

INSTITUTE OF CHARTERED ACCOUNTANTS (GHANA)



**MAY 2011 EXAMINATIONS
(PROFESSIONAL)**

PART 3

**FINANCIAL MANAGEMENT
(Paper 3.4)**

Attempt ALL Questions

TIME ALLOWED:

Reading & Planning	-	15 Minutes
Workings	-	3 Hours

QUESTION 1

- (a) Discuss the concept of shareholder value maximisation, explaining why it is considered more appropriate than profit maximisation. (4 marks)
- (b) Distinguish between “efficient portfolios” and “optimal portfolios”. (3 marks)
- (c) Explain the role of the Financial Manager in the public sector organisations. (5 marks)
- (d) You have recently been appointed as a Finance Manager of SICA Company Ltd. The statement of comprehensive income of the company for two years is as follows:

	SICA Ltd	
	<u>Statement of Comprehensive Income for the year ended December 31</u>	
	2010	2009
	GHS	GHS
Revenue	51,887.50	41,235.50
Cost of sales	(24,146.50)	(19,230.00)
Gross profit	27,741.00	22,005.50
Distribution costs	(11,171.00)	(9,314.00)
Administrative expenses	(4,216.00)	(3,092.00)
Operating profit	12,354.00	9,599.50
Interest received	560.00	209.00
Other income	70.50	379.50
Finance costs	(78.00)	(100.50)
Profit before tax	12,906.50	10,087.50
Tax	(3,221.50)	(2,509.50)
Profit for the year	9,685.00	7,578.00
Other comprehensive income	0	0
Total comprehensive income	9,685.00	7,578.00

Required:

You are to prepare a common size statement of the company including your assessment of performance of the company over the period for presentation to the Director of Finance.

(8 marks)

(Total: 20 marks)

QUESTION 2

- (a) Explain four demerits of using payback period method to assess potential investment projects.

(4 marks)

- (b) AP Ltd is planning to purchase a new machine for its new products. The manufacturing of this product would involve the use of both a new machine (costing GHS15,000) and an existing machine which cost GHS8,000 two years ago. The current net book value of the old machine is GHS6,000. There is sufficient capacity on this machine, which has so far been underutilized.

The standard cost card shows the following:

a)	Expected Annual Sales	-	5,000 units	
b)	Selling Price per Unit	-	GHS3.20	
c)	Unit cost would be:			GHS
	Direct labour (4 hours @ GHS0.20)			0.80
	Direct material			0.70
	Fixed cost (including depreciation)			<u>0.90</u>
				<u>2.40</u>

- d) The project life span - 5 years
e) Net value of new machine (after 5 years) GHS1,000

Due to the shortage of direct labour, labour resources would have to be directed from other work which currently earns a contribution of GHS0.15 per direct labour hour. The fixed overhead absorption rate would be GHS0.225 per hour (GHS0.90 per unit), but the actual expenditure of fixed overhead would not alter.

Working capital requirement would be GHS1,000 in the first year, rising to GHS1,500 in the second year and remaining at this level until the end of the project.

The cost of capital is 20% (Ignore taxation)

You are required to advise the company if the project should be undertaken.

(16 marks)

(Total: 20 marks)

QUESTION 3

- (a) The managing Director of Kowa Ghana Ltd, a private company dealing in mining explosives, has decided to offload his stake and list on the Ghana Stock Exchange (GSE). However he has difficulty in understanding how the Stock Market operates and the benefits associated with obtaining quotation on the GSE.

Required:

As a Financial Market Advisor,

- (i) Explain to him the **three (3)** main forms of Efficient market Hypothesis. (3 marks)
- (ii) Identify **Five (5)** main benefits Kowa Ghana Ltd would obtain as a result of listing on the Ghana Stock Exchange. (5 marks)
- (b) You have been a Deputy Director of Finance of XYZ Ltd since 2008. Your boss has been ill and the Managing Director has asked you to take over and to provide urgently required estimates of the discount rate to be used for evaluating a new Capital Investment proposal.

You have been given the working papers of your boss which contain the following information:

Average return on the market	15%
XYZ Share Price Capital gain	14%
XYZ Dividend Yield	6%
Market Standard Deviation	10%
Correlation between XYZ and the market	+0.8
XYZ Standard Deviation	20%
XYZ Earning growth rate	11%
XYZ Dividend growth rate	10%
XYZ Sales growth rate	12%
Risk-free interest rate	11%

The company's gearing ratio is 1:2 (debt to equity) and the after-tax earnings available to shareholders at the end of the year is GHS6 million of which GHS2.6 million was paid out as dividend. The company has 10 million shares in issue at a current market price of GHS3.50 per share. Assume that the company's corporate debt is risk-free rate and corporate tax rate is 35%.

Required:

- (i) Calculate XYZ cost of equity using Dividend Valuation Model. (3 marks)

(ii) Calculate XYZ cost of equity using CAPM.

(5 marks)

(iii) Estimate the company's weighted average cost of capital.

(4 marks)

(Total: 20 marks)

QUESTION 4

(a) In making decisions relating to the appropriate mix of financing for a company, the finance Manager is expected to consider the impact of **business risk** and **financial risk**.

Explain the difference between business risk and financial risk.

(4 marks)

(b) Mergers and takeovers are now very popular. There are a number of reasons why a firm might consider acquiring another firm, rather than choosing to grow internally.

(i) State and explain **four (4)** reasons for mergers.

(4 marks)

(ii) Damson Ltd wants to acquire Nyarko Ltd by offering one (1) share in exchange of every two (2) shares of Nyarko Ltd. The relevant financial data are as follows:

	Damson Ltd	Nyarko Ltd
Earnings after tax (GHS)	1,800,000	360,000
Ordinary shares issued	6,000,000	1,800,000
Earnings per share (GHS)	0.30	0.20
Price Earnings ratio (times)	10	7
Market price per share (GHS)	3.0	1.4

Required:

(i) How many ordinary shares should Damson Ltd issue to acquire Nyarko Ltd.?

(ii) What is the earnings per share of Damson Ltd after the acquisition.

(iii) Determine the equivalent earnings per share of Nyarko Ltd.

- (iv) What is the expected market price per share of Damson Ltd after the acquisition assuming its P/E multiple remains unchanged?
- (v) Determine the market value of the merged company.

(12 marks)

(Total: 20 marks)

QUESTION 5

- (a) The forward contract has a number of uses in international financial management. Explain **three (3)** of such uses.
- (3 marks)*
- (b) Explain the following:
- (i) Option
 - (ii) Warrant
 - (iii) Rights Issue
- (3 marks)*
- (c) Mr. Nyame Bekyere plans to have GHS200,000 in his investment account on his retirement in 10 years time. His bank currently pays 12% interest on investment account. As the financial advisor to Mr. Bekyere, you are required to determine the amount he needs to put aside at the end of each year so that he can achieve his dream.
- (4 marks)*
- (d) You have just assumed the position of a Finance Manager of Goaso Brewery Ltd (GBL). The company is considering reviewing its raw material procurement policy and its trade credit policy and has asked for your advice on the following issues.
- i) The annual demand for a key raw material (malt) is 40,000 tonnes, at a steady rate. It costs GHS20 (in terms of documentation and postage) to place an order, and 40p to hold a tonne for a year.

Required:

Advise on

- the order size to minimise inventory costs,
- the number of orders to be placed each year,

- the length of the inventory cycle, and
- the total costs of holding and ordering inventory for the year.

(4 marks)

- ii) The company is considering a change of credit policy with respect to sale of its premium brand, Sharp Beer. The change in policy will result in an increase in the average collection period from one month (30 days) to two months (60 days). The relaxation in credit is expected to produce an increase in sales in each year amounting to 25% of the current sales volume.

Selling price per crate	GHS20
Variable cost per crate	GHS17
Current annual sales	GHS4,800,000

The required rate of return on investments is 30%. Assume that the 25% increase in sales would result in additional inventories of GHS200,000 and additional accounts payable of GHS40,000.

Required:

Advise the company on whether or not to extend the credit period offered to customers, if:

- All customers take the longer credit of two months
- Existing customers do not change their payment habits, and only the new customers take a full two months credit.

(6 marks)

(Total: 20 marks)