MACHAKOS UNIVERSITY

University Examinations for 2020/2021 Academic Year

SCHOOL OF AGRICULTURAL SCIENCES

DEPARTMENT OF AGRIBUSINESS MANAGEMENT AND TRADE

FOURTH YEAR SPECIAL/ SUPPLEMENTARY EXAMINATION FOR

BACHELOR OF SCIENCE AGRIBUSINESS MANAGEMENT AND TRADE

AGB 403: AGRICULTURE PROJECT MANAGEMENT

DATE: 26/03/2021 **TIME: 2.00-4.00 PM**

INSTRUCTIONS;

Answer **Question one** and **ANY TWO** other questions.

QUESTION ONE (30 MARKS)

a) You are assigned to an irrigation project in Mombasa County as a project officer. Explain how you would distinguish between economic and financial analysis in the project. (4 marks)

b) A maize project has been introduced in Nyeri County. You are required to advise on how to value land on which the project will be conducted. Explain four methods that how you would use to conduct this task. (8 marks)

c) You are assigned as a project management officer within a seed distribution project in Nakuru. Explain to stakeholders the stages that you will follow in the life of the project (10 marks)

d) A Seedling distribution project is set up in Nyeri County to assist smallholder farmers in the localities. However, several conflicts have been reported to you as the project officer.

i. What two things would cause conflicts in the fertilizer distribution project (5 marks)

ii. What three ways would be used in resolving conflicts in (i) (3 marks)

QUESTION TWO (20 MARKS)

a) A community has been running an agriculture project. However, they have no experience with agriculture projects. You are consulted as a project officer in Nakuru County five years into the project. What kind of evaluation would be suitable for this project? (10 marks)

b) (i) You are consulted by a cotton farm to assist in sensitivity analysis. Explain three advantages and three disadvantages of this practice to the farm managers. (6 marks)

(ii) Gulu Ltd is considering buying a machine costing sh,400,000. there are two options machine A and B. Machine A will generate revenue of 200,000, sh 200,000 and 80,000 sh in year 1, year 2 and year 3 respectively. Machine B will generate revenue of sh, 120,000, sh 120,000 and sh,240,000 in year 1, year 2 and year 3 respectively. Evaluate based on payback period and make a decision on which machine to purchase (4 marks)

QUESTION THREE (20 MARKS)

a) You are recently assigned to establish a project in Meru County, where there is great potential for food production. However, the area experiences erratic rainfall and draught.

i. Which are three methods will you apply in monitoring project in (a)? (3 marks)

ii. Explain three potential costs to implementing project in (a) (6 marks)

b) Describe how you would perform negotiations in the project in (a) (11 marks)

QUESTION FOUR (20 MARKS)

a) Describe who a planning matrix is used in project management (6 marks)

b) An agricultural project has a list of tasks to be performed and you are assigned as a project manager

i. Describe how you would draw project network (5 marks)

ii. Find the critical path within a project network (3 marks)

iii. Find the probability that the project is completed in 20 days. If the probability is less than 30% find the probability of completing in 24 days (6 marks)

QUESTION FIVE (20 MARKS)

a) (i) Average price of milk is sh.20 per liter and during the previous season Tole Farm sold 5000 liters of milk. Based on financial sensitivity analysis if customer traffic increases by 20% then sales increases by 8%. Determine the sales made by an adjustment in sales traffic by 100% through sensitivity analysis (5 marks)

(ii) Elgon ltd is starting the project at a cost of sh,400,000. The project will generate cash flow of sh,80,000, sh,100,000 in year 1 and year 2 respectively. A discounted rate of 10% is applicable. Find out Net Present Value (5 marks)

b) A water project is set up in a community in Rongai in Kajiado County. You are required to use a Gantt chart to show the brake down of the project activities over a period of five years (10 marks)