Course Unit Descriptor

Study Programme: Veterinary Medicine	
Course Unit Title: Ecology and Applied Zoology in Veterinary Medicine	
Course Unit Code: 3IBM2I79	
Name of Lecturer(s): Aleksandar Jurišić, PhD	
Type and Level of Studies: Integrated academic studies	
Course Status (compulsory/elective): elective	
Semester (winter/summer): Summer	
Language of instruction: English	
Mode of course unit delivery (face-to-face/distance learning): face-to-face	
Number of ECTS Allocated: 3	
Prerequisites: exam in Biology	

Course Aims:

The aim of the course is well trained and educated students for the proper use of basic ecological and zoological terms. Training students for monitoring, determination and identification of parasites and vectors important for veterinary medicine and the measures of their control.

Learning Outcomes:

The student is qualified for further education through master's and PhD studies. The students are well trained and educated to understand ecological relationships (coaction, action and reaction in ecosystems), interspecific and intraspecific relations in different types of habitat. The application of acquired knowledge for monitoring and forecasting models as well as adequate and properly implementation of control measures for certain groups of organisms.

Syllabus:

Theory: Definition and basic concepts of ecology. Abiotic factors. Phenology and diapause. The biotic factors. The ecological valence, life form and ecological niches. Population ecology. The impact of anthropogenic factors on changes in the ecosystems. Maintenance of agroecosystems. Applied Zoology. The importance of a specific species in veterinary medicine and the possibilities of their control: Acarina, Insecta, Mollusca, Amphibia, Reptilia, Aves and Mammalia. Monitoring and maintenance of protected species populations in ecosystems.

Practice: Methods for population density calculation. Determining the age structure of the population. Determination of the age and the length growth in fish species. Mortality and mortality tables. Observation and determination of animal species important for veterinary medicine: Aves, Mammalia - determination by keys.

Required Reading:

1. Đukić, N., Maletin, S., Petrović, A. (2018): Zooekologija. Univerzitet u novom Sadu, Poljoprivredni fakultet, Novi Sad
2. Southwood T.R.E., Henderson P.A. (2000): Ecological methods. Blackwell Science.
3. Gratz N. (2006): Vector- and Rodent-borne Diseases in Europe and North America: Distribution, Public Health Burden and Control. Cambridge University Press
4. Bonnefoy X., Kampen H., Sweeney K. (2008): Public Health Significance of Urban Pests. World Health Organization
5. Bowman A.S., Nuttall P. (2008): Ticks: Biology, Disease and Control. Cambridge University Press

Weekly Contact Hours: 60	**Lectures: 30**	**Practical work:30**

Teaching Methods:

Lectures – oral, textual and illustrative / demonstrative methods.
Practical classes - management of students' individual work and demonstrative / illustrative methods

Knowledge Assessment (maximum of 100 points):

Pre-exam obligations	points	**Final exam**	points
Active class participation	5	written exam	30
Practical work	5	oral exam	30

Preliminary exam(s)	30	…….	
Seminar(s)			
The methods of knowledge assessment may differ; the table presents only some of the options: written exam, oral exam, project presentation, seminars, etc.			