systems, especially stomatognathic system	Oral response, written examination	L, MC													
W 02	AW4	describes the organs' and the whole organism's development, especially the masticatory complex development	Oral response Written response Final test	L, MC													
U 01	AU 1	describes concisely the functional significance of the particular organs and systems	Participation in the discussion of problem	L, MC													
U 02	A U 2	The student recognizes in images from optical or electron microscope histological structures corresponding to the organs, tissues, cells and cellular	Oral response, written examination, proper drawing	MC													



		structures, shall describe and interpret their structure and the relationship between structure and function	preparation, practical examination	
K 01	K01	understands the need for learning throughout life	direct observation of student attitudes	L, MC
K02	K02	able to work in a group assuming different roles in it	direct observation of student attitudes	L, MC

** L - lecture; SE - seminar; AC – auditorium classes; MC – major classes (non-clinical); CC – clinical classes; LC – laboratory classes; SCM – specialist classes (magister studies); CSC – classes in simulated conditions; FLC – foreign language course; PCP practical classes with patient; PE – physical education (obligatory); VP – vocational practice; SS – self-study, EL – E-learning .

Please mark on scale 1-5 how the above effects place your classes in the following categories:
communication of knowledge, skills or forming attitudes:

Knowledge: 5

Skills: 4

Social competences: 3

Student's amount of work (balance of ECTS points)

Student's workload (class participation, activity, preparation, etc.)	Student Workload (h)
1. Contact hours:	40
2. Student's own work (self-study):	80
Total student's workload	120
ECTS points for module/course	4
Comments	

Content of classes (please enter topic words of specific classes divided into their didactic form and remember how it is translated to intended educational effects)

- Digestive system: liver and pancreas.
- Endocrine system (hypothalamus, pituitary gland, thyroid and parathyroid, adrenals, pancreas, ovary and testis, diffused neuroendocrine system).
- Respiratory system: upper and distal tract.
- Urinary system (kidney, the structure and function of nephron, lower urinary tract).
- Male and female reproductive system (ovary and uterus, testis and epididymis, hormonal control).
- Nervous system (the neuron's structure and function, neuroglia, the central and peripheral nervous system).
- Skin and breast.
- Sense organs: eye and ear.

Lectures

- Respiratory system.
- Digestive system: liver and pancreas



- Urinary system and reproductive system
- Endocrine system
- Nervous system

Cytology:

- Methods used to study the cell functioning.
- Cell nucleus' organization and functioning.
- Cell cycle and cell aging.
- Types of cell death (apoptosis, necrosis, autophagy).
- Cytoskeleton.
- The most important processes occurring in cytoplasm.
- Intercellular signaling.
- Adhesion molecules and extracellular matrix.
- The most important processes associated with immune response.
- Cancerogenesis.

Practical classes -

- 1.
- 2.
- 3.

Other

- 1.
- 2.
- 3.

etc. ...

Literatura podstawowa:

1. Basic Histology. L. Carlos Junqueira, Jose Carneiro, Robert O. Kelly
2. Human Histology. Alan Stevens, James Lowe
3. Langman's Medical Embriology. T.W. Sadler; Lippincott Williams & Wilkins

Literatura uzupełniająca I inne pomoce:

1. Histology and Cell Biology: An Introduction to Pathology. Abraham Kierszenbaum
2. Histology: a text and atlas. Michael H. Ross, Gordon I. Kaye, Wojciech Pawlina
3. Exercise notebook for medicine and dentistry student (ed. Maciej Zabel). Elsevier Urban & Partner, Wrocław 2010

Preliminary conditions (minimum requirements to be met by the student before starting the module/course)

Basic knowledge of the structure and function of cells, tissues and organs.

Conditions to receive credit for the course (specify the form and conditions of receiving credit for classes included in the module/course, admission terms to final theoretical or practical examination, its form and requirements to be met by the student to pass it and criteria for specific grades)

Conditions to receive credit for the course:



1. Test of practical skills: 10 slides from general histology, 5 slides from detailed histology with pointed elements, 2 electronograms. To pass correctly have to be distinguished at least 7 slides from general histology, 3 from detailed histology and 1 electronogram.
2. Cytophysiology test, written, 50 questions multiple choice. For credit 26 correct answers is required.
3. Final exam in form of written multiple choice test up to 120 questions.

The condition for admission to the final examination of the theoretical: completion of the second semester

Grade:	Criteria
Very Good (5.0)	Point range depending on Gauss classification
Good Plus (4.5)	Point range depending on Gauss classification
Good (4.0)	Point range depending on Gauss classification
Satisfactory Plus (3.5)	Point range depending on Gauss classification
Satisfactory (3.0)	Point range depending on Gauss classification. Minimum 50% correct answers

Name and address of module/course teaching unit, contact: telephone and e-mail address

Department of Histology and Embryology

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Coordinator / Person responsible for module/course, contact: telephone and e-mail address

Marzenna Podhorska-Okolow MD, PhD, Prof.

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tel. 71 784 16 70



List of persons conducting specific classes: full name, degree/scientific or professional title, discipline, performed profession, form of classes.

1. Urszula Ciesielska PhD (adiunct) – lectures, classes
2. Christopher Kobierzycki MD, PhD (adiunct)– lectures, classes
3. Sylwia Borska PhD (adiunct) - seminars

Date of Syllabus development

27. 06. 2017

Syllabus developed by

Urszula Ciesielska PhD.

Signature of Head of teaching unit

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Signature of Faculty Dean

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