



Kasarani Campus
Off Thika Road
Tel. 2042692 / 3
P. O. Box 49274, 00100
NAIROBI
Westlands Campus
Pamstech House
Woodvale Grove
Tel. 4442212
Fax: 4444175

KIRIRI WOMENS' UNIVERSITY OF SCIENCE AND TECHNOLOGY
UNIVERSITY EXAMINATION, 2023/2024 ACADEMIC YEAR
SECOND YEAR, SECOND SEMESTER EXAMINATION
FOR THE DEGREE OF BACHELOR OF SCIENCE
(BUSINESS ADMINISTRATION)

Date: 8th December, 2023
Time: 11.30am –1.30pm

KAC 102 - INTRODUCTION TO MANAGEMENT ACCOUNTING

INSTRUCTIONS TO CANDIDATES

ANSWER QUESTION ONE (COMPULSORY) AND ANY OTHER TWO QUESTIONS

QUESTION ONE (30 MARKS)

- a) The management accountant ABC Ltd made the following analysis of cost incurred to produce 1000 units.

Cost element	Amount (shs)
Direct materials	400 000 (Variable)
Direct Labour	500 000 (Variable)
Depreciation	100 000 (Variable)
Rent	300 000 (Fixed)
Repairs and Sales promotion	600 000(1/3 is fixed)
Electricity and water	200 000 (50% variable)

Required

- i) Determine the variable cost per unit (4 Marks)
ii) Derive the total cost function (4 Marks)
iii) Estimate the total if 150,000 units are expected to be produced during next financial year. (4 Marks)
- b) Differentiate the following;
- i) Controllable and uncontrollable costs (2 Marks)
ii) Product costs and period costs (2 Marks)

- e) Nyota Ltd. Manufacturers liquid cleaning products from chemical raw materials. It uses the following standard costs for the production of a batch of its product Sparkleen.

Materials

Ammonia solution	200 litres at shs. 1.10 per litre
Colouring	1000 litres at shs. 0.10 per litre
Fragrance agent	10 Litres at shs. 14.20 per litre

Labour operations

Blending	8 hours at shs. 12.00 per hour
Mixing	12 hours at shs. 8.00 per hour

The actual costs

Material

Ammonia solution	240 litres costing shs. 216.00
Colouring	950 litres costing shs. 85.50 per litre
Fragrance agent	11 litres costing shs. 165

Labour operations

Blending	11 hours costing shs. 143
Mixing	10 hours costing shs. 90.00

Required

Calculate the following variances .

- | | |
|---|-----------|
| i) Material price variances | (3 Marks) |
| ii) Material usage variances | (3 Marks) |
| iii) Total direct material cost variances | (3 Marks) |
| iv) Labour rate variances | (3 Marks) |
| v) Labour efficiency variances | (2 Marks) |

QUESTION TWO (20 MARKS)

The following data relates to Mwiho Ltd which processes a single data type of chemical. Overhead costs for processing is as follows.

Period	Output Unit (000)	Overhead costs Shs (000)
1.	120	770
2.	150	820
3.	160	810
4.	170	830
5.	200	960
6.	170	900
7.	200	940
8.	200	950
9.	180	940
10.	160	870
11.	140	800
12.	150	820
13.	140	790

Required:

- | | |
|--|------------|
| a) Device a formula to assist in the preparation of overhead budget for the 13 accounting periods. | (10 Marks) |
| b) Calculate the coefficient of correlation. | (6 Marks) |
| c) Determine the coefficient of determination. | (4 Marks) |

QUESTION THREE (20 MARKS)

a) Discuss the assumptions of cost volume profit analysis. (6 Marks)

b) The cost incurred in two periods are as follows:

Period	Cost in Ksh	Units produced
1	25,000	2,000
2	30,000	2,500

Required:

Find the Fixed cost and Variable cost for these two periods (6 Marks)

c) “Budgeting control can be operated even without adoption of standard costing”

Required:

Explain both budgeting control and standard costing and show how the former is not dependent on the latter (8 Marks)

QUESTION FOUR (20 MARKS)

a) A company makes a single product with a sales price of sh 10 and a marginal cost of sh 6. Fixed costs are shs 60,000 per annum

Calculate;

i) Number of units to break even (2 Marks)

ii) Sales at break- even point (2 Marks)

iii) Number of units will need to be sold to achieve a profit of sh 20000 p.a (2 Marks)

iv) If the taxation rate is 40% how many units will need to be sold to make a profit after a tax of Sh 20,000 p.a (4 Marks)

b) Discuss the decision making model under conditions of uncertainty. (10 Marks)

QUESTION FIVE (20 MARKS)

a) Explain the term “decentralization” and explain why companies decentralize their operations. (10 Marks)

b) A company is considering whether to develop and market a new product. Development costs are estimated to be Shs 180,000 and there is a 0.75 probability that the development effort will be successful and a 0.25 probability that the development effort will be unsuccessful. If the development is successful the product will be marketed, and it is estimated that:-

i) If the product is very successful profits will be Shs 540000

ii) If the product is moderately successful profits will be Shs 100000

iii) If the product is a failure, there will be a loss of Shs 400000

Each of the above profit and loss calculations is after taking into account the development costs of sh 180,000. The estimated probabilities of each of the above events are as follows:

i) Very successful 0.4

ii) Moderately successful 0.3

iii) Failure 0.3

Required: Use a decision tree to compute the expected payoffs. (10 Marks)