

TECHNICAL UNIVERSITY OF MOMBASA

FACULTY OF APPLIED AND HEALTH SCIENCES

DEPARTMENT OF ENVIRONMENT & HEALTH SCIENCES

UNIVERSITY EXAMINATION FOR:

BACHELOR OF SCIENCE IN MARINE RESOURCE MANAGEMENT

BSMR 14S/YEAR 4/ SEMESTER 1

BDS 4431: DISASTER RISK AND RISK MANAGEMENT SPECIAL/ SUPPLIMENTARY EXAMINATIONS SERIES: SEPTEMBER 2018 TIME: 2 HOURS

Instructions to Candidates

This paper consists of FIVE questions

Answer question ONE (COMPULSORY) and any other TWO questions.

This paper consists of two printed pages.

Mobile phones are NOT allowed in the examination room

QUESTION ONE. (30 MARKS)

a) Define the following terms [5Mks] i) Mitigation ii) Preparedness iii) Risk Reduction iv) Tsunami v) Flood b) i) Outline two ways that buildings can be designed to cope with earthquakes. [2Mks] ii) Briefly explain three components of disaster management [3Mks] c) i) Distinguish between natural hazards and disasters [2Mks] ii) List any three natural hazards [3Mks] d) Define the following basic flood preparedness measures [5Mks] **Planning** i. ii. Warning Medical iii. iv. Communication Essential services V.

e) For each case highlight: i) Three post disaster activities in case of a volcanic eruption event by foreign authorities [3Mks] ii) Two post disaster activities in case of a flood event by local authorities [2Mks] f) i) What is "Emergency first aid" [2Mks] ii) Outline three indicators of early warning and contingency planning for disasters [3Mks] **QUESTION TWO (20 MARKS)** Discuss the impacts of climate change on natural disasters [20Mks] **QUESTION THREE (20 MARKS)** Describe how a country experiencing a prolonged drought will cope with the situation [20Mks] **QUESTION FOUR (20 MARKS)** Explain in detail the causes and effects of natural and technological hazards [20Mks] **QUESTION FIVE (20 MARKS)**

Discuss the effects of tropical cyclones on coastal communities

[20Mks]