Module code	M_WE_SEM11 PW 1I/2I ANAL PK
Field(s) of study	Veterinary medicine
Education module name	Clinical analytics of dogs and cats Analityka kliniczna psów I kotów
Language of instruction	English
Type of education module	Elective
Level of education module	Long-cycle Master's degree
Year of study in the field of study	VI
Semester of study in the field of study	XI
ECTS credits, divided into contact/non-contact hours	1 (0.6/0.4)
Name and surname of the person in charge	Dr hab. Piotr Wilkołek
Unit teaching the course	Department and Clinic of Animal Internal Medicine
Module objective	The aim of the course is to provide students with knowledge on the proper selection of laboratory tests based on the data from the patient's history and clinical examination, and the correct interpretation of the results obtained. These classes are designed to teach future veterinarians how to use laboratory results to properly manage a sick dog or cat.
Learning outcomes	Knowledge:
	W1. Knows the basic diagnostic techniques used in veterinary laboratories. in the diagnosis of diseases of dogs and cats
	W2. Knows the indications for the use of laboratory tests in dogs and cats and their usefulness in clinical practice
	Skills:
	U1. Is able to collect samples for examination, handle biological material, use basic diagnostic equipment, interpret results of laboratory tests in clinical diagnostics of dogs and cats and correctly diagnose the disease in dogs and cats on the basis of laboratory test results
	U2. Is able to monitor the general health status of dogs and cats for chronic organ diseases on the basis of clinical examination and laboratory tests
	Social competences:
	K1. is aware of the consequences of formulated conclusions and made decisions in the field of laboratory tests for the health and life of animals
Prerequisites and additional requirements	In accordance to sequence of subjects
Education module content – a concise description of approx. 100 words	Principles of collecting, labelling and transferring samples for laboratory tests in dogs and cats; pre-analytical and analytical errors; most commonly used apparatus for laboratory tests, principles of neutralisation of biological materials; species and organ diagnostic profiles of dogs and cats - hepatic, pancreatic, muscular, cardiac, skeletal; diagnosis of PU/PD syndrome; laboratory testing of urine and functional assays of kidneys; serum morphology and

	enzymatic activity parameters, carbohydrate, fat and protein metabolism parameters; endocrinological tests, specialized tests; principles of cooperation with specialized laboratories
List of core and supplementary literature	Core literature: 1. Sodikoff C.H.: Laboratory profiles of small animal diseases. A guide of laboratory diagnosis. Mosby, 2001 2. Jackson M.L.: Veterinary Clinical pathology. An introduction. Willey Blackwell Pub., 2007 3. Duncan and Prasse's Veterinary Laboratory Medicine Clinical pathology. Willey Blackwell Supplementary literature: 1. Bush BM: Interpretation of Laboratory Results for Small Animal Clinicians. Blackwell Science Ltd.1991 2. Horzinek MC., Schmidt V., Lutz H.: Clinical practice –Cats 3. Niemand H.G., Suter P.F.: Clinical practice –dogs
Planned forms/activities/teaching methods	Didactic methods: multimedia presentations, laboratory exercises, discussion, presentation and discussion of clinical cases.
Verification methods and ways of documenting the achieved learning outcomes	Student's knowledge verification: discussion, oral paper presented in class, graded 2-5; written assessment in the form of a single-choice test, closed questions - the rules of assessment are in accordance with the provisions of the Book of Education Quality. Verification of students' skills: independent performance of selected tests, discussion, independent interpretation of clinical cases Verification of students' social competence: participation in discussions, assessment of cooperation skills
ECTS credits	Exercises - 15 hours. Credit pass - 2 hrs. Number of contact hours - 17 hrs. - 0.6 ECTS credits Preparation for lab classes - 6.5 hrs. Preparation for examination - 5 hrs. Number of non-contact hours/ 11.5 - 0,5 ECTS credits Total - 28.5 hours equals 1 ECTS credit
The workload of activities that require direct participation of an academic teacher	Exercises - 15 hours: tutorials Credit pass - 2 hrs. A total of 17 hours, which is equivalent to 0.6 ECTS credits.
Relation of module learning outcomes to major learning outcomes	W1- B.W4 +++, W2 - B.W4+++. B.W5. +++, B.W6.+++ U1 - B.U6++, B.U7.+++, U2 -, B.U6++, B.U7++ B.U20+ K - K1+, , K5++,
Elements and values affecting final grade	Preparation of oral papers and their presentation in class and a written assessment in the form of a test (20%/80%), the student may have one unexcused absence from class