



(Knowledge for Development)

KIBABII UNIVERSITY
UNIVERSITY EXAMINATIONS
2022/2023 ACADEMIC YEAR
FOURTH YEAR FIRST SEMESTER
SUPPLEMENTARY EXAMINATIONS

**FOR THE DEGREE OF BACHELOR OF SCIENCE IN BIOLOGY AND
EDUCATION SCIENCE**

COURSE CODE: SZL 413

COURSE TITLE: PARASITOLOGY AND IMMUNOLOGY

DATE: 18TH NOVEMBER 2022

TIME: 2.00 PM

INSTRUCTIONS TO CANDIDATES

Answer Question one (1) and any other two (2) Questions. Question one is compulsory and carries 30 marks, the other Questions carry 20 marks each.

TIME: 2 Hours

This paper consists of 3 printed pages. Please Turn Over



KIBU observes ZERO tolerance to examination cheating

Question One

- i. What are the MAIN classes of parasites? (3 marks)
- ii. List the phases in a parasites' life cycle. (3 marks)
- iii. Into which categories can the life cycles of parasites be divided? (2 marks)
- iv. Can a Mosquito transmit HIV/AIDS? Explain. (5 marks)
- v. Differentiate between mutualistic and antagonistic relationships as used in parasitology. (5 marks).
- vi. What is the difference between horizontal and vertical transmission? (4 marks)
- vii. Why are parasites much more dependent on their host than the other way around? (4 marks)
- viii. What is the meaning of the term "extended phenotype" in the context of a parasite infection? (2 marks)
- ix. Define the term Parasite. (2 marks)

Question Two

Using any parasite of choice, discuss the following:

- i. Modes of transmission (10 marks)
- ii. Modes of disease prevention (10 marks)

Question Three

With a relevant example(s) discuss the concept of host-parasite co-evolution. (20 marks)

Question Four

How are various parasites adapted to their respective modes of survival? (20 marks)

Question Five

Using parasite physiology, explain how various targets can be exploited to control infections. (20 marks).