

FORAGE MANAGEMENT AND UTILIZATION
AGRONOMY 302 - Fall 2016

Course Structure:

Class Schedule: 8:50 M,W, F

Instructor: Professor Ken Albrecht

Office: 460 Moore Hall

Phone: 262-2314 Email: kaalbrec@wisc.edu

Office Hours: immediately after class or set up appointment or drop in

References:

Required Text: Forages, Vol. 1, An Introduction to Grassland Agriculture, (6th edition) by Barnes, Nelson, Collins, Moore. Iowa State University Press.

Interactive Forage Modules, available online.

Grass View: Form and Function of Grass, CD ROM, Massey University, available from instructor.

Silage and Hay Preservation by R.E. Pitt, Northeast Regional Agricultural Engineering Service, NRAES-5 (available from instructor).

Class Handouts: numerous handouts will be provided to supplement lectures.

General Course Objectives:

To develop an understanding of forage species and management practices optimizing forage production and quality.

To promote an appreciation for the relationship between forage production and livestock industries.

To acquaint students with the contribution of forages to a sustainable agriculture.

Course Procedure:

Lecture and discussions will be based on reading assignments.

Grass and legume identification will be addressed in the "lab practicum".

Performance Evaluation:

Three exams	300 points (100 points each)
Legume/grass ID	50 points (25 + 25 points)
Final exam (comprehensive)	100 points
Total	450 points

Graduate Students Only:

A review and synthesis of literature on a topic relevant to “forage management or utilization” is required. Weight of this paper will be 100 points, equal to an exam.

Date	Topic	Readings
Sept. 7	Introduction	Handouts
Sept. 9	Forages in Wisconsin, USA, World	Chapt. 1 & Forage Module
Sept. 12	Structure and morphology of grasses	Chapt. 2 & Forage Module
Sept. 14	Structure and morphology of legumes	Chapt. 3 & Forage Module
Sept. 16	Physiology of forage plants	Chapt. 4 & Forage Module
Sept. 19	continued	
Sept. 21	continued	
Sept. 23	Environmental aspects of forage management	Chapt. 5
Sept. 26	continued	
Sept. 28	Forage quality	Chapt. 16
Sept. 30	continued	
Oct. 3	continued	
Oct. 5	Legumes for Northern Areas (Alfalfa)	Ch. 8, handouts
Oct. 7	EXAM #1	
Oct. 10	Alfalfa	
Oct. 12	Alfalfa	
Oct. 14	Alfalfa	
Oct. 17	Alfalfa	
Oct. 19	Red clover	
Oct. 21	Birdsfoot trefoil	
Oct. 24	White clover	
Oct. 26	Kura clover	
Oct. 28	EXAM #2	
Oct. 31	Grasses for Northern Areas	Chapt. 6, handouts

Nov. 2	continued	
Nov. 4	continued	Handouts
Nov. 7	continued	"GrassView" CD
Nov. 9	continued	
Nov. 11	Establishment	Chapt. 11
Nov. 14	Nutrient Management (Carrie Laboski)	
Nov. 16	Forage/Animal Disorders	Chapt. 18
Nov. 18	continued	
Nov. 21	Principles of Hay Making	Chapt. 19, Handouts
Nov. 23	EXAM #3	
Nov. 25	Thanksgiving Break	
Nov. 28	Principles of Hay Making (cont.)	
Nov. 30	Principles of Ensiling	Chapt. 19, Forage Module
Dec. 2	Legume and Grass Silage	Handouts
Dec. 5	continued	
Dec. 7	Corn for silage	Handouts
Dec. 9	continued	
Dec. 12	Application to grazing systems (Vance Haugen)	Chapt. 17, Forage Module
Dec. 14	Application to dairy production (Randy Shaver)	Chapt. 20
Dec. 20	FINAL EXAM, 10:05 AM	