# LOYOLA COLLEGE (AUTONOMOUS), CHENNAI - 600034 

## B.B.A. DEGREE EXAMINATION - BUSINESS ADMINISTRATION

FIFTH SEMESTER - APRIL 2022
16/17/18UBU5MCO2 - FINANCIAL MANAGEMENT

Date: 16-06-2022
Dept. No. $\square$ Max. : 100 Marks
Time: 09:00 AM - 12:00 NOON

## PART - A

Q. No

Answer ALL questions
( $10 \times 2$ = 20 Marks $)$

1. What is effective rate of interest?
2. What is meant by rule of 72 ?
3. Give the meaning of profitability index.
4. What do you mean by weighted average cost of capital?
5. Define the term working capital.
6. What do you mean by optimum capital structure?
7. What is meant by leverage?
8. Calculate the maturity amount if Rs. $2,00,000$ is invested for 2 years at $12 \%$ compounded annually.
9. A firm sells its only product at Rs. 12 per unit. Its variable cost is Rs. 8 per unit. Present sales are 1,000 units. Calculate the operating leverage when the fixed cost is Rs. 1000 .
10. A Project costs Rs. 20 Lakh and yields annually a profit of Rs. 3 lakh after depreciation at $12.5 \%$ but before tax at $50 \%$. Calculate payback period.
PART - B

Answer any FOUR questions
11. Discuss the techniques of compounding.
12. Explain the significance of cost of capital.
13. Explain the determinants of working capital requirements.
14. A firm has sales of Rs. $15,00,000$ variable cost of Rs. $9,00,000$ fixed cost of Rs.3,00,000 and debt of Rs. $8,00,000$ at $8 \%$. a. Calculate its operating, financial and combined leverage. b. If the firm decides to double its EBIT, how much of a raise in sales would be needed on a percentage basis?
15. Amar Ltd has issued debentures of Rs. 20 lakh to be repaid after 5 years. How much should the company invest in a sinking fund earning $10 \%$ in order to be able to repay debentures?
16. Sanjay Ltd. has a stable income and stable dividend policy. The average annual dividend payout is Rs. 25 per share (face value: Rs.100). You are required to ascertain:
a. Cost of equity capital
b. Cost of equity capital if the market price of the share is Rs.150.
c. Expected market price in year 2 if the cost of equity is expected to rise to 20\%
d. Divided pay-out in year 2 if the company were to have an expected market price of Rs. 160 per share, at the existing cost of equity.
17. Project AB requires an investment of Rs. 20 lakh and yields profit after tax and depreciation as follows:
Year
1
2
3
4
5

Profit after Tax \&
Depreciation (Rs.) 1,00,000 1,50,000 2,50,000 2,60,000 1,60,000
At the end of $5^{\text {th }}$ year, the plant can be sold for Rs. $1,60,000$. You are required to calculate ARR.

## PART - C

## Answer any TWO questions

18. Explain in detail the sources of working capital requirements.
19. Dewey Ltd. has an EBIT of Rs. $4,50,000$. The cost of debt is $10 \%$ and the outstanding debt is Rs. $12,00,000$. The overall capitalization rate (Ko) is $15 \%$. Calculate the total value of the firm and equity capitalisation rate under NOI approach.
20. Alex Ltd is considering investing in a project requiring a capital outlay of Rs. $8,00,000$. Forecast for annual net incomes after depreciation but before tax are as follows:

| Years | 1 | 2 | 3 | 4 | 5 |
| :--- | :--- | :--- | :--- | :--- | :--- |
| Profits (Rs.) | $4,00,000$ | $4,00,000$ | $3,20,000$ | $3,20,000$ | $1,60,000$ |

Depreciation may be taken as $20 \%$ on original cost and taxation at $50 \%$ of net income.
You are required to evaluate the project according to each of the following methods:
a. Payback Method
b. Rate of return on original investment method
c. Rate of return on average investment method
d. NPV method taking cost of capital as $10 \%$
e. P.I Method.
21. Rajam Ltd. Issued $15,00012 \%$ preference shares of Rs. 100 each, redeemable in 20 years' time at $10 \%$ premium. The floating costs were $5 \%$. Find out the cost of preference capital if shares are issued.
a. At Par
b. At a Premium of $5 \%$
c. At a Discount of $10 \%$

