Uganda Martyrs University Faculty of Agriculture

Bachelor of Science General Agriculture Year Three Supplementary Exam

Module: AG/11 Animal Health and Nutrition

Time allowed: 3hours

Instructions:

- Read and understand the question before answering
- Select and answer any Four (4) Questions
- Start each answer on a separate answer sheet

1a.Discuss reasons why ticks are considered a major constraint to the development of the livestock sector in Uganda.

1b.Discuss the principle of infection and treatment method (ITM) system of immunization against East Coast Fever (10 marks)

2a.Distinguish between primary ruminal bloat and secondary ruminal bloat

2b. What do you understand by the term metabolic diseases? List at least 5 metabolic diseases in cattle

3a. Vector born diseases of livestock are some diseases that are most difficult to eradicate due to vector-pathogen relationship. What is a pathogen?

3b.Discuss two ways of pathogen vector relationship in livestock

3c. Explain 4 ways through which pathogens are transmitted from vectors to susceptible animals

4a.After your studies and you are hired as an advisor, discuss at least 5 general recommendations you would consider when designing animal health management plan on a dairy farm 4b.Explain 5 reasons why there are more livestock diseases in highly intensive management systems compared to extensive management systems

ANIMAL NUTRITION

- 1a. Carbohydrates are the main source of energy for dairy cattle. Name three categories of carbohydrates (3 marks)
- 1b. List three methods of analysis of fibre content of a feed. (6 marks)
- 1c. Discuss three categories of forage protein based on degradation in the rumen of ruminant animals (9 marks)
- 1d. Name two classifications of vitamins. (2 marks)
- 2a. Distinguish between hay and silage (4 marks)

2b. Why is hay making rarely practised in Uganda? (6 marks)

2c. Discuss the process of making good quality silage (10 marks)

3a. What is hydroponics fodder system (5 marks)

3b. List 5 benefits of hydroponics fodder system in dairy farming (5 marks)

3c. List 5 benefits of hydroponics fodder system in pig farming (5 marks)

3d.Briefly explain the factors that influence the amount of feed a chicken will consume? (5 marks)

4a. Name two types of feeds fed to commercial broiler poultry from day one till the end of fattening period (day 1- week 7-8) (4 marks)

4b. Discuss 4 ways how pig farmers can improve pig feed efficiency (8 marks)

4c. Explain the functions of the reticulo-rumen part of the digestive system of a dairy cow