

**ANSC - 1204 Introduction to Animal Science, 4.00 Credits**

Level: Lower

Applied Learning-Practicum, Course Fee \$33.00, Liberal Arts and Science

This course provides a survey of the Dairy Cattle and Livestock industry, including beef, sheep, swine, and horses. Breeding and feeding systems, disease control measures, housing and basic management practices. The selection of animals for production, market, and breeding. Characteristics of the major breeds, their economic importance and marketing trends of their products will be covered.

**ANSC - 2102 Dairy Cattle Reprod & A.I Tech, 2.00 Credits**

Prerequisite(s): ANSC 1204 with D+ or better or VETS 3204 with C or better

Level: Lower

Applied Learning-Practicum, Course Fee \$24.00

This course will provide the student with a basic understanding of reproduction and artificial insemination (A.I.) techniques in dairy cattle. The student will gain an understanding of the anatomy of the bovine reproductive tract through examination and palpation of both slaughterhouse specimens and live animal palpations. The student will learn to read sire summaries, use linear scoring, apply recordkeeping approaches and analysis of herd reproductive performance. Common reproductive diseases will be discussed as well as the latest information on heat detection and synchronization programs. The labs and two required field trips provide individual student A.I. training and practice sessions needed for the National Association of Animal Breeders (NAAB) certification.

**ANSC - 2114 Dom Animal Anat & Phys, 4.00 Credits**

Level: Lower

Applied Learning-Other, Course Fee \$24.00, Liberal Arts and Science

This course is a systems approach to the study of anatomy and physiology of common domestic animals, emphasizing Ruminant, Equine, Swine, Canine and Feline as the animal models. The on-line course materials will provide the student with a complete overview of how each body system functions in the maintenance of a normal healthy animal. The on-line course materials will be reinforced in the laboratory where skeletons, models and prosected specimen will allow the student to gain applied perspectives of the gross anatomy and normal physiology. Histologic slides, kodachromes, radiographs and live animals will also be used to enhance student understanding. Computer simulated dissection materials will also be used to provide the opportunity for the students to refine their understanding of the required information.

**ANSC - 3003 Feeds and Nutrition, 3.00 Credits**

Level: Lower

This course provides the student with an understanding of animal nutrition. Students will learn feeding farm animals for growth, production, and profit, nutrient content and physiological value of feeds; nutrient requirements of farm livestock; physiology of digestion and developing and evaluating rations.

**ANSC - 3013 Animal Disease Control, 3.00 Credits**

Prerequisite(s): ANSC 1204 with D or better

Level: Lower

In this course, fundamental information on the nature of disease and its control and prevention will be studied. Students will learn the causes, symptoms, prevention and treatment of common diseases as well as to the life cycles, damage, diagnosis, control and treatment of various internal and external parasites.

**ANSC - 3103 Livestock Mgmt & Production, 3.00 Credits**

Level: Lower

The course introduces the student to the management and production of assorted species of livestock. Breeds of sheep, beef, and swine will be studied as well as the skills in selecting and judging these species. Feeding and management of each of these species, as well as housing and equipment requirements for animals in specific types of operations will be examined. Students will be introduced to diseases and parasites that may be encountered when managing a species-specific livestock operation. Students will also gain insight into different types of marketing used in livestock production.

**ANSC - 3203 Dairy Cattle Production I, 3.00 Credits**

Prerequisite(s): ANSC 1204 with D or better or VETS 3204 with D or better

Level: Lower

Applied Learning-Field Study

Dairy Cattle Production I is an introduction to specific subject matter which influences cattle production units today. Subject matter includes: on-farm disease control and biosecurity, calf and heifer management, milk letdown and physiology of lactation, udder health, basic herdsman skills and introduction to Dairy Comp 305 record keeping software.

**ANSC - 3204 Dairy Cattle Production III, 4.00 Credits**

Prerequisite(s): ANSC 1204 with D or better or VETS 3204 with D or better

Level: Lower

Applied Learning-Field Study

Dairy Cattle Production III focuses on dairy farm management analysis to troubleshoot and prioritize production and profitability opportunities. The course includes: developing on-farm observation skills, production records analysis using Dairy Comp 305, monitoring cow and rumen health, nutrition and feeding management and employee management.

**ANSC - 3223 Dairy Calf Management, 3.00 Credits**

Prerequisite(s): ANSC 2114 with D or better or ANSC 1204 with D or better

Level: Lower

Applied Learning-Field Study

This course will provide the student with a basic understanding of the nutritional, environmental and health challenges a calf must go through from birth to yearling stage. Lab sessions will focus on mastering basic calf care skills. Field trips will be incorporated into the laboratories to expose students to different management approaches including custom calf raisers, and large and small herd replacement enterprises. Students will spend two hours per week practicing calf care procedures.

**ANSC - 3243 Dairy Management Analysis, 3.00 Credits**

Level: Lower

Applied Learning-Practicum

Dairy Management Analysis is an overview of the factors that influence dairy cattle production units today. Topics include dairy records analysis, fresh cow management, heifer and calf management, housing and ventilation, economics, profitability factors and employee management. Participation in the Northeast Dairy Challenge interscholastic competition or an assigned farm assessment with presentation is required.