## PUSASQF203

## **Business Finance-II**

Time: 2 hours Total Marks: 60 marks

## Note:

- 1. The candidate has option to either attempt question 4A or question 4B. Rest all questions are mandatory.
- 2. Numbers to the right indicate full marks.
- 3. The candidates should only write the option alphabet for answers in case of the MCQ based questions.
- 4. Use of approved scientific calculator is allowed.

Q1. 15 Marks

- 1. Which of the following statements is the least accurate?
  - a. The discounted payback period is generally longer than the payback period
  - b. The IRR can be positive even if the NPV is negative
  - c. The payback period considers all cash flows throughout the entire life of a project
  - d. The shareholder value approach is an extension of the NPV approach of capital project appraisal
- 2. Sam's son conducted a financial analysis of its restaurant business, the analysis did not improve the actual fortunes of the business, and it may not be able to achieve any one of the following issues:
  - a. Improve the profitability of this project.
  - b. Delineate the risks involved in the project.
  - c. Highlights the salient factors that lead to the greatest uncertainty.
  - d. Possibly suggest methods by which the risks might be reduced.
- **3.** The decision made from a Payback Method may not be the optimum decision for maximizing the Profit or Returns because:
  - a. It ignores income beyond the payback period
  - b. The payback period is difficult to calculate
  - c. The returns in later years are uncertain
  - d. Of the emphasis placed on the interest factor
  - A reduction in risk in the context of a Capital Project Appraisal will lead to:-
  - a. Increase in the Risk Discount Rate and decrease in the Net Present Value
  - b. No change in the Risk Discount Rate and increase in the Net Present Value
  - c. Decrease in the Risk Discount Rate and increase in the Net Present Value
  - d. Decrease in the Risk Discount Rate and decrease in the Net Present Value

- 5. "The preparation of financial statements should avoid presenting an unduly optimistic set of results". Which of the following statement is the least accurate in the above mentioned context?
  - a. The lowest reasonable figure should be stated for profit or for any of the assets.
  - b. The highest reasonable figure should be stated for any liabilities.
  - c. Profits are recognized by inclusion in income statement whether realized in the form of cash or of other assets, or which can be assessed with reasonably certainty or is a best estimate in the light of the available information.
  - d. Provision is made for all known liabilities, expenses and losses, whether the amount is known with certainty or is a best estimate in the light of the information available.
- 6. Which of the following in respect of Monte Carlo Simulation Model is not correct?
  - a. It involves creating a model, into which all the variabilities and correlations of the input criteria are entered.
  - b. They are likely to be performed at an early stage in the capital appraisal process.
  - c. The model runs a large number of simulations to obtain a spread of results.
  - d. It is complex and expensive.
- 7. Select the most appropriate statement in relation to financial statements
  - a. The cash flow statement is not intended to supplement the income statement and statement of financial position.
  - b. Depreciation adjustments are required because virtually all non current assets have infinite useful economic lives.
  - c. Prudence should only be applied in situations where there is uncertainty.
  - d. The statement of change in debt summarizes the change in the capital and reserves attributable to debt holders of the company over the accounting period.
- **8.** It is the responsibility of which one of following to give an opinion on whether or not the financial statements give a 'true and fair view'?
  - a. Directors
  - b. Management
  - c. Shareholders
  - d. Auditors
- 9. Out of the following the only item which appears in a Trial Balance is?
  - a. Contingent liabilities
  - b. Closing stock
  - c. Addition to assets or assets purchased during the year
  - d. Cumulative depreciation

- 10. Which of the following statement is TRUE for a straight line method of Depreciation
  - a. It is generally used wherever the equal allocation of cost provides a reasonably fair measure of the company's service.
  - b. The annual depreciation charge represents a fixed percentage of the net book value brought forward.
  - c. The net book value can never get nil, as it can only be reduced by a proportion each year.
  - d. It is very difficult to calculate and conceptually complex to understand.

**Q2.** 

A 5 Marks

- i. What does the beta of a company represent?
- ii. A company has ₹ 50m of equity share capital, no debt and a beta of 1.2. It then issues debt capital of ₹ 50m consisting of two equal size tranches of debentures with gross redemption yields of 7.0% and 8.0% respectively. The return on government issued bonds is 6.0%. The corporate tax rate is 30% and the interest payments on debentures are a 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.

iii. List two main uses of the WACC for a corporate.

B 5 Marks

- i. The external auditors of a listed company have indicated that the next audit report might be "qualified" unless financial statements are changed before publication. "Explain significance of qualified audit report in this context".
- ii. The operating profit of a company is ₹ 25 lakhs after including an adjustment in respect of depreciation of ₹ 5 lakhs. Movement in the following items over the financial period are
  - a. Trade and other receivables Increase of ₹ 30,000/-
  - b. Trade and other payables Decrease of ₹ 75,000/-
  - c. Inventories Increase of ₹ 28,000/-

Calculate the cash generated from operating activities?

C 5 Marks

Explain the below statements –

- a) "loan capital normally carries a relatively low risk for the lender"? (2)
- b) "Historical cost accounting tends to overstate profits during times of inflation".

Q3.

A 5 Marks

An individual investor is planning to buy a unit linked insurance plan that offers two funds a debt fund and an equity fund. Debt fund invests in risk-free bonds and equity fund invest in stocks of BSE 300. The risk-free rate is 6% p.a., beta of the equity fund is 1.2 and equity risk premium derived from the market is 7% p.a.

- i. What is the expected return from the market?
- ii. What is the expected return from the equity fund and bond fund respectively?
- iii. The individual customer is considering investing a ₹ 1400 in Bond Fund and ₹ 600 in Equity Fund. The investor now wants to compare this investment with other investment opportunities that are available in the market. What is the return that has to be used by this investor for comparison purposes?

B 5 Marks

The directors of G are deciding whether or not to invest in a major building project. They have used a Monte Carlo simulation process to model the cash flows from this project. They have run the simulation 10,000 times. The average net present value of the project is positive and the project has generated a positive net present value on 9,930 occasions. Explain how such a simulation exercise might be created. Your answer should indicate the factors that would be incorporated into the simulation model.

5 Marks

Explain the following

- a) What are subsidiaries and associates companies?
- b) Going concern assumption may simplify the preparation of financial statements, how?

Q4A. 15 Marks

Company X is a newly set-up deep sea oil exploration company. The company aims to identify viable oil resources and sell these finds to larger oil corporations for development into oil wells.

Its main assets are its expert team of geologists, oil industry experts and an exploration ship. It plans to lease any other drilling equipment, as well as hire any local skilled resources/divers it may need during its exploration activities.

Company X is embarking on a new project that involves deep sea exploration in the waters belonging to Country Africa. This country has a long history of political instability with frequent changes in the ruling regime. It is also plagued by bade weather and typhoons are especially common.

- i. Prepare a risk matrix setting out the risk causes for the three main stages of the project set out below (5):
  - a) Exploration rights negotiations
  - b) Construction of drilling sites for testing and exploration
  - c) Selling off identified oil resources

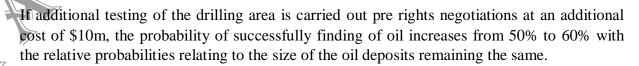
For the project described above initial costs of \$20m will be incurred. Costs of \$20m will be incurred in carrying out the exploration and test drilling and results will be available in 1 year.

The overall probability of finding oil reserves is only 50%

The probability of finding different sizes of oil reserves is given below. The NPVs associated with finding oil and selling it to a larger oil corporation depends on the various oil prices per barrel at the time of fining the oil reserves.

The current oil price is \$70 per barrel. There is a 1/3 chance that the oil price will be each of \$40, \$70 or \$100 per barrel after 1 year.

	Oil price \$70	Oil price \$100	Oil price \$40
Small find 60%	\$150m	\$450m	\$30m
Big find 25%	\$250m	\$750m	\$50m
Jackpot find 15%	\$1000m	\$3000m	\$200m



ii. Calculate the expected profit or loss on the project and whether the additional testing should be carried out. (6)

iii. Discuss the relative advantages and disadvantages of using the NPV and IRR approaches for capital project appraisal. (4)

Q4B. 15 Marks Income statement for Fomer Pvt Ltd for the year 2020 -₹ '000 500,000 Revenue (14,000)Increase in stock (190,000)Raw Materials (60,000)Depreciation **Gross Profit** 236,000 (170,000)Admin expenses 66,000 **Operating Profit** 4,000 Finance Income Net Profit before interest and taxation 70,000 Finance Costs 19,900 Net profit before taxation 50,100 Tax 16,534 **Profit after taxation** 33,566

## Balance sheet for Fomer Ltd as at 31st Dec 2020-

	₹'000
Assets	
Non-current assets	
Intangible assets	40,000
Tangible assets	150,000
	190,000
Current assets	
Inventories	84,000
Trade receivables	120,000
Cash	28,000
	232,000
Total Assets	422,000
	>/
Equity and Capital	,
Called up share capital (160 million shares @ 50 p)	80,000
Retained earnings	40,000
Other reserves	20,000
Total Equity	140,000
Liabilities	
Non – current liabilities	50,000
10% unsecured loan stock 2022	50,000
11% subordinated loan stock 2024	38,000
93/4% mortgage debentures 2023	32,000
91/2% Eurosterling 2024	80,000
Total Non – current liabilities	200,000
Current Liabilities	64.000
Trade payables	64,000
Taxation	18,000
Total current liabilities	82,000
Total Liabilities	282,000
Total Equity and Liabilities	422,000

- i. Calculate the following ratios for Former Pvt Ltd
  - a) Net present value per share
  - b) Current and quick ratio
  - Return on capital employed
  - d) Stock turnover ratio
  - e) Debtors and Creditors turnover ratio [1 mark for each, max 5 marks]

ii. Interpret each of the ratio.

[1 mark for each, max 5 marks]

iii. Discuss the proposition "ratio analysis can show what's hidden in financial statements".

(5)