



JARAMOGI OGINGA ODINGA UNIVERSITY OF SCIENCE AND TECHNOLOGY
SCHOOL OF HEALTH SCIENCES
UNIVERSITY EXAMINATION FOR CERTIFICATE IN COMMUNITY HEALTH AND
DEVELOPMENT
1ST YEAR 2ND SEMESTER 2023/2024 ACADEMIC YEAR
MAIN

COURSE CODE: HCD 1121

COURSE TITLE: BASIC MICROBIOLOGY

EXAM VENUE: **STREAM: (Cert. Comm Hlth & Dev)**

DATE: **EXAM SESSION:**

TIME: 1.30 HOURS

Instructions:

- 1. Answer all the questions in Section A and ANY other 2 questions in Section B.**
- 2. Candidates are advised not to write on the question paper.**
- 3. Candidates must hand in their answer booklets to the invigilator while in the examination room.**

SECTION A: ANSWER ALL QUESTIONS (30 MARKS)

1. State THREE characteristics of exponential phase (3mks)
2. State THREE properties of Fungi (3mks)
3. Distinguish between anabolism and catabolism (3mks)
4. Define the following terms (3mks)
 - a) Virus
 - b) Staining
 - c) Disinfection
5. State THREE characteristics of viruses (3mks)
6. State any organelles found in a plant cell but not in an animal cell (3mks)
7. Explain ecological relationships that exist in micro organisms (3mks)
8. Distinguish between prokaryotic and eukaryotic cells. Give examples (3mks)
9. State any THREE symptoms of campylobacteriosis (3mks)
10. Name THREE examples of fungal infections (3mk)

SECTION C: 30Marks

1. Describe TWO agents used in the control of bacteria (15 marks)
2. Explain the benefits of microorganisms to humans (15 marks)
3. Using diagrams and examples, describe morphological classification of bacteria (15 marks)
4. Define sterilization. Classify various methods of sterilization with suitable examples (15 marks)