KISII UNIVERSITY

UNIVERSITY EXAMINATIONS

SECOND YEAR EXAMINATION FOR THE AWARD OF THE DEGREE OF BACHELOR OF MEDICINE AND BACHELOR OF SURGERY [MBChB] AND END YEAR 2022/2023
[MAY-AUGUST, 2023]

MEDS 222: MEDICAL MICROBIOLOGY I
PAPER II

STREAM: Y2S3 **TIME: 3 HOURS**

DAY: MONDAY, 2:00 – 5:00 PM **DATE: 21/08/2023**

INSTRUCTIONS

1. Do not write anything on this question paper.

SECTION A: ATTEMPT ALL QUESTIONS (60mks)

1. Distinguish between tertian and quartan fever? (4marks)
2. List the classes of the medically important protozoa (4marks)
3. Outline the general characteristics of nematodes (4marks)
4. Describe the effects of parasites on the host (4marks)
5. Contrast the medically important Schistosoma species (4marks)
6. Describe the pathogenesis of *Entamoeba histolytica* (4marks)
7. Describe the life cycle of *Leishmania* species and their clinical conditions (4marks)
8. Explain the importance of fungal spores (4marks)
9. With a sketch diagram illustrate the reproduction cycle in fungi (4marks)
10. Distinguish with examples dematiaceous and hyaline fungi (4marks)

11. Explain briefly the aetiological agents and pathogenesis of chromoblastomycosis (4marks)

12. Outline clinical manifestations of fungal mycetoma caused by *Madurella species* (4marks)

13. A patient is diagnosed with disseminated blastomycosis. Outline the clinical signs manifested by the patient. (4marks)

14. Explain clinical syndromes associated with Paraccoccidioides infections (4marks)

15. Enumerate predisposing factors to opportunistic mycoses (4marks)

SECTION B: ATTEMPT <u>ANY THREE</u> QUESTIONS (60mks)

1. Discuss the following features of *Strongyloides stercoralis*:
   a) Morphology (3marks)
   b) Lifecycle (6marks)
   c) Pathogenicity and clinical features (7marks)
   d) Diagnosis (2marks)
   e) Treatment (2marks)

2. Describe African sleeping sickness in relation to:
   a) Pathogenesis (7 marks)
   b) Symptoms (10 marks)
   c) Diagnosis (3 marks)

3. Discuss the diagnosis, prevention, control, and treatment of superficial mycoses (20marks)

3. Explain the aetiological agents, pathogenesis and management of the following opportunistic infections: (20marks)

   a) Candidiasis
   b) Cryptococcosis