

Spring

ANSC 526

Advanced Companion Animal Nutrition

Instructors:



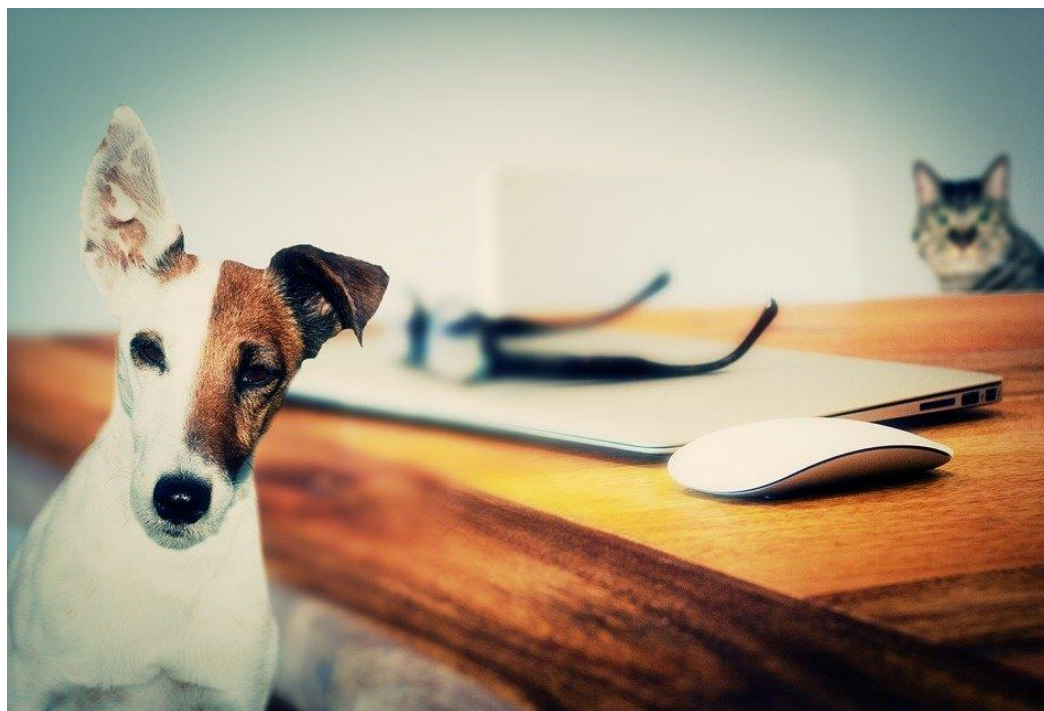
Dr. Maria R. C. de Godoy
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Course description:

This online course will instruct and assist students in learning how to effectively apply advanced concepts related to pet nutrition and disease, including the metabolism within healthy and diseased dogs and cats, how nutrition may aid in preventing and treating disease, and the science behind use of nutraceutical ingredients in diet formulation and manufacturing. Students will develop critical-thinking and problem-solving skills by applying the concepts taught in this course using real-world scenarios.



Course objectives:

1. Understand the importance of obtaining a dietary history and learn how veterinarians apply nutritional assessment guidelines to manage healthy and diseased dogs and cats.
2. Understand and apply advanced concepts pertaining to canine and feline metabolism and nutrition, including the role of diet in clinical disease.
3. Use evidence-based nutrition and medicine from peer-reviewed literature to effectively design specialized pet food products and/or evaluate pet food labels and claims.
4. Effectively evaluate and apply peer-reviewed literature to 'real world' situations.

Course modules and learning goals

- Understand risk factors and pathogenesis of chronic conditions discussed
- Recognize physiological and metabolic alterations due to disease status or stage
- Become familiar with diagnostic tools and assessment
- Explore goals of dietary strategies to support animals with chronic diseases

Modules 1 – 4: Taught by Dr. Kelly Swanson

Module 1

Interpreting and Critiquing Peer-Reviewed Literature



Essential Nutrients of Dogs and Cats

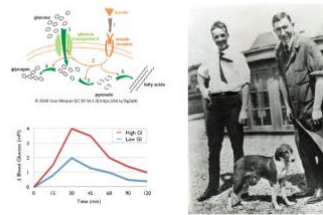


Pet Food Research and Development of Specialized Diets



Module 2

Therapeutic Diet Strategies: Diabetes Mellitus

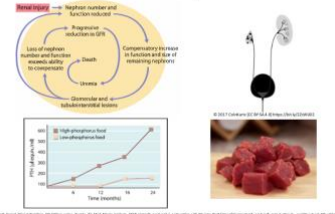


Therapeutic Diet Strategies: Obesity and Metabolic Health

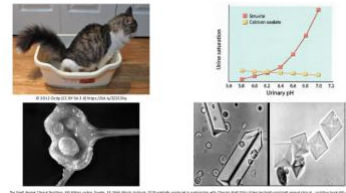


Module 3

Therapeutic Diet Strategies: Chronic Kidney Disease



Therapeutic Diet Strategies: Feline Lower Urinary Tract Diseases



Module 4

Therapeutic Diet Strategies: Gastrointestinal Diseases



Breed-Specific Diet Strategies for Dogs and Cats



Course modules and learning goals

- Define normal physiological processes and organ function during health
- Describe disease etiology, risk factors, and common clinical symptoms
- Understand onset and physiological and (or) morphological processes associated with disease progression
- Discuss treatment options and examine dietary management strategies
- Analyze and appraise current literature on this topic.
- Appreciate veterinarian perspective on therapeutic nutrition assessment and guidelines of pet animals

Modules 5 – 8: Taught by Dr. Maria Godoy

Module 5

Therapeutic Dietary Strategies: Mobility and Osteoarthritis



Therapeutic Dietary Strategies: Oral Health and Periodontal Disease



Module 6

Therapeutic Dietary Strategies: Skin and Coat Health



Therapeutic Dietary Strategies: Food Allergy



Module 7

Therapeutic Dietary Strategies: Aging Pets



Therapeutic Dietary Strategies: Cognitive Function



Module 8

Therapeutic Nutrition: Veterinary Perspective

