

GWANDA STATE UNIVERSITY



FACULTY OF LIFE SCIENCES

DEPARTMENT OF ANIMAL SCIENCES

BACHELOR OF SCIENCE HONOURS DEGREE IN ANIMAL SCIENCE

ANIMAL HEALTH

LAS 2104

First Semester Final main Examination Paper

November 2019

This examination paper consists of 4 pages

Time Allowed: 3 hours

Total Marks: 100

Special Requirements: None

Examiner's Name: Dr B. Moyo

INSTRUCTIONS

1. Answer **all** questions in Section A
2. Answer **only two** questions in Section B

MARK ALLOCATION

QUESTION	MARKS
SECTION A	60
SECTION B	40
TOTAL ATTAINABLE MARKS	100

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SECTION A: Answer **ALL** questions in this section.

Question 1

Write an essay on heartwater in cattle under the following subheadings:

- a. Clinical signs [10]
- b. Treatment [4]
- c. Prevention and control. [6]

Question 2

A farmer reports a Rabies outbreak on his farm and asks for your assistance.

- a. List the clinical signs of Rabies in female cattle. [10]
- b. Describe the treatment of Rabies in cattle. [2]
- c. What would you advise the farmer regarding the prevention and control of rabies in his cattle herd? [6]
- d. What first aid should be given if his workers has been bitten by suspected rabid animal? [2]

Question 3

Before you administer medication to an animal, you have to choose the most appropriate route of administration.

- a. List the various routes of drug administration that can be used in a sheep. [5]
- b. Describe the recommended processes and procedures you must follow in preparing syringes, needles, injection sites in a cow. [5]
- c. Describe the steps you should use to administer an intramuscular injection in a cow. [7]
- d. Outline reasons why animals are restrained on a farm. [3]

SECTION B. Answer only **TWO** questions in this section

Question 4

An emerging beef farmer in Alice requests your assistance in drafting a programme to control ticks. He uses the plunge dip for his animal. However the farmer does not know the capacity/volume of his tank. He has the following measurements. Top length is 1000cm, bottom length is 600 cm, Top width is 100 cm, bottom width is 60cm and depth of the tank was 200 cm. The farmer uses Ektoban as an acaricide. He applies 25 litres of the acaricide as a fresh fill. The mixing ratio is 15ml:10 litres.

- a) Advise the farmer if he is applying the correct quantity. In your answer show him how you calculated the volume/capacity of the diptank and the amount of the acaricide needed. **[14]**
- b) What are the effects applying 25 litres into his dip tank? **[3]**
- c) Advise him how he should have effective dipping in his farm. **[3]**

Question 5

A Farmer in Insiza District, reported that his cattle's muzzle are peeling off with fever. As you inspect the cattle you find that they are heavily infested with the *Ripicephalus Boophilus* tick species.

- a. Name the disease that you suspect. **[1]**
- b. List the possible post-mortem signs that could be seen when the animal dies from this disease. **[6]**
- c. Name the other possible clinical signs that are associated with this disease. **[7]**
- d. You decide to treat the animal with Alamycin LA (oxytetracycline) which weighs 300kg. The required dose for the treatment in cattle is 20 mg/kg body weight IM. On the bottle it is labeled that each ml of Alamycin LA contains 200mg of oxytetracycline. Alamycin LA has a meat withdrawal period of 28 days and milk withdrawal of 4 days.
 - i. How many mg of oxytetracycline should you inject into the cow? **[3]**
 - ii. How many mls of Alamycin LA should you administer to achieve this dose?[**3]**

Question 6

a. Describe how to administer injections in the following sites;

i. Intramuscular; [5]

ii. Intravenous jugular vein. [5]

b. A farmer closer to Kruger National parks reports that all most all his cattle have some ulceration on the tongue and have lameness.

i). Name the suspected disease. [2]

ii) What are the other clinical signs that his animal may display? [8]