## The Institute of Chartered Accountants [Ghana]



MAY 2005 EXAMINATIONS

Part 1

ECONOMICS (Paper 1.3)

Attempt 5 questions in all

Time Allowed: 3 Hrs.

#### **RUBRIC INSTRUCTIONS**

Read the following instructions carefully before attempting the questions.

This paper is in two(2) Parts namely:

#### 1] SECTION A

This section has four(4) questions out of which candidates are required to attempt **only three(3)**.

#### 2] SECTION B

This section has three(3) questions out of which candidates are required to attempt only two(2).

# SECTION A NB: Answer only 3 questions in this Section.

#### **QUESTION 1**

A survey conducted by the producers of imeal milk which operates in a competitive market showed the demand and supply schedules for the milk in Ghana us:

Price (¢)	Quantity demanded (million tins)	Quantity supplied (million tins)
6,000	5	8
5,000	6	7
4,000	7	6
3,000	8	5
2,000	9	4
1,000	10	3

#### Required:

i.	Plot the demand and supply curves and find the equilibrium	n price
	and quantity. (Use graph sheet).	

(5 marks)

- ii. Calculate the excess supply or demand when the price of imeal milk is:
  - (a) ¢6,000
- (b) ¢2,000

(4 marks)

- iii. Explain how the price of imeal milk will change in situations (a) and (b) in (ii) above. (4 marks)
- iv. Suppose the quantity supplied at each price of imeal milk rises by one million tins:
  - a. What will be the new supply schedule?

(2 marks)

b. By plotting the new supply schedule in the graph drawn to answer (i) above, determine the new equilibrium price and quantity.

(3 marks)

v. What will happen instead, if the price of bread rises?

(2 marks)

#### **QUESTION 2**

a. Define price elasticity of demand.

(2 marks)

b. Suppose you were the senior economist of the Mass Metro Transport Company of Ghana and you have estimated the demand function for bus riders in Accra to be:

R = 500,000 - 50P (all other things being equal)

Where R is the number of riders per working day, and P is the bus fare.

#### Required:

i. Calculate the number of riders per working day if the current bus fare is eq 1,500.

(4 marks)

- ii. Determine the total revenue if the bus fare is &epsilon1,500 (2 marks)
- iii. Suppose price is increased form \$\psi 1,500\$ to \$\psi 2,000\$. Calculate the price elasticity of demand for bus riders in Accra.

(6 marks)

iv. Calculate the change in total revenue for this price increase.

(3 marks)

v. Account for the change in total revenue in (iv) above. (3 marks)

#### **QUESTION 3**

- a. Distinguish between fixed costs and variable costs. (4 marks)
- b. Opanyin Yaw Opoku, who owns a one hectare maize farm at Ejura has observed that as he varies the number of farm hands, his maize output varies per farming season.

His fixed costs – land, rent, capital charges, etc. – amount to  $\phi 2$  million per farming season and for every one person he hires for a farming season he pays wages of  $\phi 500,000$ .

He has the following production and cost schedule:

Labour (No. of People)	Output (Bags of maize per farming season)	TFC (¢)	TVC (¢)	TC (¢)	ATC (¢)	MC (¢)
1	3					
2	8					
3	14					
4	20					
5	25	2.				
6	28					
7	30			a		

Where

TFC = Total Fixed Cost

TVC = Total Variable Cost

TC = Total Cost

ATC = Average Total Cost

MC = Marginal Cost.

#### Required:

Complete the Production/Costs schedule.

(10 marks)

c. Explain the economic principle underlying the behaviour of the marginal cost values you have calculated.

(6 marks)

#### **QUESTION 4**

a. Briefly explain with a diagram, minimum price control.

(8 marks)

b. Explain two(2) reasons why governments set the minimum price.

(4 marks)

c. Outline any two(2) problems that may result from the setting of a minimum price.

(4 marks)

d. Suggest two(2) remedies to the problems that may result from the setting of a minimum price.

(4 marks)

#### **SECTION B**

### NB: Answer only 2 questions from this Section

#### **QUESTION 5**

- a. Distinguish between budget surplus, budget deficit.
- (4 marks)
- b. Explain four(4) sources of financing government budget deficit.

(16 marks)

#### **QUESTION 6**

Suppose an open economy is represented by the following equations:

C	===	$200 + 0.7 Y^{d}$	[Consumption function]
T	-	40 + 0.2  Y	[Tax function]
I	=	800	[Investment expenditure]
G	=	500	[Government expenditure]
X	named to a	200	[Export value]
M	===	150 + 0.3 Y	[Import function]

#### Required:

- i. What does the coefficient, 0.3 in the import function mean? (2 marks)
- ii. Derive the aggregate demand/expenditure function. (6 marks)
- iii. Compute the equilibrium income. (3 marks)
- iv. What is the equilibrium tax revenue? (3 marks)
- v. Determine the state of government budget and explain your answer.

(3 marks)

vi. Calculate the foreign trade balance. Explain your answer. (3 marks)

## **QUESTION 7**

a.	With	With the aid of diagrams, explain:			
	i.	Demand-pull inflation.	(6 marks)		
	ii.	Cost-push inflation	(6 marks)		
b. Sugges		gest two(2) measures each to cure:			
	i.	Demand-pull inflation.	(4 marks)		
	ii	Cost-push inflation.	(4 marks)		