



MACHAKOS UNIVERSITY

University Examinations for 2023/2024 Academic Year

SCHOOL OF AGRICULTURE, ENVIRONMENT AND HEALTH SCIENCES

DEPARTMENT OF ENVIRONMENTAL SCIENCES

THIRD YEAR FIRST SEMESTER EXAMINATION FOR

BACHELOR OF ENVIRONMENTAL SCIENCE

ENS 343: ENVIRONMENTAL POLLUTION AND ECOTOXICOLOGY

DATE:

TIME:

INSTRUCTIONS: Answer Question **ONE** and any other **TWO** Questions

QUESTION ONE (30 Marks)

- a) Using examples, explain any three emerging pollutants in Kenya (6 marks)
- b) Explain the routes by which pesticides contaminate the environment (8 marks)
- c) Discuss the ecological and human health risks associated with environmental pollution (16 marks)

QUESTION TWO (20 MARKS)

Using examples, discuss the main sources of heavy metals and explain their cycling in the soil-water-air-organism ecosystem

QUESTION THREE (20 MARKS)

Discuss how you can conduct a water quality monitoring for a given aquatic resource in your county

QUESTION FOUR (20 MARKS)

Discuss any two (2) regulations that govern environmental pollution control in Kenya

QUESTION FIVE (20 MARKS)

Discuss the major causes of environmental degradation in your county