

UNIVERSIDADE DE LISBOA Faculdade de Medicina Veterinária

Nutrition and Feeding

Curricular Year: 2nd Duration: 2nd Semester Credits: 10 ECTS

Teachers: Rui Bessa (CCP); Susana Alves (R); Ana Mafalda Gonçalves; Fernando Afonso; Luís Ferreira; Maria João Fradinho; Pedro Bule; Rui Caldeira.

Contact Hours: 125H Total.

69H Lectures; 20H Theoretical-practical; 20H Practical and laboratory teaching; 8H Fieldwork;

8H Seminar.

Learning objectives:

Provide students with essential knowledge about:

- a) the principles of nutrition and feeding of farm and companion animals, promoting understanding of the importance of food in the health and well-being of animals and the quality of products of animal origin;
- b) determining the nutritional needs of each animal species, how to choose the most appropriate feeds and additives for each metabolic scenario and what is the best way to prepare, distribute and present them;
- c) the different categories of animal feedstuffs, their nutritional value and the limitations of their use for the different species and productive stages of animals, and the analytical methodologies available for knowing their constituents.

Program contents:

- Introduction. Food components: Macro- and Micro-Nutrients.
- Digestion and metabolism of nutrients.
- Feed evaluation Digestibility. Energy and protein evaluation
- Voluntary Feed intake.
- Nutritional Requirements for Maintenance, Growth, Reproduction and Lactation
- Feed and feed additives: Processing and technology
- Feeding dogs and cats;
- Feeding Equines;
- Feeding Rabbits;
- Feeding Dairy Cattle;
- Feeding Beef Cattle;
- Feeding small ruminants;
- Feeding Pigs;
- Feeding of laying hens and chickens;
- Feeding in Aquaculture.

Bibliography:

Mandatory - Presentations to support theoretical classes, available on Moodle. Publications:



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- McDonald, P., Edwards, R. A., Greenhalgh, C. A., Morgan, C. A., Sinclair, L. A., Wilkinson, R. G.. (2011). Animal Nutrition, 7th Edition, Prentice Hall.
- FEDNA, Spanish Fund for the Development of Animal Nutrition. Tables of composition and nutritional value of foods. FEDNA standards for the creation of thoughts (several volumes)

Additional: Other scientific and technical articles, legislation and official documentation.

- Case, L. P., Daristotle, L., Hayek., M. G., Raasch, M. F. (2011). Canine and Feline Nutrition: A Resource for Companion Animal Professionals. Elsevier (3rd ed.).
- FEDIAF (2021). FEDIAF Nutritional guidelines for complete and complementary pet food for cats and dogs.

Assessment:

Assessment of the knowledge and skills acquired by the student is carried out through:

- a) A written exam in which the subjects taught in theoretical and practical classes are assessed, consisting of short-answer questions (multiple choice, true and false and filling in spaces in sentences). This component is worth 60% of the final grade, and the final exam grade must be equal to or higher than 10 on a scale of 20.
- b) Assessment of the practical component contributes 40% of the final grade. It will result from the completion and presentation of reports on the analytical component (30% of the practical component), a diet formulation (40% of the practical component) and discussion of scientific articles (30% of the practical component). Student assessment is also crucial for monitoring the effectiveness of the teaching-learning methodologies used, in compliance with the course objectives and for making appropriate adjustments to teaching methodologies and assessing knowledge and skills in the future