

2023/2024. ACADEMIC YEAR							
PROGRAM OF STUDY (FOR STUDENTS OF 3RD YEAR)							
Full (Hun) name of the subject: Kórtani és klinikai alapismeretek (elmélet+gyakorlat) II.							
Program: Undivided program (pharmaceutical)							
Schedule: full-time							
Short name of the subject: Pathophysiology II.							
English name of the subject: Basic Medical Pathophysiology (theory+practice) II.							
German name of the subject: Grundlagen der Pathophysiologie (Vorlesung+Praktikum) II							
Type of registration: obligatory/obligatory elective/elective/criteria requirement							
Neptun code of the subject: GYKGYH128E2A							
Responsible Department: Semmelweis University, Department of Pharmacodynamics.							
Responsible tutor Gabriella Juhász, MD				Title, academic degree: associate professor, DSc			
Contact information: - phone: +36-1-210-29-30/56362 - email: juhasz.gabriella@semmelweis.hu							
Name of the persons responsible for the teaching of the subject: Gabriella Juhász, MD Kornélia Tekes, PharmD Ervin Finta, MD Noémi Papp, PharmD Kinga Gecse, PharmD Sandor Krause, MD				Title, academic degree: associate professor, DSc university professor, DSc head physician, PhD resident lecturer, PhD pharmacist, assistant lecturer psychiatrist			
Class per week: 2 hours lectures 1 hour practice				Credit point(s): 3 credits			
Professional content, intent of acquirement and it's function in order to implement the goals of the program: The goal of the subject is to provide pathophysiological background to understand the mechanism of action of drugs, to prepare pharmacists for professional advising and for the collaboration with other health professionals.							
Short description of the subject: Basic medical pathophysiology focuses on common disorders, especially those ones that can be important for pharmacists during their work. The students learn about the epidemiology of common disorders, pathophysiological mechanisms that can lead to them, acquire knowledge about the main clinical symptoms and the basic therapeutic considerations. The subject has special emphasis on tasks that pharmacists may carry out as healthcare professionals, for example identification of symptoms that require urgent medical help or providing advice for the patients regarding their pharmacological treatment. During the practicals, students deepen their knowledge by working on clinical cases and solving tests.							
Course data							
Recommend ed term	Contact hours (lecture)	Contact hours (practice)	Contact hours (seminar)	Individual lectures	Total number of contact hours/semester	Normal course offer	Consult ations
6th semester	28	14			42	Autumn semester* <u>Spring semester</u> Both semesters (* Please underline)	

Program of semester**

Topics of theoretical classes (pro week):

- 1. week:** Psychiatry: diagnostic systems; neurocognitive disorders
- 2. week:** Schizophrenia, depressive disorders, addictive disorders
- 3. week:** Anxiety disorders, sleep disorders
- 4. week:** Eating disorders, headaches
- 5. week:** Epilepsy, neurodegenerative disorders
- 6. week:** Inflammatory diseases of the nervous system
- 7. week:** Ear disorders. Respiratory diseases I.
- 8. week:** Respiratory diseases II.
- 9. week:** Infectious diseases.
- 10. week:** Musculoskeletal diseases I.
- 11. week:** Musculoskeletal diseases II.
- 12. week:** Endocrine and metabolic diseases I.
- 13. week:** Endocrine and metabolic diseases II.
- 14. week:** Immunologic diseases, oncologic diseases

Topics of practical classes (pro week):

- 1. week:** Case reports: psychiatric disorders I.
- 2. week:** Case reports: psychiatric disorders II.
- 3. week:** Practical class: psychiatric disorders.
- 4. week:** *Written test exam on Moodle system*
- 5. week:** Case reports: neurological diseases I.
- 6. week:** Case reports: neurological diseases II.
- 7. week:** Case reports: diseases of the ear
- 8. week:** Case reports: respiratory diseases
- 9. week:** Case reports: infectious diseases
- 10. week:** *Written test exam on Moodle system*
- 11. week:** Case reports: musculoskeletal diseases
- 12. week:** Case reports: endocrine diseases
- 13. week:** Practical class: recognition of emergency situations, first aid
- 14. week:** Group work

Other subjects (both compulsory and optional) relating to the transversal issues of the subject. Possible overlaps between subjects:

The subject of Basic Medical Pathophysiology builds on the basic biomedical subjects such as Biochemistry and Physiology and prepares the students for the subjects Pharmacology and Toxicology and Pharmacotherapy.

Schedule of consultations: for personal request during practicals.

Course requirements

Prerequisites:

Basic Medical Pathophysiology I.,
Pharmaceutical microbiology,
Dietetics

Conditions of attending the classes, amount of acceptable absents, way of presentation of leave, opportunity for makeup:

Attendance at lectures and practicals will be checked in accordance with the current Study and Examination Regulations. Under the current regulations, students are allowed to miss a maximum of 25% (3 times) of the practicals. It is only possible to make up for absences from practicals with an official certificate, and at a time agreed with the tutors. Participation in the practicals is conditional on reading the lecture materials.

The grading method; the conditions for getting the signature; the number, topic(s) and date(s) of the mid-term assessments, (reports, term tests), and the process in which they contribute to the final grade; and the possibility of their retake or their upgrading retake (as provided in §§ 25-28 of the STUDY AND EXAMINATION REGULATIONS):

Elements of the mid-semester evaluations: written test exams, warm-up tests at the beginning of the practicals, group work.

1. Students will write two written tests during the semester, on Moodle, in weeks 4 and 9. The first test will cover the course material of weeks 1-4 (up to and including eating disorders), the second test will cover the course material of weeks 4-8 (from and including headaches). A maximum of 30-30 points can be achieved for each tests, 50% of which must be achieved to be considered a pass.

It will be possible to retake the written test exams in the week following the test, at an agreed time outside the practical.

Missing or failed written test exams can be retaken in the first week of the examination period in the form of a written test exam covering the entire course material of the semester.

Successful completion of the written test exams is a prerequisite for the end-of-semester signature.

2. A minimum of 50% of the points must be earned on each warm-up-test in order to achieve pass. A maximum of 5 small tests can be retaken during the last exercise.

Successful completion of the warm-up tests is a prerequisite for the end-of-semester signature.

3. The topics for the group work will be given to the students on the 10th week of the practicals.

The groups will be allocated on the basis of the marks obtained in the two written test exams, so that there is an even distribution of students in each group. Each member of the group will be required to contribute equally to the preparation of a poster or other informative material, which the group leader will upload to Moodle by midnight on the day before the last exercise, describing the subtasks that the team members will have completed. The uploaded work will receive an equal pass/fail grade for each team member. Exceptions to this may be made if a student's performance is extremely different from the rest of the group (e.g. inactivity, non-participation) - in which case he/she may receive a different grade from the rest of the group. A passing grade for group work is a condition of the end-of-semester signature.

At the end of the semester, the students will receive a signature and then take an oral examination.

Requirements of signature(as provided for in STUDY AND EXAMINATION REGULATIONS § 29):

1. Attendance of lectures and practicals in accordance with the current Study and Examination Regulations. If a student has more practical absences than the number of practical absences described in the regulations, the semester grade will be "fail" and no signature will be given.

2. A grade of at least pass in each of the two written tests during the semester.

3. Pass all the warm-up tests

4. Pass on the group work.

Number and type of projects students have to perform independently during the semester and their deadlines: -

Type of the semester-end examination: signature*/practical grade*/ comprehensive examination*/final/end-term examination*

Examination requirements: as published by the education-research department on the MOODLE interface by the start of the academic term.

The list of the examination questions will be made available to students on the Moodle system at the beginning of the academic year.

The grade for the examination is determined by the oral answers.

Form of the semester-end examination: written*/oral*/combined examination/**practical examination/the assessment of completing project work (according to STUDY AND EXAMINATION REGULATIONS 30.§)*** (*Please underline*)

The possibility and conditions for offering grades:

Based on the total score of the 5 written test exams and 20 warm-up tests written during the academic year, students with the highest level of knowledge will be offered a topic exemption as follows:

Of the three exam topics, a) students in the top 10% will take one topic, b) students in the top 10.1-20% will take two topics instead of three topics.

Of the three items drawn, it is up to the student to decide which one (or which two) to answer, but questions arising from answering the item may cover the whole course material.

A list of the basic notes, textbooks, resources and literature that can be used to acquire the knowledge necessary to master the curriculum and to complete the assessments, ~~**~~with exact description about which of them is required to acquire which part of the syllabus (e.g. description based on topics)), as well as the main technical and other aids and study aids that can be used:**

Lecture slides and practice slides will be provided on Moodle to help students learn the course material. These form the basis for the assessments. In addition, the Moodle system contains other supplementary materials (e.g. schedules of lectures and practicals, information on written tests, a help with basic knowledge for the final exam) to help students prepare for the exam.

Recommended literature, the relevant parts of which are referred to in lectures and practicals:
Hammer-McPhee: Pathophysiology of Disease (McGraw-Hill, 2018)
Kumar-Abbas-Aster: Robbins Basic Pathology (Elsevier, 2017)

In the case of a subject lasting more than one semester, the position of the teaching/research department on the possibility of parallel enrolment and the conditions for admission**:**

yes*/no*/on and individual assesment basis* (*Please underline*)

The course description was prepared by::

Gabriella Juhasz
associate professor