

# KASNEB

## CIFA PART II SECTION 3

### CORPORATE FINANCE

#### PILOT PAPER

September 2015.

Time Allowed: 3 hours.

Answer ALL questions. Marks allocated to each question are shown at the end of the question. Show ALL your workings.

#### QUESTION ONE

- (a) Explain the prime objective of inventory management. (3 marks)
- (b) The following information relates to the inventory of MK Ltd.:
1. Annual purchases amount to Sh.1,080,000.
  2. Purchase price per unit is Sh.30.
  3. Carrying cost is 15% of the purchase price.
  4. Cost per order is Sh.120.
  5. Desired stock level is 1,500 units. The stock level was achieved at the start.
  6. Lead time is 7 days.

#### Required:

- (i) The economic order quantity. (4 marks)
- (ii) The optimal number of orders to be placed in a year. (2 marks)
- (iii) The re-order level. (3 marks)
- (iv) Assume that for any orders of at least 1,800 units, the firm will get 5% discount on the purchase price. Analyse whether the company should take advantage of the discount or not. (8 marks)
- (Total: 20 marks)

#### QUESTION TWO

- (a) Highlight any four factors to be taken into account when making capital structure decisions. (6 marks)
- (b) A Ltd. and B Ltd. are two firms operating in the printing industry. The companies have the same business risk and are almost identical in all material aspects except in their capital structures as indicated below:

	A Ltd. Sh. "million"	B Ltd. Sh. "million"
Ordinary shares	20	25
Share premium	45	8
Retained profit	<u>36.5</u>	<u>44</u>
	101.5	77
12% debenture	-	<u>25</u>
	<u>101.5</u>	<u>102</u>

The nominal value of each share of A Ltd. is Sh.25 and is currently trading at Sh.140 each. The nominal value of each share of B Ltd. is Sh.100 and is currently trading at Sh.400 each. Debentures of B Ltd. are currently selling at par of Sh.100 per bond. Earnings before interest and tax in both firms are Sh.25 million per annum and corporate tax is payable at the rate of 30%.

#### Required:

- (i) Assume you own 10% of ordinary shares of B Ltd. Using the Modigliani and Miller (MM) arguments, explain what action you would take in the above scenario to maximise your return. (Hint: use the arbitrage approach) (5 marks)
- (ii) Calculate the arbitrage profit, if any from your action in (b) (i) above. (5 marks)
- (iii) If A Ltd. borrows Sh.20 million, calculate its effect on the company's cost of capital according to MM theory. (4 marks)

(Total: 20 marks)

**QUESTION THREE**

(a) The Alpha Company Ltd. expects with some degree of certainty to generate the following net income and to have the following capital expenditure during the next five years:

Year	1	2	3	4	5
Net income Sh.“million”	200	150	200	230	160
Capital expenditure Sh.“million”	100	150	300	150	200

The company currently has 100 million shares of ordinary stock outstanding and pays dividends of Sh.1 per share. The company’s target debt/equity ratio is 0.25.

**Required:**

- (i) The dividend per share and total external financing from the issue of debt and issue of new equity required in each year if dividend policy is treated as a residual decision. (3 marks)
- (ii) The dividend per share and amount of debt and new equity to be issued if a dividend payout ratio of 50% is maintained. (3 marks)
- (iii) The amount in new issues of debt and equity to be raised each year if the present dividend per share is maintained. (3 marks)

(b) Maridadi Ltd. is considering buying an equipment for its manufacturing processes. The equipment would cost Sh.24,500,000. The company has made the following estimates of the after tax cash flows in each year over the equipment’s possible life of 2 years.

Year 1		Year 2	
Net Cash Flow Sh.	Probability	Net Cash Flow Sh.	Probability
15,350,000	0.5	12,280,000	0.7
		18,430,000	0.3
12,500,000	0.5	24,050,000	0.4
		30,700,000	0.6

The outcome of year 2 cash flow is dependent on the outcome of year 1 cash flow. The company uses 12% discounting rate for the appraisal of investment projects.

**Required:**

- (i) The equipment’s expected net present value (NPV). (7 marks)
- (ii) The project’s net present value (NPV) and its probability if the worst outcome occurs. (2 marks)
- (iii) The projects net present value (NPV) and its probability if the best outcome occurs. (2 marks)

**(Total: 20 marks)**

**QUESTION FOUR**

- (a) (i) In the context of corporate setup, explain any four causes of conflict between shareholders and the management. (4 marks)
- (ii) Discuss the signs (symptoms) of financial distress in an organisation. (4 marks)

(b) The following is the summarised financial information of Keys Ltd.:

	Income statement		
	2012	2013	2014
	Sh.“000”	Sh.“000”	Sh.“000”
Turnover	76,270	89,410	102,300
Taxable income	10,140	12,260	14,190
Taxation	(3,549)	(4,291)	(4,966)
Net income	6,591	7,969	9,224
Dividend	(2,335)	(2,557)	(2,800)
Retained earnings	4,256	5,412	6,424

**Statement of financial position:**

	2014	
	Sh. "000"	Sh. "000"
Non-current assets		54,000
Current assets	39,700	
Current liabilities	(26,200)	<u>13,500</u>
		<u>67,500</u>
<b>Financed by:</b>		
Ordinary shares (Sh.10 par)		20,000
Reserves		32,500
10% debentures (Sh.100 par)		<u>15,000</u>
		<u>67,500</u>

As a result of recent capital investment, stock market analysts expect post tax earnings and dividends to increase by 25% per annum for the next two years and then to revert to the company's existing growth rate. Key Ltd.'s overall asset beta is 0.763 and the beta coefficient of equity is 0.82. The risk free rate is 12% and the market return is 17%. The current market price of Key Ltd.'s ordinary shares is Sh.35.40 cum 2014 dividend and the debenture price is Sh.89.50 ex-interest. Corporate tax rate is 30%.

**Required:**

- (i) Estimate what a fundamental analyst might consider to be the current intrinsic value of the company's shares. (Hint: cost of equity may be estimated using APM). (10 marks)
- (ii) Comment on the significance of your estimate for the fundamental analyst in (b) (i) above. (2 marks)
- (Total: 20 marks)**

**QUESTION FIVE**

- (a) Tala Pharmaceutical Company Ltd., a public quoted company, intends to raise additional share capital through a rights issue. The number of issued ordinary shares currently stands at 100 million ordinary shares. Each shareholder will have a right to purchase one ordinary share for every five shares currently held. The current market price per share is Sh.60 while the subscription price has been fixed at Sh.50 per share.

**Required:**

- (i) The theoretical ex-right market price per share. (3 marks)
- (ii) The theoretical value of each right. (2 marks)
- (iii) Evaluate the impact of the rights issue on the value of wealth of a shareholder who owns 500,000 ordinary shares of the company and Sh.5,000,000 in his savings account assuming that the shareholder will:
- Exercise all his rights. (3 marks)
  - Sell all his rights. (3 marks)
  - Exercise 70% of his rights and sell the balance. (3 marks)
  - Ignore the rights issue. (2 marks)
- (b) Nono Ltd. is contemplating acquiring Konda Ltd. on a share for share exchange. Nono Ltd. is offering 3 of its shares for every 2 shares of Konda Ltd.

The financial data relating to the two companies are shown below:

	Nono Ltd.	Konda Ltd.
	Sh.	Sh.
Earnings attributable to owners	5,190,360	2,340,000
Earnings per share (EPS)	14.80	29.25
Market price per share (MPS)	222	322

The corporate tax rate is 30%.

**Required:**

- (i) The maximum offer price that will not dilute the earnings per share (EPS) of Nono Ltd. (2 marks)
- (ii) The total premium payable to the shareholders of Konda Ltd. (2 marks)
- (Total: 20 marks)**