

ASSOCIATION OF ACCOUNTING TECHNICIANS OF SRI LANKA AA3 EXAMINATION - AUGUST 2023 (AA32) MANAGEMENT ACCOUNTING AND FINANCE

Instructions to candidates (Please Read carefully):

- (1) Time Allowed: Reading: 15 minutes Writing: 03 hours
- (2) All questions should be answered.
- (3) Answers should be in one language, in the medium applied for, in the booklets provided.
- (4) Submit all workings and calculations. State clearly assumptions made by you, if any.
- (5) Use of Non-programmable calculators is only permitted.
- (6) Action Verb Check List with definitions is attached. Each question will begin with an action verb. Candidates should answer the questions based on the definition of the verb given in the Action Verb Check List.
 Kosala Madhusanka Jayaweera
- (7) Mathematical Tables will be provided.
- (8) 100 Marks.

[B.B.Mgt (Acct.), ACMA, CA (Finalists),

Subjects and 1st/2nd Merit Prize Winner

SECTION A (Total 20 marks)

Question 01

It is to ensure that the entity is able to continue its operations & that it has sufficient cash flow to satisfy both maturing short term debt & upcoming operational expenses. The following information relating to **ABC Ltd**. is provided for the last three financial years

Item	2022/23	2021/22	2020/21
Trade Re <mark>ceivables</mark> (Rs.)	2,918,000	3,795,000	4,907,200
Cost of Sales (Rs.)	19,000,000	21,600,000	23,000,000
Gross Profit Ratio	5%	10%	8%

- Assume 365 days a year and all sales are on credit basis.

You are required to:

a) Calculate the trade receivables collection period for 2020/23 and 2020/22.

(03 marks)

b) Strategies that **ABC Ltd**. can use to improve its receivables collection period.

(02 marks)

(Total 05 marks)

Question 02

CBA Ltd. is evaluating a tax exempted capital project with an initial investment on machinery of Rs.15 million. The machinery is expected to have a useful life of 05 years and net cash inflows are expected from the project during the period of 5 years:

Year	Net Cash Inflow (Rs.)
1	2,450,000
2	2,550,000
3	4,000,000
4	4,650,000
5	3,500,000

You are required to: Calculate the payback period of the above project.

Question 03

Meena Ltd. produces and sells Product A and B and the following information has been extracted from the respective products:

	Product A	Product B
	Per Unit (Rs.)	Per Unit (Rs.)
Selling Price	1,200	900
Direct Materials: M1 (Rs.120/- per kg)	360	240
M2 (Rs.60/- per kg)	240	240
Direct Labour (Rs.250/- per hour)	375	250
Variable P/Overheads (Rs.80/- per direct labour hour)	120	80

- Monthly demands for Products A and B are 25,000 units and 32,000 units respectively.
- Material M2 and direct labour for the next month are expected to be available 220,000 kg and 60,000 hours respectively.

You are required to:

- (a) Compute the contribution of product A and product B. (02 marks)
- (b) Identify the variables, objective function and the constraints. (02 marks)
- (c) Draw the constraints on a graph paper to identify the feasible region. (04 marks)
- (d) Identify the optimal product mix using the graphical method. (02 marks) (Total 10 marks)

Question 04

SC Ltd. manufactures and sells Product "AB". The following information has been forecasted for the year 2024 in respect of product "AB:

	Rs. (Per Unit)
Selling Price	600
Direct Material	335
Direct Labour	140
Variable P/Overhead	65
Fixed Overhead absorbed for pro	oduct 55

Budgeted production and sales quantity for the year 2024 would be 1,020,000 units.



You are required to:

Calculate the following for the year 2024:

(a) Profit volume ratio. (02 marks)

(b) Break-Even Point (BEP) in units. (02 marks)

(c) Margin of safety in units. (01 mark) (Total 05 marks)

End of Section A ______

SECTION B

(Total 30 marks)

Question 05

HCP PLC is a listed company with the following capital structure as at 31st March 20123:

 Item
 Book Value (Rs.)
 Market Value (Rs.)
 No. of Shares / Debentures

 Ordinary Shares
 200,000,000
 500,000,000
 20,000,000

 12% Irre/ Debentures
 800,000,000
 800,000,000
 8,000,000

 Irre/Preference Shares
 100,000,000
 200,000,000
 10,000,000

The following additional information is also provided:

- (1) A dividend of Rs.4.5/- per ordinary share was paid for the year just ended and dividends are expected to grow at the rate of 4% per annum.
- (2) Annual dividend for preference shares is Rs.1.40 per share.
- (3) The company pays income tax at the rate of 30% per annum.

You are required to:

(a) Calculate the following:

(i) Cost of Ordinary Shares.	(02 marks)
(ii) Cost of Irredeemable Debentures.	(02 marks)
(iii) Cost of Irredeemable Preference Shares.	(02 marks)
(iv) Weighted Average Cost of Capital using market values.	(04 marks)
	(Total 10 marks)

Question 06

(A) POPE Ltd. manufactures Product X using two materials. The following information has been extracted from the standard cost card:

Description	Rs. Per Unit
Direct Material A – (2 kg @ Rs.400/- per kg)	800
Direct Material B – (3 kg @ Rs.150/- per kg)	450

During the month of June 2023, POPE Ltd. manufactured and sold 10,000 units of X for which 22,000 kg of Direct Material A and 28,000 kg of Direct Material B were used.

You are required to: Calculate the Direct Material Mix Variance. (05 marks)



(B) Imat (Pvt) Ltd., manufactures product X in one of its plants and sells to the market. Imat uses the standard costing system and absorbs overheads on the basis of direct labour hours based on the budgeted production of 2,000 units per month. Budgeted sales for the month are 2,000 units at Rs.12,000/- per unit.

Standard cost card per unit of product X is as follows:

Rs. Direct material – (10 kg @ Rs.400/- per kg) 4,000

Direct labour (4 hours @ Rs.150/- per hour) 600

Variable overhead (4 hours @ Rs.100/- per hour) 400

Fixed production overhead (4 hours @ Rs.200/- per hour) 800

Total Cost 5,800

The actual results recorded for the month of June 2022 are as follows:

- Production and sales 1,800 units
- Selling price per unit Rs.13,000/-
- Direct material 18,800 kg @ Rs.550/- per kg
- Direct labour -6,100 hours @ Rs.200/- per hour
- Variable overheads Rs.960,000/-
- Fixed production overheads absorbed Rs.1,600,000/-

You are required to

Calculate the following variances for the month of June 2022.

- (i) Sales price variance.
- (ii) Sales volume variance.
- (iii) Direct material price variance.
- (iv) Direct material usage variance.
- (v) Direct labour rate variance.

(05 marks)

End of Section B

SECTION C (Total 50 marks)

Question 07

GP PLC produces and sells a branded product. The following productions and sales forecasts for the month of June, July, August and September 2023 were extracted from the records of the company:

 June
 July
 August September

 Purchases (in units)
 8,000
 12,000
 15,000
 13,000

 Sales (in units)
 9,000
 10,000
 14,000
 13,000

The following additional information is also provided:

- (1) Purchase price per unit is Rs.75/- up to 30th June 2023 and it is expected to increase to Rs.80/- with effect from 01st July 2023.
- (2) All the purchases are made on credit basis and payments will be made in the following month.
- (3) 60% of the sales are on cash basis and balance will be collected in the following month.



Selling price per unit is Rs.120/-.

- (4) Total administration and distribution expenses for the month have been estimated to be Rs.480,000/and it will be paid in the same month.
- (5) The company intends to obtain a bank loan of Rs.1,000,000/- during the month of August 2023 to be settled in monthly installments of Rs.60,000/- each for a period of 2 years. First installment will be paid on 01st September 2023.
- (6) Cash balance as at 30th June 2019 would be Rs.125,000/-. You are required to: Prepare the cash budget of GP PLC for the quarter ending 30th September 2023 on monthly basis. (10 marks)

End of Section C