



KENYATTA UNIVERSITY

UNIVERSITY EXAMINATIONS 2010/2011

FIRST SEMESTER EXAMINATION FOR THE DEGREE OF BACHELOR OF
SCIENCE (AGRIBUSINESS MANAGEMENT AND TRADE)

KBT 100: PRINCIPLES OF AGRIBUSINESS ECONOMICS

DATE: MONDAY, 22ND NOVEMBER 2010

TIME: 8.00 A.M. 10.00 A.M.

INSTRUCTIONS: Answer Question 1 and any other 2 questions.

1.
 - (a) What are the conditions necessary for a monopolist to practice price discrimination? (4 marks)
 - (b) Under what conditions would a monopolistic market be considered desirable? (3 marks)
 - (c) How do expected future prices affect the supply of food commodities in a country? (4 marks)
 - (d) Define the following economic terms, giving suitable examples from agribusiness economics.
 - (i) Monopsony (2 marks)
 - (ii) Management (2 marks)
 - (iii) Economies of scope (2 marks)
 - (e) State whether true or false and explain briefly
 - (i) A rural access road is **NOT** an example of capital as a factor of production.
 - (ii) If the prices of apples increased, there will be excess supply of apples.
 - (iii) One of the likely features of monopoly is that high profits enable competing suppliers to enter the market.
 - (iv) If increased economies of scale are experienced by agribusiness firms, this is likely to result in rising unit costs of production.(8 marks)

- (f) The demand function of cheese in Nairobi is given by $Q = 100 - 4P^2$ where P is the price per kg of cheese and Q is the quantity demanded per week. Calculate the price elasticity of demand for cheese at a price of Kshs.4 and interpret the results. (5 marks)
- (g) “Economic resources are considered to be scarce”. Explain and relate to the question of how an agro pastoralist in Garissa should allocate a loan received from AFC. (5 marks)
- (h) A farmer wants to produce cotton using capital and labour. With the aid of a well labeled diagram, explain what will happen to his iso cost line if the wages increased. (5 marks)
2. (a) The broad definition of agriculture encompasses different groups of firms. What are these groups and what are their functions in the agricultural sector? (8 marks)
- (b) A Kenyatta University agriculture student carried out an experiment to find out the effects of using different *imazpyr* levels to control *Striga* in maize. She recorded her findings in the table below.

Amount of <i>imazapr</i> (g/ha)	Total production of maize (kg)	Marginal product	Average product
1	800		
3	2700		
5	4300		
7	5040		
9	4950		
11	4800		

- (i) Using your knowledge of agribusiness economics, calculate the marginal product and average product at each *imazapyr* level.

- (ii) What additional information would you need in order to calculate the optimal level of *imazapyr* use for this student? (7 marks)
3. (a) “Price competition is not beneficial under monopolistic competition and so the firms have to go for non-price competition”. Why is it so? (3 marks)
- (b) The inverse market demand curve for a good is $P = 100 - 0.25Q$ and the inverse market demand curve for a good is $P = 20 + 0.55Q$. Calculate the equilibrium price and quantity. (4 marks)
- (c) A market with demand $Q = 2500 - 4p$ is supplied by a monopoly with costs $C = 350 + 2Q + Q^2$. Calculate the equilibrium price, output and monopoly profits. What would be the equilibrium if the market was supplied competitively by firms, and each individual firm had the same costs? (8 marks)
4. (a) List the main types of agricultural cooperatives found in Kenya. (4 marks)
- (b) List the major problems that the agricultural cooperatives face today? (3 marks)
- (c) Discuss the main goals of a good market performance. (8 marks)
