# JOMO KENYATTA UNIVERSITY OF AGRICULTURE AND TECHNOLOGY

## UNIVERSITY EXAMINATIONS 2018/2019

### THIRD YEAR SECOND SEMESTER EXAMINATION FOR THE DEGREE OF BACHELOR OF SCIENCE IN LAND RESOURCE PLANNING AND MANAGEMENT

### ALP 2410: LAND USE MODELLING II

**DATE: APRIL 2019**                                                            **TIME: 2 HOURS**

## INSTRUCTIONS:

Illustrate your answers using suitable examples and diagrams

## SECTION A: Answer ALL Questions (30 Marks)

1. Write short notes on the following

    a) Common features of land use systems                     **(10 marks)**

    b) Uses and objectives of land use models                   **(10 marks)**

    c) Common limitations in land use modeling                  **(10 marks)**

## SECTION B: Answer ANY TWO Questions (40 Marks)

2. Land use systems vary in terms of key processes, characteristic scales and other important system features. Citing examples discuss the major types of land use systems **(20 marks)**

3. Citing examples discuss ten (10) problems related to land use systems **(20 marks)**

4. Different land use systems are modeled with different model types. Discuss the three basic model types and their application in modeling land use systems **(20 marks)**