



TECHNICAL UNIVERSITY OF MOMBASA

FACULTY OF APPLIED AND HEALTH SCIENCES

DEPARTMENT OF ENVIRONMENT & HEALTH SCIENCES

UNIVERSITY EXAMINATION FOR:

DEGREE IN MARINE RESOURCE

BSMR 15S/YEAR2/SEMESTER 1

AES 4203: MARINE BIOLOGICAL DIVERSITY

END OF SEMESTER EXAMINATION

SERIES: DECEMBER 2016

TIME: 2 HOURS

DATE: Pick Date Select Month Pick Year

Instructions to Candidates

You should have the following for this examination

-Answer Booklet, examination pass and student ID

This paper consists of **TWO** Section(s). Attempt question ONE (Compulsory) and any other TWO questions.

Circle the correct answer in section A.

QUESTION ONE (30 MARKS)

- a). Define the term biodiversity? (2 marks)

- b). What are the key challenges facing the Marine Environment? (2 marks)

- c). List the factors affecting the ocean's health? (1 marks)

- d). List five coral reef invertebrate animals found in along the Kenyan coast? (2 marks)

- e). What is ocean acidification? (2 marks)

- f). How does climate change alters ocean chemistry? (2 marks)
- g). Explain how threat of marine habitat damage can be controlled in Kenya waters?
Give three examples? (3 marks)
- h). What are the problems associated with the loss of species to extinctions? (2 marks)
- i). Why do we need knowledge of marine biodiversity? (4 marks)
- j). What are the gaps in our knowledge of marine biodiversity? (4 marks)
- k). Why are species endangered? (3 marks)
- l). State three resources that the coral reefs of East African coast provide to the adjacent coastal communities and to society as a whole? (3 marks)

QUESTION TWO (20 MARKS)

- a). Threats to marine biodiversity have widespread social, economic, and biological consequences, the combination of which could threaten our own existence. Discuss?

(10 MARKS)

- b). State the challenges of marine living resources management? (10 MARKS)

QUESTION THREE (20 MARKS)

- a). Why is marine biodiversity important? (10 marks)

- b). How do we know that biodiversity is being lost, given the great uncertainty about species numbers? (10 MARKS)

QUESTION FOUR (20 MARKS)

- a). State four main components of biodiversity? (10 MARKS)

b). The main impediment to the sustainable management of marine resources in West Africa, and a major threat to conservation of marine biodiversity is weak governance capability. Discuss? (10 MARKS)

QUESTION FIVE (20 MARKS)

The main impediment to the sustainable management of marine resources in West Africa, and a major threat to conservation of marine biodiversity is weak governance capability. Discuss? (20 MARKS)