



**JAAMOGI OGINGA ODINGA UNIVERSITY OF SCIENCE AND
TECHNOLOGY**

UNIVERSITY EXAMINATIONS APRIL 2017

**FIRST YEAR FIRST SEMESTER EXAMINATION FOR THE DEGREE
OF BACHELOR OF BUSINESS ADMINISTRATION WITH
INFORMATION TECHNOLOGY**

E-LEARNING

AEC 101: INTRODUCTION TO MICROECONOMICS

Date:

Time: 2HRS

INSTRUCTIONS

1. Answer Question **ONE** and any other **TWO** questions.
2. Question **ONE** carries **30** marks, the rest **20** marks each
3. Marks will be awarded for being neat, clear and use of relevant illustrations

QUESTION ONE

- (a) Explain the basic economic problems of any society and how they are solved in capitalists and socialists economies **(12marks)**
- (b) Differentiate between the following:
 - (i) Producer and consumer equilibrium **(4marks)**
 - (ii) Economic and accounting profits **(4marks)**
 - (iii) Explicit and implicit costs **(4marks)**
- (c) Explain the determinants of elasticity of supply of a good or service. **(6marks)**

QUESTION TWO

- (a) Distinguish between explicit and implicit costs of production and geometrically derive average and marginal products (10marks)
- (b) Explain the features of an oligopolistic market and the concept of kinked demand curve. (10marks)

QUESTION THREE

Suppose that you are given a firm's demand function as

$$Q=2000-20P$$

And firm's cost function is given as:

$$TC=0.05Q^2 +10,000$$

- (i) Find the firm's total revenue (TR) and her marginal revenue (MR) (4marks)
- (ii) Calculate the firm's marginal costs (MC) (2marks)
- (iii) Calculate the firm's average costs (2marks)
- (iv) From the information given above, calculate the firm's profit maximizing output and price levels (Q^* and P^*) (8marks)
- (v) Calculate the firm's maximum profit (Π) (2marks)
- (vi) Show that this is the true maximum profit by using the second order conditions as a test (2marks)

QUESTION FOUR

(a) Using diagrams differentiate between the following:

- (i) Producer surplus and consumer surplus (5marks)
- (ii) Budget and Isocost lines (5marks)
- (iii) Price and income consumption curve (5marks)

(b) Using classical production function, explain the stages of production of a firm and advise on the best optimal stage of operation

(5marks)

QUESTION FIVE

(a) Given a demand function of the form:

$$Q=1000-20P$$

Calculate the point elasticity of demand when

$$p=100 \text{ and } q=80$$

(6marks)

(b) Explain the features of an oligopoly market

(8marks)

(c) Explain the importance of price and income elasticity to a producer and government

(6marks)