MACHAKOS UNIVERSITY

University Examinations 2018/2019

SCHOOL OF PURE AND APPLIED SCIENCES

DEPARTMENT OF BIOLOGICAL SCIENCES

FOURTH YEAR SPECIAL/SUPPLEMENTARY EXAMINATION FOR

BACHELOR OF SCIENCE IN BIOLOGY

SCB 407: BIODIVERSITY AND CONSERVATION BIOLOGY

DATE: 22/7/2019 **TIME: 2.00-4.00 PM**

INSTRUCTIONS

1. Anwer Question 1 (compulsory) and **any two** questions in Section B.
2. Use clean well labelled diagrams wherever appropriate.

SECTION A

QUESTION ONE

a) Briefly explain the history of conservation biology. (3 marks)

b) List atleast Three principles of conservation Biology (3 marks)

c) Outline how umbrella species can be used as a tool for restoring biodivestity (3 marks)

d) As conservationist would you advocate fpr economic incentives to benefit both biodivesity and the human life? (3 marks)

e) Give atleast THREE factors that make populations vulnerable to extinction (3 marks)

f) Describe how how loss of genetic diversity species causes biodivesity loss (3 marks)

g) Explain the mechanisms for implementation, monitoring and revision of biodiversity legislation (3 marks)

h) Demostrate how climate change affects coastal habits (3 marks)

i) Outline the social-economic benefits of a health ecosystem (3 marks)

j) Human population is considered to be one of the major contributors to ;oss of biodiversity. Hower in the recent past there is optism that the scenario might change. Expain (3 marks)

SECTION B

QUESTION TWO

Describe the major threats to biodivesity (20 marks)

QUESTION THREE

Demostrate how the Response Strategy principles are applied to mitigate biodiversity loss

(20 marks)

QUESTION FOUR

Giving examples, describe invassive species and how they impact biodiversity (20 marks)

QUESTION FIVE

As a legal representative of biodiversity conservation in your county, Describe the principles applicable to biodiversity law and National Biodiversity Strategies and Action Plans (NBSAP).

(20 marks)