

**EQSCI 110 Course Outline as of Fall 2022****CATALOG INFORMATION**

Dept and Nbr: EQSCI 110 Title: EQUINE NUTRITION

Full Title: Equine Nutrition

Last Reviewed: 2/7/2022

Units		Course Hours per Week		Nbr of Weeks	Course Hours Total	
Maximum	1.00	Lecture Scheduled	1.00	17.5	Lecture Scheduled	17.50
Minimum	1.00	Lab Scheduled	0	6	Lab Scheduled	0
		Contact DHR	0		Contact DHR	0
		Contact Total	1.00		Contact Total	17.50
		Non-contact DHR	0		Non-contact DHR	0

Total Out of Class Hours: 35.00

Total Student Learning Hours: 52.50

Title 5 Category: AA Degree Applicable

Grading: Grade or P/NP

Repeatability: 00 - Two Repeats if Grade was D, F, NC, or NP

Also Listed As:

Formerly:

**Catalog Description:**

In this course, students will learn how to develop a horse feeding program with regard to horse type, level of activity, available feedstuffs, cost factors and basic nutritional requirements. This course will cover feeding for maintenance, growth and reproduction as well as feeding methods.

**Prerequisites/Corequisites:****Recommended Preparation:**

Eligibility for ENGL 100 or ESL 100

**Limits on Enrollment:****Schedule of Classes Information:**

Description: In this course, students will learn how to develop a horse feeding program with regard to horse type, level of activity, available feedstuffs, cost factors and basic nutritional requirements. This course will cover feeding for maintenance, growth and reproduction as well as feeding methods. (Grade or P/NP)

Prerequisites/Corequisites:

Recommended: Eligibility for ENGL 100 or ESL 100

Limits on Enrollment:

Transfer Credit:

Repeatability: Two Repeats if Grade was D, F, NC, or NP

## **ARTICULATION, MAJOR, and CERTIFICATION INFORMATION:**

<b>AS Degree:</b>	<b>Area</b>	Effective:	Inactive:
<b>CSU GE:</b>	<b>Transfer Area</b>	Effective:	Inactive:
<b>IGETC:</b>	<b>Transfer Area</b>	Effective:	Inactive:
<b>CSU Transfer:</b>		Effective:	Inactive:
<b>UC Transfer:</b>		Effective:	Inactive:

**CID:**

**Certificate/Major Applicable:**

Certificate Applicable Course

## **COURSE CONTENT**

### **Student Learning Outcomes:**

At the conclusion of this course, the student should be able to:

1. Evaluate equine feeds and supplements by utilizing feed ingredients and guaranteed analysis.
2. Develop a feeding plan for maintenance, growth, and reproduction.

### **Objectives:**

At the conclusion of this course, the student should be able to:

1. Explain the use of common feed ingredients.
2. Evaluate commercially available feeds and hays.
3. Determine protein and energy required for different classes of horses.
4. Identify common metabolic or nutritionally related diseases of the horses.
5. Determine how to feed horses based on body condition score, level of exercise or other health considerations.
6. Explain the anatomy and physiology of the equine digestive tract.
7. Apply understanding of the equine digestive anatomy to explain common issues associated with equine nutrition.

### **Topics and Scope:**

#### **I. Introduction**

- A. Trends in Equine Feed
- B. Classes of horses
- C. Nutrient Requirements
- D. Feeding Myths
- E. Types of Feed

#### **II. Equine Digestion**

- A. Anatomy
- B. Disorders of the digestive tract
- C. Nutrient Digestion

### III. Feedstuffs

- A. Roughages
- B. Concentrates
- C. Supplements

### IV. Nutrition Management

- A. Feed Storage
- B. Feed Preparation
- C. Feed and supplements selection process
  - 1. Feed tags
  - 2. Nutritional analyses
- D. Economics
- E. Body condition score
- F. Nutrition related diseases and disorders
- G. Nutrition by class
  - 1. Maintenance
  - 2. Stallion
  - 3. Broodmare
  - 4. Exercising horse
  - 5. Foals
  - 6. Geriatric horses
- H. Ration formulation

### Assignment:

1. Weekly reading (15-20 pages).
2. Worksheets (10-15).
3. One class project such as developing or evaluating rations for horses of different ages and classes.
4. Quizzes (2-3).
5. Final exam.

### Methods of Evaluation/Basis of Grade:

**Writing:** Assessment tools that demonstrate writing skills and/or require students to select, organize and explain ideas in writing.

None, This is a degree applicable course but assessment tools based on writing are not included because problem solving assessments and skill demonstrations are more appropriate for this course.

Writing  
0 - 0%

**Problem Solving:** Assessment tools, other than exams, that demonstrate competence in computational or non-computational problem solving skills.

Worksheets

Problem solving  
25 - 35%

**Skill Demonstrations:** All skill-based and physical demonstrations used for assessment purposes including skill performance exams.

Class project	Skill Demonstrations 20 - 40%
<b>Exams:</b> All forms of formal testing, other than skill performance exams.	
Quizzes and final exam	Exams 30 - 50%
<b>Other:</b> Includes any assessment tools that do not logically fit into the above categories.	
Participation	Other Category 5 - 15%

### **Representative Textbooks and Materials:**

Nutrient Requirements of Horses. 6th ed. National Research Council, National Academies Press. 2007 (classic)

Equine Nutrition and Feeding. 4th ed. Frape, David. Wiley-Blackwell. 2010 (classic)

Instructor prepared materials