I. **TITLE:**

Applications in Animal Technology

II. **CATALOG DESCRIPTION:**

The purpose of this course is to introduce the student to various aspects of animal health, care, and handling of both large and small animals. Students will learn the safety aspects used in working around various species of animals. Basic terminology, anatomy, physical exams, injection techniques, restraint, herd health, husbandry, and appropriate housing facilities are also addressed. Prerequisite: AGR 100.

III. **PURPOSE:**

To introduce the student to various species of animals and teach basic skills necessary to promote safe, adequate and proper handling. Also, to introduce the student to the proper technical applications necessary in the agricultural industry.

IV. **COURSE OBJECTIVES:**

A. To introduce the student to safe and proper handling skills of large and small animals.
B. To teach the student basic restraint methods of large and small animals.
C. To familiarize the student with animal behavior and instincts of various species.
D. To teach the student basic physical exam techniques and normal parameters of large and small animals.
E. To teach the student basic terminology as it applies to all species.
F. To teach the student basic anatomy and body regions.
G. To teach the student basic drug calculations.
H. To introduce the student to basic clinical diagnostic procedures.

V. **CONTENT OUTLINE:**

Lecture:
A. Medical Terminology
B. Restraint techniques for the Canine patient
C. Restraint techniques for the Feline patient
D. Restraint techniques for the Equine patient
E. Restraint techniques for the Bovine patient
F. Understanding the Animal Body and the Structures
G. Skeletal System
H. Muscular System
I. Integumentary System
J. Cardiovascular System
K. Respiratory System
L. Gastrointestinal Tract
M. Genitourinary System
N. Drug Calculations

Laboratory:
A. Tour of the facility
B. Basic restraint techniques and behavior of the Canine patient
C. Basic restraint techniques and behavior of the Feline patient
D. Basic restraint techniques and behavior of the Equine patient
E. Basic restraint techniques and behavior of the Bovine patient
F. Anatomy laboratory learning bones and structures of large and small animal
G. Physical examinations on the canine, feline, equine and bovine species, along with the introduction of the SOAP method for writing the physical examination
H. Practice drug calculations, review of homework

VI. INSTRUCTIONAL ACTIVITIES:
A. Classroom lectures
B. Instructional videotapes
C. Outside laboratories at herd units working with various species
D. Inside laboratories working with small animals

VII. FIELD AND CLINICAL EXPERIENCES:
Several laboratories will be held at various herd units located on the university farm. Other field activities scheduled when possible.

VIII. RESOURCES:
A. Outside references
B. Instructional videotapes
C. Animal Science and Veterinary Journals
D. NetVet
E. Other Internet web sites
IX. **GRADING PROCEDURES:**

Five one-hour exams will be given along with a drug calculation exam. Each exam will be worth 100 points. Absences (excused or unexcused) from an exam will result in an automatic 10 point deduction from the exam. All make up exams will be given the week of finals and will be in essay format.

Grading scale
- 90 – 100 = A
- 80 – 89 = B
- 70 – 79 = C
- 60 – 69 = D
- Below 60 = E

X. **ATTENDANCE POLICY:**

Please refer to the most current copy of the *Murray State University’s Undergraduate Bulletin and Graduate Bulletin.*

Each student is allowed 3 absences. After the third absence, the final grade will drop 1 letter grade for each day missed. These 3 days include excused and unexcused absences. Always check with the instructor about extenuating circumstances.

XI. **ACADEMIC HONESTY POLICY:**

(Adopted by the MSU Board of Regents)
Cheating, plagiarism (submitting another person’s material as one’s own), or doing work for another person which will receive academic credit are all impermissible. This includes the use of unauthorized books, notebooks, or other sources in order to secure or give help during an examination, the unauthorized copying of examinations, assignments, reports, term papers, or the presentation on unacknowledged material as if it were the student’s own work. Disciplinary action may be taken beyond the academic discipline administered by the faculty member who teaches the course in which the cheating took place.

NOTE: The School of Agriculture Faculty have adopted and implemented an Academic Honesty Policy in addition to the University Honesty Policy, which can be found in the current *Undergraduate Bulletin and Graduate Bulletin.* The policy sets guidelines regarding acts of dishonesty and the procedure to follow should an event occur. It is each Agriculture student’s responsibility to obtain and read a copy of this document. The School’s Academic Honesty Policy can be obtained by asking for a copy from any Agriculture Faculty member or the Secretary.
XII. **TEXT AND REFERENCES:**


XIII. **PREREQUISITES:**

AGR 100

XIV. **STATEMENT OF AFFIRMATIVE ACTION AND EQUAL OPPORTUNITY:**

Murray State University endorses the intent of all federal and state laws created to prohibit discrimination. Murray State University does not discriminate on the basis of race, color, national origin, gender, sexual orientation, religion, age, veteran status, or disability in employment, admissions, or the provision of services and provides, upon request, reasonable accommodation including auxiliary aids and services necessary to afford individuals with disabilities equal access to participate in all programs and activities. For more information, contact Sabrina Y. Dial, Director of Equal Opportunity, Murray State University, 103 Wells Hall, Murray, KY 42071-3318. Telephone: 270-809-3155 (voice), 270-809-3361 (TDD).

XV. **MSU SCHOOL OF AGRICULTURE CELL PHONE POLICY**

The School of Agriculture recognizes that in today’s world cell phones are a familiar and often necessary form of communication for students.

It shall be the policy of the School that no cell phone usage shall be allowed in class and/or labs without the prior consent of the course instructor. This shall include verbal calling, incoming calls, email, text messaging, and use of cell phone calculators on tests and quizzes.

Cell phones must be kept off and out of sight (i.e. secured to a person’s belt or kept in a bag or purse away from desks and lab counters).

Should a student’s cell phone be visible, ring, or other form of unauthorized usage that is interruptive to the class or lab, the student may be asked to leave class and not return for that class/lab period.

Upon prior consent of the instructor, a student may obtain permission to have their phone on in case of an emergency or in critical family situations.

This policy also includes pagers and other electronic equipment such as blackberries and/or computers/laptops.