TECHNICAL UNIVERSITY OF MOMBASA
Faculty of Applied & Health Sciences

DEPARTMENT OF ENVIRONMENT AND HEALTH SCIENCES

DIPLOMA IN ENVIRONMENTAL AND HEALTH SCIENCES

(DEHS 014M)

APH 2103: ANATOMY & PHYSIOLOGY OF FOOD ANIMALS

SPECIAL/SUPPLEMENTARY EXAMINATIONS

SERIES: FEBRUARY 2015

TIME: 2 HOURS

INSTRUCTIONS:

− This paper consists of **FIVE** questions.
− Answer question **ONE (Compulsory)** in Section **A** and any other **TWO** questions in **B**.
This paper consists of Two printed pages.

SECTION A (Compulsory) 30 Marks
QUESTION 1

a) Define the following terms as used in anatomy and physiology of food animals:
   i) Anatomy **(1 mark)**
   ii) Physiology **(1 mark)**
   iii) Heifer **(1 mark)**
   iv) Rum **(1 mark)**
   v) Bull **(1 mark)**

b) Compare the carcase of a goat to that of a sheep. **(5 marks)**

c) You have been posted to an area where cases of dog meat have been reported as a Public Health Officer how would you differentiate between the carcase of a dog to that of a goat. **(5 marks)**

d) Compare the liver of a horse to that of a bovine. **(5 marks)**

e) Lymph nodes are named according to the location, name **FIVE** lymph nodes found in a bovine carcase. **(5 marks)**

f) Compare the carcase of a cat to that of a rabbit. **(5 marks)**

SECTION B (Answer any TWO questions)
QUESTION 2

a) List the **FIVE** regions that are found in the vertebral column of food animals. **(5 marks)**

b) Briefly explain **FIVE** factor to be considered when siting a slaughter house. **(10 marks)**

QUESTION 3

a) Differentiate the tongue of an ox to that of a horse. **(5 marks)**

b) You have been called in a court of law in Kenya to give an expert opinion over a case where a butcher is accused of slaughtering a stolen bull, the butcher is wishing that he slaughter a cow sold to him by a person he knows you as an expert in meat inspection (comparative anatomy of food animals). What do you have to say to this honourable court. **(10 marks)**

QUESTION 4

Briefly explain the various methods on how a meat inspector can estimate the age of a food animal.
(15 marks)

QUESTION 5

a) Compare the weight of an ox to that of a pig.   **(5 marks)**

b) Compare the livers of the following food animals:
    i) Ox liver   **(2 marks)**
    ii) Pig liver   **(2 marks)**
    iii) Horse liver   **(2 marks)**

c) Compare the lungs of the following food animals:

    i) Ox lung.   **(3 marks)**

    ii) Pig lung   **(3 marks)**