# INSTITUTE OF AERONAUTICAL ENGINEERING <br> (Autonomous) <br> Dundigal-500043, Hyderabad <br> B.Tech IV SEMESTER END EXAMINATIONS (REGULAR/SUPPLEMENTARY) - AUGUST 2023 Regulation: UG-20 <br> BUSINESS ECONOMICS AND FINANCIAL ANALYSIS 

Time: 3 Hours (ELECTRICAL AND ELECTRONICS ENGINEERING) Max Marks: 70

## Answer ALL questions in Module I and II

Answer ONE out of two questions in Modules III, IV and V
All Questions Carry Equal Marks
All parts of the question must be answered in one place only

## MODULE - I

1. (a) How micro economics differ from macro economics? Explain in detail nature and scope of managerial economics.
[BL: Understand| CO: 1|Marks: 7]
(b) "The purpose of managerial economics is to show economic analysis can be used in formulating business polices - Joel Dean. Interpret the meaning of the statement.

> [BL: Apply| CO: 1|Marks: 7]

## MODULE - II

2. (a) How are costs classified? Explain any five important cost concepts useful for managerial decisions.
[BL: Understand| CO: 2|Marks: 7]
(b) A company is operating at a fixed cost of Rs. 1,00,000 and variable cost of Rs. 50 each and sales volume is 10,000 units and selling price is Rs. 80 per unit. Calculate PVR, BEP, MS, Sales to earn a profit of Rs. $3,00,000$ and profit when sales of Rs. 15,00,000.
[BL: Apply| CO: 2|Marks: 7]

## MODULE - III

3. (a) Explain the role of time factor in the determination of price. Also explain price- $\mathrm{O} / \mathrm{P}$ (price and output) determination in case of perfect competition.
[BL: Understand| CO: 3|Marks: 7]
(b) Discuss how the price is determined under conditions of perfect competition? Illustrate this with the help of diagrams.
[BL: Understand| CO: 3|Marks: 7]
4. (a) List the types of partners in a partnership firm. Explain the features of sole proprietorship and joint stock company.
[BL: Understand| CO: 4|Marks: 7]
(b) "Monopoly is disappearing from markets". Do you agree with this statement? Do you advocate for monopoly to continue in market situations?
[BL: Understand| CO: 4|Marks: 7]
MODULE - IV
5. (a) Mention the salient features of net present value method? Illustrate with assumed data.
[BL: Understand| CO: 5|Marks: 7]
(b) Determine the pay-back period for a period for a project which requires cash- Outlay of Rs.10,000 and generates cash inflows of Rs.2,000, Rs.4,000, Rs.3,000 and Rs.2, 000 in the first, second, third, and fourth year respectively.
[BL: Apply| CO: 5|Marks: 7]
6. (a) Write about capital budgeting. Illustrate the significance and limitations of capital budgeting.
[BL: Understand| CO: 5|Marks: 7]
(b) The initial cash outlay of a project is Rs.50, 000 and it generates cash inflows of Rs.20, 000, Rs.15, 000, Rs. 25, 000 and Rs.10, 000 in four years. Using profitability index method, appraise profitability of the proposed investment assuming $10 \%$ rate of discount.
[BL: Apply| CO: 5|Marks: 7]

## MODULE - V

7. (a) What is double entry system? Explain how business transactions can be recorded in journal and ledger accounts?
[BL: Understand| CO: 6|Marks: 7]
(b) Write journal entries in the books of Mr. Bhavani Sankar from the following transactions 2002, Jan.1st business commenced with Rs. 15,000
Jan 2nd Cash paid into bank Rs. 10,000
Jan 3rd Sold goods for cash Rs. 7,000
Jan 4th Purchased goods from Vijay Rs. 3,000
Jan 5th Machinery Purchased for Rs. 5,000
Jan 30th Rent paid Rs. 2,000
Jan 31st Depreciation charged on Machinery Rs. 3,000
Jan 31st Depreciation charged on Furniture Rs. 500
[BL: Apply| CO: 6|Marks: 7]
8. (a) Identify the ratios that are used to find the soundness and strength of long-term financial position of a firm.
[BL: Understand| CO: 6|Marks: 7]
(b) From the data given in Table 1, calculate: i) Gross profit ratio ii) Net profit ratio iii) Return on total Assets iv) Inventory turnover v) Working capital turnover vi) Net worth to debt
[BL: Apply| CO: 6|Marks: 7]
Table 1

| Sales | $25,20,000$ | Other current Assets | $7,60,000$ |
| :---: | :---: | :---: | :---: |
| Cost of sale | $19,20,000$ | Fixed Assets | $14,40,000$ |
| Net Profit | $3,60,000$ | Net Worth | $15,00,000$ |
| Inventory | $8,00,000$ | Debt | $9,00,000$ |
| Current Liabilities | $6,00,000$ |  |  |

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