

## **NATIONAL OPEN UNIVERSITY OF NIGERIA**

KM 4 Kaduna – Zaria Expressway, Rigachikun, Kaduna Department of crop and soil science FACULTY OF AGRICULTURAL SCIENCES

## 2020\_1 EXAMINATION

COURSE CODE: SLM 504

**COURSE TITLE:** Anthropogenic Impact of Land

UNIT: 2

TIME: 2 HOURS

## **INSTRUCTION:**

Answer questions one (1) and any other three (3) questions.

Q. 1 a. Define Soil from the concepts of three (3) different land users: Agronomists, Soil Scientist and Geologist (15 Marks)

**b.** List any four (4) benefits of soil organic matter as a component of soil. (10 Marks)

- Q. 2. Discuss any five (5) factors contributing to land use and land cover changes. (15 Marks)
- Q. 3 a. Briefly explain Soil nutrient as essential elements for crop growth (5 Marks)
  - **b.** Differentiate between the effects of Soil Flora and Soil Fauna (10 Marks)
- Q. 4. Discuss any four (5) factors contributing to land use and land cover changes. (15 Marks)
- Q. 5. What are the important functions of soil micro-organisms? (5 Marks)
  - **b.** Explain the process used in correcting Salt-affected Soils (10 Marks)
- Q. 6 a. Describe the methods of studying microbial communities' groups, based on their ability to identify microbial biomass, diversity or activity? (11 Marks)
  - **b.** What are the four (4) factors that influence the quantity and quality of root substance secretion called exudates? (4 Marks)