

M.Sc. ACTUARIAL SCIENCE (M.Sc.AS)

Term-End Examination

June, 2012

MIA-004 (F2F) : FINANCE AND FINANCIAL REPORTING

Time : 3 hours

Maximum Marks : 100

-
- Note :** (i) *The question paper is divided into 3 sections.*
(ii) *Section - A : Multiple choice questions.*
(iii) *Section - B : Short questions.*
(iv) *Section - C : Long questions.*
-

SECTION-A

Attempt *all* the questions :

10x2=20

1. Which of the following is treated as a credit item in the trial balance ?

- (I) Investment Income
(II) Short term Investments
(III) Credit purchases
(IV) Depreciation

Options :

- (a) IV only (b) II and III
(c) I and IV (d) I only

2. Which of the following instruments is often used by companies that require regular series of payment ?

- (a) Commercial paper
- (b) Leasing
- (c) Bills of Exchange
- (d) Invoice Discounting

3. What happens to a company's weighted average cost of capital if the corporate tax rate increases and RBI policies cause an increase in the risk free rate ? (Consider the two events independently)

Tax rate increase	Increase in risk free rate
(a) Decrease	Increase
(b) Decrease	Decrease
(c) Increase	Increase
(d) Increase	Decrease

4. Which of the following problems is most likely to be overlooked by a ratio analysis of a company's financial statement ?

- (a) Contingent liabilities
- (b) High gearing
- (c) Poor efficiency
- (d) Liquidity problems

5. A floating - rate note is :
- (a) an overdraft
 - (b) a bond issued in the Euro market with a variable rate of interest
 - (c) a Bank loan with a variable rate of interest
 - (d) an option to buy a currency future
6. Which of the following does NOT have to be part of a listed company's annual report ?
- (a) Cash flow statement
 - (b) Notes to the account
 - (c) Income statement
 - (d) Balance sheet
7. Which of the following would be examples of specific risk for a large domestic house building company ?
- (I) Inflation
 - (II) Interest rates
 - (III) Regional variations in house prices
- Options :
- (a) I only
 - (b) II and III only
 - (c) III only
 - (d) all of the above

8. Which of the following strategies would not help a company to reduce its exposure to rising interest rates ?
- (a) The negotiation of an interest rate swap
 - (b) The purchase of a put option on an interest rate future
 - (c) The purchase of a bond future
 - (d) The sale of an interest rate future
9. Which of the following changes in working capital will result in an improvement in a company's net cash inflow from operating activities ?
- (a) increase in trade payables
 - (b) increase in inventories
 - (c) increase in trade receivables
 - (d) decrease in other current liabilities
10. Which of the following is responsible for developing, issuing and withdrawing accounting standards ?
- (a) International Accounting Standard Board
 - (b) Audit Practices Board
 - (c) International Financing Reporting standard
 - (d) Department of Trade and Industry

SECTION-B

Attempt *any eight (8)* questions from question no. 11 to question no. 20 :

11. Explain how tax might influence the shareholder's preference for debt financing versus equity financing in the company's gearing decision ? 5
12. Who are the main stakeholders in an organisation and why might their interest conflict ? 5
13. The following ratios have been calculated from financial statements of two companies of similar size and same industry : 5

	Y Ltd.	S Ltd.
Gross profit ratio	40%	20%
Net profit ratio	32%	16%
Return on Capital Employed	10%	14%

Explain which of the two companies is more profitable and why ?

14. (a) What does a Beta of a company represent ? 1
- (b) List two main uses of the WACC for a corporate ? 1

- (c) Company X has Rs. 50m of equity share capital, no debt and a beta of 1.2. It then issues debt capital of Rs. 50m consisting of two equal size tranches of debentures with gross redemption yields of 7.0% and 8.0% respectively. 3
- The return on government issued bonds is 6.0%.
- The corporate tax rate is 30% and the interest payment on debentures are treated as a tax deductible expense. The market rate of return is 14.0%.
- Calculate the weighted average cost of capital before and after the debenture issue.
15. (a) Define Depreciation. Explain the purpose of charging depreciation in a company's account. 2
- (b) With the help of a simple numerical example, explain two methods of calculating depreciation. 3
16. Explain Modigliani and Miller's two irrelevance proposition. 5
17. Explain briefly, giving simple examples, what is meant by the following terms ?
- (a) goodwill on consolidation 2½
- (b) minority shareholders 2½

18. Country Dairy Ltd. is a small business selling icecream and other dairy products to local shops and restaurants. Recently, the business has experienced some cashflow problems as a result of a few customers paying their bills late, and the owners are now considering using factoring to improve the situation. 5

Explain the difference between recourse and non-recourse factoring and consider the relative merits of each for Country Dairy Ltd.

19. Describe the principles of double taxation relief ? 5
20. Compare and contrast interest rate swaps and currency swaps ? 5

SECTION-C

Attempt *any two* (2) questions from question no. 21 to question no. 24 :

21. (a) What is convention of materiality ? 20
 (b) From the following trial Balance of XYZ Ltd. prepare trading and profit and loss Account for the year ended 31st December 2008 and a balance sheet on that date.

Trial Balance :

Dr	Rs.	Cr	Rs.
Opening stock	20,000	Sales	2,70,000
Purchases	80,000	Purchase return	4,000
Sales Return	6,000	Discount	5,200
Carriage Inward	3,600	Sundry creditors	25,000
Carriage Outward	800	Bills payable	1,800
Wages	42,000	Share Capital	75,000
Salaries	27,500		
Plant and Machinery	90,000		
Furniture	8,000		
S. Debtors	52,000		
Bills receivable	2,500		
Cash in hand	24,300		
Travelling Expenses	3,700		
Lighting (factory)	1,400		
Rent and taxes	7,200		
General Expenses	10,500		
Insurance	1,500		
	3,81,000		3,81,000

Adjustments :

- (a) Stocks on 31st Dec. 2008 was valued at Rs. 24,000 (Market value - 30,000)
- (b) Wages outstanding for Dec 2008 amounted to Rs. 3,000/-
- (c) Salaries outstanding for Dec 2008 amounted to Rs. 2500/-
- (d) Prepaid Insurance amounted to Rs. 300/-
- (e) Provide depreciation on plant and machinery at 5% and on furniture at 20%

22. The balance sheet as on 31-3-2006 and 31-03-2005 of Gupta textiles limited is given below :

	(Rs. In lakhs)	
	31-03-2006	31-03-2005
Fixed Asset at Cost 750 700		
Less Depreciation (400) (350)	350	350
Investment	250	300
Stock	162	255
Trade debtors	215	250
with Bankers	175	130
Total Assets	1,152	1,285

	31-03-2006	31-03-2005
Share Capital	150	150
Reserves	237	115
12% secured debentures 2010	350	300
Provision for taxation	140	249
Trade Creditors	140	243
Provision for dividend	135	228
	1,152	1,285

During the financial year 2005-06 the following transactions took place :

• Sales	1000
• Raw material and wages at factory	412
• Office expenses and wages at office	155
• Net return on long term Investments	8%
• Tax charge on 2005-2006 profits	111
• Purchase of machinery on 31-3-2006	50
• Issue of further Debentures on 2-4-2005	50

Prepare the profit and loss Account and Cash flow statements for the financial year 2005-2006.

23. (a) Based on the following figures taken from a company's published report and accounts, you are required to calculate : **5x2=10**
- (i) Capital gearing ratio
 - (ii) Current ratio
 - (iii) Quick ratio
 - (iv) Stock turnover using average levels of stock over the year
 - (v) Operating profit

Information :

Current Assets	19000
Current Liabilities	17000
Inventories	11000
Inventories last year	12000
Long term debt	9000
Revenue	25000
Cost of sales	7000
Distribution Costs	3000
Administrative Expenses	2500
Net Asset Value	80,000

- (b) (i) State the main weaknesses of historical cost accounts in times of inflation. 4
- (ii) Discuss the main limitations of ratio analysis. 6

24. A company has asked you to calculate its weighted average cost of capital (WACC) and has given you the following information : 20

Market capitalisation of loan Capital	200 m£
Market capitalisation of equity share Capital	800 m£
Average redemption yield on loan Capital	10%
Dividend yield on equity shares	3%
Beta of equity shares	1.5
Risk free rate of return	6%
Equity risk premium	8%
Rate of Corporation Tax	30%

- (a) Define the term market capitalisation and calculate the WACC.
- (b) Discuss the investigations you would carry out to estimate the systematic risk of a project.
- (c) The company is considering undertaking a large project, which is estimated to give a 14% rate of return. Comment on the relationship between the WACC calculated in and the expected return of the project given above and comment on the level of systematic Risk of this particular project.
- (d) A director has said that it is clear that the project would be worthwhile provided the company could borrow the money in the form of debt at 10%. Explain the link between gearing and the level of systematic risk and discuss whether the director is correct or not.
- (e) The director has refused to use the cost of capital as a rate for assessing projects because it changes each time new capital is raised. Discuss whether the director is correct or not and explain how you would approach the problem.
