

# STRANDS AND STANDARDS

## VETERINARY ASSISTANT 2



### Course Description

This course is designed for students who have previously taken the Veterinary Assistant I course and wish to further their education and training in the veterinary field. The Veterinary Assistant II course expands student knowledge, reinforces skills previously learned, and builds proficiency in highly scientific areas, such as pharmacology, anesthesiology, radiology and imaging, fluid therapy, and critical care nursing.

<b>Intended Grade Level</b>	11-12
Units of Credit	1.0
Core Code	30.02.00.00.095
Concurrent Enrollment Core Code	N/A
Prerequisite	Veterinary Assistant 1
Skill Certification Test Number	125
Test Weight	1.0
<b>License Area of Concentration</b>	CTE and/or Secondary Education 6-12
<b>Required Endorsement(s)</b>	
Endorsement 1	Agriculture (CTE/General)
Endorsement 2	Animal Science
Endorsement 3	N/A

## STRAND 1

**Student will participate in personal and leadership development activities through the FFA.**

### Standard 1

Student will use communication skills to effectively communicate with others.

- Understand when it is appropriate to listen and to speak.
- Understand and follow verbal and written instructions for classroom and laboratory activities.
- Will practice communication skills through public speaking using one or more of the following activities: memorized speech, prepared speech, extemporaneous speech, parliamentary practice, group presentation, or serving in a leadership capacity.

### Standard 2

Student will effectively use teamwork to respectfully work with others.

- Identify and understand different roles in working with a team.
- Lead a group discussion or serve in a leadership capacity.

### Standard 3

Student will use critical thinking and problem-solving skills

- Analyze the cause of the problem.
- Develop a solution to address the problem.
- Implement the plan.
- Evaluate the effectiveness of the plan.

### Standard 4

Student will be dependable, reliable, steady, trustworthy, and consistent in performance and behavior.

- Set and meet goals on attendance and punctuality.
- Prioritize, plan, and manage work to complete assignments and projects on time.

### Standard 5

Student will be accountable for results.

- Use an achievement chart for activities and behaviors in class that encourages a personal evaluation of classroom performance.
- Use reflection to describe what was learned, what went well, what could have been improved, and what are the implications to the learning process.
- Track and communicate progress toward completion of assignments and projects.

### Standard 6

Be familiar with the legal requirements and expectations of the course.

- Be familiar with the course disclosure statement and all requirements for successful completion of the course.
- Demonstrate workplace ethics, e.g. fair, honest, disciplined.

## STRAND 2

**Student will participate in work-based learning activities through the Supervised Agricultural Experience (SAE) Program.**

### Standard 1

Student will demonstrate employability skills.

- Use a career search network to find career choices.
- Identify appropriate CTE Pathway for selected career choice.
- Prepare for entry into the work force by completing one of the following: list of required skills needed for a career choice, a resume including a list of demonstrated skills, a cover letter or letter of application, a job application, or participate in an actual or simulated job interview.

### Standard 2

Student will participate in a work-based learning experience outside the classroom

- Student will plan and implement a Supervised Agricultural Experience Program:
  - Foundational SAE: Career exploration and planning, employability skills for college and career readiness, personal financial management and planning, workplace safety, and agricultural literacy.
  - Immersion SAE: Ownership/entrepreneurship, placement/internship, research, school-based enterprise, and/or service-learning experiences.

### Standard 3

Student will develop a job portfolio specific to their selected SAE/WBL experience.

- Student will keep a personal record/journal/log of their SAE/WBL experience; including pictures, financial records or log of their hours, skills learned, goals, reflection, etc.

## STRAND 3

**Students will demonstrate the ability to provide safe and appropriate care of animals, to include small, large, exotic and laboratory animals.**

### Standard 1

Students will further develop and refine animal-care skills that were taught during the Veterinary Assisting 1 course.

### Standard 2

Students will further develop assessment skills and be able to demonstrate the ability to evaluate patient needs and develop a safe, effective plan of care.

### Standard 3

Advanced students will demonstrate their technical and clinical skills, as well as their communication and leadership abilities, as they assist in teaching veterinary assisting skills to first-year students.

## STRAND 4

**Students will exhibit an understanding of pharmacological principles as they demonstrate the ability to calculate dosages, safely administer medications, and monitor patient outcomes.**

### Standard 1

Students will demonstrate knowledge of and ability to follow safe practices related to medication administration and the ability to recognize adverse effects.

### Standard 2

Students will demonstrate the ability to interpret medication orders and follow them as ordered.

### Standard 3

Students will become familiar with the generic and brand names of various drugs.

### Standard 4

Students will have knowledge of the drug categories and what drugs are commonly found in those categories.

### Standard 5

Students will be able to accurately calculate dosages and know how to administer medications by parenteral, enteral, topical, and other routes.

### Standard 6

Students will apply their knowledge of anatomy and physiology principles as they evaluate how medications will affect various body systems.

### Standard 7

Students will demonstrate the ability to properly educate clients about medications.

### Standard 8

Students will demonstrate an understanding of the regulations governing the use of controlled substances.

### Standard 9

Students will demonstrate compliance with all regulatory guidelines related to drug purchase, storage, administration, disposal, and inventory control.

## STRAND 5

**Students will assist with surgical procedures, further developing the skills gained during the Veterinary Assisting 1 course.**

### Standard 1

Students will demonstrate an understanding of surgical and aseptic principles.

### Standard 2

Students will be skilled in passing and utilizing surgical instruments.

**Standard 3**

Students will demonstrate the ability to assist with surgical procedures, from the pre-operative through the post-operative stage.

**STRAND 6**

**Students will demonstrate the ability to manage patients safely and effectively from pre- anesthesia to anesthesia recovery.**

**Standard 1**

Students will demonstrate the ability to follow safe practices related to anesthesia administration.

**Standard 2**

Students will demonstrate an understanding of the use and maintenance of anesthesia machines.

**Standard 3**

Students will demonstrate the ability to calculate dosages of appropriate anesthetic-related drugs.

**Standard 4**

Students will be able to utilize their knowledge of anatomy and physiology to evaluate the possible effects of anesthesia on the patient.

**Standard 5**

Students will demonstrate the ability to administer anesthetic-related drugs by injection and inhalation techniques.

**Standard 6**

Students will demonstrate the ability to monitor patients while under anesthesia.

**Standard 7**

Students will demonstrate the ability to provide post-operative patient care.

**Standard 8**

Students will demonstrate effective trouble shooting skills, for both machine and patient problems that may arise.

**Standard 9**

Students will be able to compare anesthesia requirements and concerns in various species of animals.

**STRAND 7**

**Students will be able to produce radiographs and alternative images safely and effectively.**

**Standard 1**

Students will demonstrate knowledge of and ability to follow safe practices related to radiology and imaging procedures.

**Standard 2**

Students will implement radiographic quality control measures.

**Standard 3**

Students will demonstrate the ability to correctly position animals for imaging procedures.

**Standard 4**

Students will exhibit an understanding of animal anatomy as they implement radiographic and imaging procedures.

**Standard 5**

Students will demonstrate the ability to accurately utilize ultrasonography, digital, and endoscopic equipment.

**Standard 6**

Students will accurately demonstrate developing techniques for both manual and automatic processors.

**Standard 7**

Students will demonstrate the ability to utilize table-top and portable radiography machines.

**Standard 8**

Students will demonstrate the ability to troubleshoot as problems arise.

**STRAND 8**

**Students will demonstrate the ability to provide fluid therapy safely and effectively.**

**Standard 1**

Students will demonstrate the correct placement of peripheral and central line IV catheters.

**Standard 2**

Students will properly maintain and care for IV catheters.

**Standard 3**

Students will be able to correctly calculate fluid needs and drip rates based on dehydration status.

**Standard 4**

Students will be able to describe the use of the various fluids used for fluid therapy and delivery systems.

**Standard 5**

Students will correctly demonstrate how to administer fluids.

**Standard 6**

Students will identify the clinical symptoms of fluid overload and know the proper treatment of this condition.

## STRAND 9

Students will demonstrate an ability to evaluate the patient's condition and provide critical care nursing, as needed.

### Standard 1

Students will apply acquired knowledge of anatomy and physiology as they evaluate patient condition.

### Standard 2

Students will demonstrate an understanding of medical terminology relating to medical records.

### Standard 3

Students will demonstrate knowledge of emergency protocols and implement them, as needed.

### Standard 4

Students will demonstrate proficiency at performing triage, CPR, and first aid.

### Standard 5

Students will demonstrate an understanding of concepts and the ability to perform skills related to the following types of emergencies:

- Respiratory Emergencies
- Gastrointestinal Emergencies
- Musculoskeletal Emergencies
- Metabolic and Endocrine Emergencies
- Neurological Emergencies
- Toxicological Emergencies
- Cardiology Emergencies (ECGs)

### Standard 6

Students will demonstrate an understanding of appropriate nutritional needs for the critical patient.

### Standard 7

Students will maintain emergency supplies

### Standard 8

Students will understand the physical therapy techniques used in neurological and musculoskeletal disorders.

### Standard 9

Students will demonstrate an understanding of appropriate critical care nursing by analyzing case studies and identifying the appropriate treatment.

## STRAND 10

Students will express an understanding of veterinary laws and ethics.

### Standard 1

Students will understand the laws that govern veterinary medicine.

### Standard 2

Students will recognize the legality of the veterinary-client-patient relationship.

### Standard 3

Students will be able to identify the various associations available in the veterinary field.

## Performance Skills

- Attend an FFA meeting.
- The student will participate in a Supervised Agricultural Experience (SAE) Program.
- The student will demonstrate the ability to evaluate a patient.
- The student will be able to accurately calculate dosages.
- The student will be able to correctly interpret medication orders and correctly administer medication.
- The student will demonstrate safe practices related to anesthesia administration.
- The student will be able to correctly calculate fluid needs and drip rates based on dehydration status.
- The student will correctly demonstrate how to administer fluids
- The student will demonstrate the ability to appropriately respond to respiratory and cardiology emergencies.
- The student will demonstrate proficiency at performing triage, CPR, and first aid.

## Workplace Skills

Students will develop professional and interpersonal skills needed for success in industry. Determine the difference between hard skills and soft skills.

- Hard Skills: Hard skills are specific, teachable abilities that can be defined and measured
- Soft Skills: Personal attributes that enable someone to interact effectively and harmoniously with other people.

Identify soft skills needed in the workplace

- Professionalism
- Respect Legal requirements/expectations
- Good communication skills
- Resourcefulness & creativity
- Work ethic

## Skill Certification Test Points by Strand

Test Name	Test #	Number of Test Points by Strand										Total Points	Total Questions	
		1	2	3	4	5	6	7	8	9	10			