NATIONAL OPEN UNIVESITY OF NIGERIA
Faculty of Agricultural Sciences
Department of Animal Science and Fisheries
2025_2 EXAMINATIONS

Course: ANP512: Pasture and Range Management
Credit Unit: 2
Time Allowed: 2 hours.

INSTRUCTIONS: Answer question One (Compulsory: 30 Marks) and any other TWO (20 marks each)

QUESTION 1 (30 Marks)
1a. Discuss the impact of overgrazing on pasture quality. (10 marks)
1b. Explain the methods used to prevent overgrazing. (10 marks)
1c. Provide examples of overgrazing effects observed in Nigerian rangelands. (10 marks)

QUESTION 2 (20 Marks)
2a. Discuss why forage yield is essential for planning and sustaining grazing, as well as its role in reducing costs and maintaining animal health. (8 marks)
2b. Discuss the methods used to determine forage yield.(8 marks)
2c. Provide an example of how forage yield data is used to improve pasture management. (4 marks)

QUESTION 3 (20 Marks)
3a. Describe the role of legumes in soil fertility management. (8 marks)
3b. Discuss the symbiotic relationship between legumes and Rhizobium bacteria, detailing how atmospheric nitrogen is converted into usable forms for plant growth. (8 marks)
3c. Provide examples of legume species used for nitrogen fixation in Nigerian pastures. (4 marks)

QUESTION 4 (20 Marks)
4a. Discuss the importance of soil testing before pasture establishment. (8 marks)
4b Explain how soil testing informs decisions about soil amendments, seed germination, and nutrient management for pasture establishment.(8 marks)
4c. Provide an example of how soil test results influence pasture management decisions. (4 marks)