

Complements of Human Physiology and Physiopathology (J000258)

Course size (nominal values; actual values may depend on programme)

Credits 6.0 Study time 180 h Contact hrs 30.0 h

Course offerings and teaching methods in academic year 2018-2019

A (semester 1) Dutch guided self-study 30.0 h

Lecturers in academic year 2018-2019

Van de Voorde, Johan GE33 lecturer-in-charge

Offered in the following programmes in 2018-2019

	crdts	offering
Master of Science in Laboratory Medicine	6	A

Teaching languages

Dutch

Keywords

Regulation of blood pressure, ionic balance, water balance, pH-regulation, failure of liver, failure of kidney, cellular injury, cancer, regulation of blood gases.

Position of the course

This course aims to provide a profound knowledge and integration of some aspects of physiology and pathophysiology and is based on the knowledge obtained in the courses "human anatomy and general physiology" and "physiology and pathophysiology of body systems". This course provides a fundamental basis for the course "advanced clinical chemistry".

Contents

This course deals with the following topics: advanced knowledge of liver and renal function and integrated physiology for the regulation of blood pressure and the balance of electrolytes and water, advanced knowledge in endocrine systems and cardiovascular diseases.

Initial competences

Final competences of Master of Pharmaceutical Care or Master of Drug Development or having acquired the corresponding competences in another way.

Final competences

- 1 to understand the complexity of water and ionic balance and the relation with blood pressure regulation.
- 2 to understand the regulation of blood pH and the interpretation of acid-base disturbances
- 3 to understand the mechanisms of cellular injury and cancer and the medical terminology used.
- 4 to understand the mechanisms of renal failure.
- 5 to understand the mechanisms of hepatic failure.
- 6 to understand the mechanisms of endocrine dysfunctions.
- 7 to understand the mechanisms of cardiovascular diseases.

Conditions for credit contract

Access to this course unit via a credit contract is determined after successful competences

assessment

Conditions for exam contract

Access to this course unit via an exam contract is unrestricted

Teaching methods

Guided self-study

Learning materials and price

A syllabus with the necessary material is provided via Minerva.

References

Pathophysiology (Copstead and Banasik), 4th edition

Human Physiology - An integrated approach (Silverthorn -5de editie)

Course content-related study coaching

Students have the possibility to ask questions during respons lesson or via E-mail.

Evaluation methods

end-of-term evaluation

Examination methods in case of periodic evaluation during the first examination period

Written examination with open questions

Examination methods in case of periodic evaluation during the second examination period

Written examination with open questions

Examination methods in case of permanent evaluation

Possibilities of retake in case of permanent evaluation

not applicable

Calculation of the examination mark

completely based on the written examination