

THE PUBLIC ACCOUNTANTS EXAMINATIONS BOARD

A Committee of the Council of ICPAU

CPA (U) EXAMINATIONS

LEVEL TWO

INTRODUCTION TO MANAGEMENT ACCOUNTING – PAPER 7

MONDAY, 10 DECEMBER 2007

INSTRUCTIONS TO CANDIDATES

1. Time allowed: **3 hours**
2. Attempt all questions in Section **A**, **one** question in Section **B** and any **three** questions in Section **C**.
3. Section **A** has **twenty** compulsory multiple-choice questions each carrying 1 mark.
4. Section **B** has **two** questions and only **one** is to be attempted. Each question carries 20 marks.
5. Section **C** has **four** questions and only **three** questions are to be attempted. Each question carries 20 marks.
6. Please read further instructions on the answer book.

SECTION A

Question 1

(i) A master budget consists of the following **EXCEPT**:

- (a) cash flow statement.
- (b) labour turn over.
- (c) budgeted profit and loss statement.
- (d) balance sheet.

Use the information provided below to answer questions (ii) and (iii):

2000 kg of material are issued to production process. Normal loss is expected to be 5%. Actual production was 1,500 kg in period 1 and 1,950 kg in period 2.

(ii) For period 1, there was

- (a) abnormal gain of 400 kg.
- (b) abnormal loss of 400 kg.
- (c) abnormal gain of 50 kg.
- (d) abnormal loss of 50 kg.

(iii) For period 2, there was

- (a) abnormal gain of 50 kg.
- (b) abnormal loss of 50 kg.
- (c) abnormal gain of 400 kg.
- (d) abnormal loss of 400 kg.

(iv) When ordering for large quantities where a discount is expected the following costs are minimized **EXCEPT**:

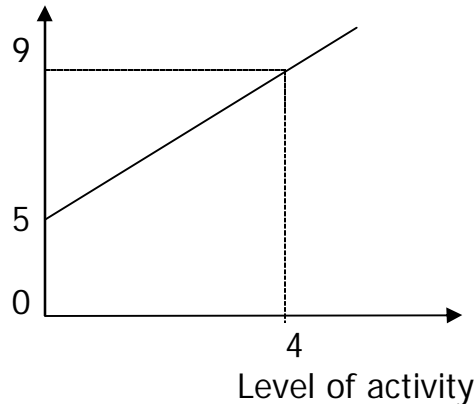
- (a) total material costs.
- (b) operational costs.
- (c) ordering costs.
- (d) inventory holding costs.

(v) Period costs are those that are:

- (a) for purchases during the period.
- (b) deducted as expenses.
- (c) identified with goods produced.
- (d) identified with sales of the product.

- (vi) An investment has a net present value of Shs 2 million at a discount rate of 20% and a net present value of – Shs 0.8 million at a discount rate of 30%. The internal rate of return is:
- (a) 12.86%.
 - (b) 27.14%.
 - (c) 50%.
 - (d) 28%.
- (vii) The first stage in the decision making process should be to:
- (a) compare actual and planned outcomes.
 - (b) gather data about alternative course of action.
 - (c) specify the objectives of an organisation.
 - (d) implement decisions.
- (viii) The graph below shows total costs (million shillings) versus level of activity (units, in thousands).

Total cost



The variable cost per unit is:

- (a) Shs 1,250.
 - (b) Shs 2,250.
 - (c) Shs 4,000.
 - (d) Shs 1,000.
- (ix) The total cost that should be expected if the output is 6,000 units is:
- (a) Shs 65 million.
 - (b) Shs 11 million.
 - (c) Shs 6 million.
 - (d) Shs 10 million.

(x) The following are features of process costing that distinguish it from job costing **EXCEPT**:

- (a) repetition.
- (b) presence of losses.
- (c) joint products.
- (d) progressive payments.

(xi) Contract No KI, which is nearing completion had the following information:

- Cost of sales Shs 12 million.
- Work done but not yet certified Shs 0.8 million.
- Total contract cost Shs 50 million.
- Estimated total profit on contract Shs 20 million.

Using the data above, calculate the profit on the contract.

- (a) Shs 11.2 million.
- (b) Shs 2.51 million
- (c) Shs 5.12m
- (d) Shs 8.8m

(xii) Which of the following is correct about inventory control levels?

- (a) Maximum level = reorder level – reorder quantity – (minimum usage x minimum lead time).
- (b) Maximum level + reorder level – reorder quantity = minimum usage x minimum lead time.
- (c) Maximum level = reorder level + (average usage x average lead time).
- (d) Reorder level = maximum level – reorder quantity + (minimum usage x minimum level time).

Use the data provided below to answer questions (xiii) to (xv):

MUTI Ltd extracted the following data from their management accounts:

Budgeted labour hours	3,000
Actual labour hours worked	2,400
Standard hours actually produced	3,200

(xiii) The activity ratio is:

- (a) 106.7
- (b) 75.0
- (c) 133.3
- (d) 80.0

(xiv) The capacity ratio is:

- (a) 12.5
- (b) 75.0
- (c) 80.0
- (d) 125.0

(xv) The efficiency ratio is:

- (a) 12.5
- (b) 80.0
- (c) 75.0
- (d) 133.3

(xvi) DEGE Ltd sells chemical COTIN at Shs 6,000 per tin. The variable production cost per tin is Shs 1,200.

At the budgeted activity level of 6,000 tins, fixed production costs are Shs 4,000 per tin and fixed selling costs are Shs 3,500 per tin.

If the variable unit selling costs are Shs 800, calculate the break even point .

- (a) 90,000
- (b) 45,000
- (c) 40,000
- (d) 5,000

(xvii) An investment method that is used to measure the maximum cost of capital to finance a project is called:

- (a) payback period.
- (b) internal rate of return.
- (c) average return.
- (d) net present value.

(xviii) A system which enables managers concentrate on significant deviations from expected results is called:

- (a) management by objectives (MBO).
- (b) time management technique (TMT).
- (c) management by walking around (MBWA).
- (d) management by exception (MBE).

- (xix) In job costing, if rectification is regarded as normal part of the work carried out in the department, the correct way of treating rectification costs is to:
- (a) add them to material costs.
 - (b) charge them as a direct cost to the job.
 - (c) treat them as production overheads.
 - (d) deduct them from production costs.
- (xx) A principal budget factor is:
- (a) the biggest item of expenditure in a budget.
 - (b) anything that restricts the budgeted level of activity.
 - (c) management itself.
 - (d) the allowance for inflation while budgeting.

SECTION B

Question 2

- (a) State any **four** ways by which costs may be classified. **(4 marks)**
- (b) The cost accountant of NGONI Ltd, which manufactures a single product, supplied the following data:

Variable production costs	Shs 500 per unit
Selling price	Shs 1,200 per unit
Fixed selling and administration overhead	Shs 1.8 million per quarter
Fixed production overhead	Shs 3 million per quarter
Normal capacity	30,000 units per quarter
Production in quarter 1	28,000 units
Sales	25,000 units

There was no opening inventory.

Required:

Calculate:

- (i) Absorption costing profit for the quarter. **(7 marks)**
 - (ii) Marginal costing profit for the quarter **(6 marks)**
- (c) List **three** factors to be taken into account when selecting appropriate cost centres for an organisation.

(3 marks)
(Total 20 marks)

Question 3

- (a) New employees have been appointed in the costing department of Crane Manufacturers Limited.

Required:

As a senior cost accountant, explain to the newly appointed employees of the company the items of information the costing system produces.

(8 marks)

- (b) State **four** labour turnover costs that your company may face.

(4 marks)

- (c) Your company intends to start using JIT system of manufacturing.

Required:

Describe any **four** characteristics of JIT manufacturing.

(8 marks)

(Total 20 marks)

SECTION C

Question 4

- (a) Explain the basic principles that govern the weighted average cost as a method used in process costing.

(4 marks)

- (b) Pili Ltd produces an item which is processed in two consecutive processes. The data for process 2 during December 2006 was as follows:

Degree of completion as to		Shs (million)
Process 1 materials	100%	0.80
Added materials	50%	0.02
Conversion cost	40%	0.20

Opening inventory was 1,200 units.

During December 2006, 4,000 units were transferred from process 1 at a valuation of Shs 2.32 million, added materials cost Shs 1.36 million and conversion costs were Shs 1.7 million.

Closing inventory at 31 December was 2,000 units which were 100% complete with respect to process 1 materials, 70% complete with respect to added materials, and 30% complete with respect to conversion cost. PILI Ltd uses a weighted average cost system for the valuation of output and closing inventory.

Required:

- Prepare: (i) a statement of equivalent units. (4 marks)
 (ii) a statement of costs per equivalent unit. (5 marks)
 (iii) a statement of evaluation. (4 marks)
 (iv) process 2 account. (3 marks)

(Total 20 marks)

Question 5

- (a) Briefly explain **four** factors to be considered while budgeting for an organization. (4 marks)
 (b) State and briefly explain **four** uses of budgets to an organization. (4 marks)
 (c) VIK Ltd manufactures a product each unit of which requires 0.5 kg of raw material "JUMU". Production for the months of March to July 2007 was budgeted as follows:

Month	Number of units produced (million)
March	2
April	6
May	8
June	4
July	10

The stock of "JUMU" at 1 March was 0.5 million kgs. It was expected that this material would become difficult to obtain in 2008 as the price would increase. Management therefore decided to increase the stock by 2 million kgs each month. "JUMU" cost Shs 2,000 per kg in March but the price was expected to rise to Shs 3,000 in May and thereafter.

Required:

Prepare a raw materials purchases budget of "JUMU" for VIK Ltd for the months of March to July 2007.

(12 marks)

(Total 20marks)

Question 6

- (a) Mr. Absolom Kato is a newly appointed management accountant in a service industry, Agile Hotels Ltd. You happen to be the outgoing management accountant.

Required:

- (i) Give a brief report to Mr. Kato about his role as management accountant.
(4 marks)
- (ii) Give **two** managerial problems he is likely to face and how to overcome them.
(2 marks)
- (b) (i) Explain why the net present value (NPV) is considered superior to payback period and accounting rate of return (ARR) as an investment appraisal method.
(3 marks)
- (ii) Give **two** disadvantages of NPV.
(2 marks)
- (c) Titi Ltd has the following capital expenditure proposals:

	Proposal X	Proposal Y
	Shs million	Shs million
Initial investment	300	200
Profit for year 1	140	80
Profit for year 2	120	70
Profit for year 3	200	80
Profit for year 4	100	20

The total cost of capital is 10%

Required:

- (i) Calculate the pay back period for each investment.
(2 marks)
- (ii) State which investment should be chosen after calculating the Net Present Value of each investment.

(7 marks)
(Total 20 marks)

Question 7

- (a) (i) Define the term “variance analysis”. (2 marks)
- (ii) State any **two** uses of variance analysis. (2 marks)

- (b) The following data was provided by a cost accountant for the month of April 2007.

Standard cost per unit	Shs
Raw materials, 40 kg at Shs 500 per kg	20,000
Direct labour, 1½ hrs at Shs 200 per hr	300

Actual results of April were:

Production	2,000 units
Direct material purchases	50,000 kg at a cost of Shs 30 million
Opening inventory of direct materials	10,000 kg
Closing inventory of direct materials	8,000 kg
Wages paid (2,000 hours)	Shs 450,000

Required:

- Calculate:
- (i) Labour rate variance. (3 marks)
 - (ii) Labour efficiency variance. (3 marks)
 - (iii) Material price variance. (3 marks)
 - (iv) Material usage variance. (3 marks)
- (c) State **two** reasons for the labour efficiency variance. (2 marks)
- (d) State **two** reasons for the material price variance. (2 marks)
- (Total 20 marks)**