

"Investing in Africa's future"

COLLEGE OF HEALTH, AGRICULTURE AND NATURAL SCIENCES

NACP 216: ECOLOGY

END OF FIRST SEMESTER FINAL EXAMINATIONS

NOVEMBER/ DECEMBER 2020

LECTURER: MR. MTAITA T. A.

DURATION: 24 HRS

INSTRUCTIONS

- 1. Download the examination paper from MOODLE and work offline
 - 2. Choose and answer one question
 - 3. Upload your response on Moodle in PDF format

NACP 216: ECOLOGY

Question One

a) Discuss how to manage the causes and effects of population fluctuations. [20] b) Discuss the causes, effects and practical solutions to the problem of veld fires. [20] c) Advise on different ways to present energy flow in an ecosystem. [20] d) Analyse the different types of interactions in ecosystems. [20] e) Examine the characteristics of savannas and discuss the factors that cause or determine the occurrence of savannas. [20] **Question Two** a) Discuss different ways of determining population density. [20] b) Analyse the different ways in which humans abuse nature and suggest some practical solutions. [20]

c) From an ecological perspective, explicitly show why developing countries are still

d) Review different causes of wildlife mortality and suggest how to alleviate such

[20]

[20]

[20]

facing food challenges and suggest some practical solutions.

e) Analyse the concept of conservation of natural resources.

Question Three

challenges.

a) Discuss the causes, effects and solutions to the problem of deforestation. [20]

- b) Analyse how different causes of diversity in forages interact with rangeland management to further affect forage quality and quantity. [20]
 c) Discuss five habitat types that are common in ecosystems. [20]
 d) As an ecologist, convince community leaders on the value of wetlands that necessitates their preservation. [20]
- e) Analyse the characteristics and determinants of savannas. [20]

END OF EXAMINATION PAPER