

G.PULLAIAH COLLEGE OF ENGINEERING AND TECHNOLOGY
(Autonomous)

Venkayapalle (V), Nandikotkur Road, Kurnool, Andhra Pradesh-518452
II-B. Tech, II-Semester, I-Mid Examinations, March 2025.

Common to CE/CEM/MECE&ME, EAI

Subjective Paper

Set-3

Subject: Managerial Economics and Financial Analysis (A40022)

Time: 90 Minutes

Date: 05.03.2025

Max Marks: 30

Answer any 3 questions

(3X10 = 30M)

1. Define Managerial Economics? Explain its relation with other subjects?

| Marks | Unit | CO | Cognitive Level |
|-------|------|-----|-----------------|
| 10M | 1 | C01 | Remember |

(OR)

2. What is demand? Explain Factors determining the Demand.

| | | | |
|-----|---|-----|----------|
| 10M | 1 | C01 | Remember |
|-----|---|-----|----------|

3. What is Demand Forecasting? What are the Factors Governing the Demand Forecasting.

(OR)

| | | | |
|-----|---|-----|----------|
| 10M | 1 | C01 | Remember |
|-----|---|-----|----------|

4. Define concept of production. Explain types of production.

| | | | |
|-----|---|-----|----------|
| 10M | 2 | C02 | Remember |
|-----|---|-----|----------|

5. Explain the Cobb-Douglas Production Function with its mathematical equation & assumptions

| | | | |
|-----|---|-----|------------|
| 10M | 2 | C02 | Understand |
|-----|---|-----|------------|

(OR)

6. What is Break Even analysis? Explain Advantages and Disadvantages.

| | | | |
|-----|---|-----|------------|
| 10M | 2 | C02 | Understand |
|-----|---|-----|------------|

M.Swaroopan
Signature of the Faculty

Degaraj
Signature of the HOD

G.PULLAIAH COLLEGE OF ENGINEERING AND TECHNOLOGY

(Autonomous)

Venkayapalli - Nandikotkur Road - Kurnool - Andhra Pradesh - 518 452

II-B.Tech, II- Semester II MID Examinations, April 2025.

SET-2

Common to CE/CSE/CAI/ECE and EEE

Subject: Managerial economics and Financial Analysis (A40022)

Time: 90 Min.

Date: 02.05.2025

Max.Marks: 30M

Answer any three following. Each Question carries equal marks.

(03x10M=30M)

1. Define partnership? Explain it's features, advantages and disadvantages?
- | Marks | Unit | CO | Cognitive Level |
|-------|------|-----|-----------------|
| 10M | 3 | CO3 | Remember |
2. What is Joint Stock Company? Explain it's features, advantages and disadvantages?
- | | | | |
|-----|---|-----|------------|
| 10M | 3 | CO3 | Understand |
|-----|---|-----|------------|
3. Describe working capital and explain the factors determining the working capital requirements?
- | | | | |
|-----|---|-----|----------|
| 10M | 4 | CO4 | Remember |
|-----|---|-----|----------|
4. Calculate the Pay Back Period and Net Present Value from the following information with the cost of Rs. 50000 each.

| | | | |
|-----|---|-----|-------|
| 10M | 4 | CO4 | Apply |
|-----|---|-----|-------|

| Projects/ Cash flows | C1 | C2 | C3 | C4 | C5 |
|-----------------------------|-------|-------|-------|-------|-------|
| A | 13000 | 14000 | 15000 | 14000 | 13000 |
| B | 16000 | 15000 | 14000 | 13000 | 12000 |
| Present Value factors @ 10% | 0.909 | 0.826 | 0.756 | 0.683 | 0.621 |

5. Explain the process of accounting with suitable formats?
- | | | | |
|-----|---|-----|----------|
| 10M | 5 | CO5 | Remember |
|-----|---|-----|----------|
6. Write the journal entries for the following transactions?
- | | | | |
|-----|---|-----|-------|
| 10M | 5 | CO5 | Apply |
|-----|---|-----|-------|

February 1- 2025- Kumar started the business with Rs. 100000

February 2- 2025- Purchased products of Rs.10000

February 3- 2025 – Loan taken from Ramesh of Rs. 15000

February 4- 2025 - Purchase of goods on credit from Narendra for Rs.9000

February 5- 2025 -Sold goods of Rs.25000

February 6- 2025 -Purchase of goods for cash Rs. 20000

February 7- 2025 -Sold goods to Ramu for Rs.50000

February 8- 2025 -Cash deposited into bank Rs.10000

Namu
Signature of the Faculty

P. Venkateswara Rao
Signature of the HOD

G.PULLAIAH COLLEGE OF ENGINEERING AND TECHNOLOGY
(AUTONOMOUS)

B.Tech II Year II Semester Regular Examinations May 2025

Subject Name: **Electronic Circuit Analysis**

Branch: **Electronics and Communications Engineering**

Time: 3 Hours

SET-2

Max. Marks: 70

Instructions:

1. Answer all 10 questions from Part-A. Each question carries two marks
2. Answer one full question from each unit in Part-B. Each full question carries 10marks

PART-A

| | | | | | |
|---|---|--|----|-----|------|
| 1 | a | Define Logarithm. | 2M | CO1 | BTL2 |
| | b | In the context of a BJT amplifier, what is the effect of emitter bypass capacitors on the amplifier's frequency response at low frequencies? | 2M | CO1 | BTL6 |
| | c | List the distortions exists in amplifier circuits. | 2M | CO2 | BTL1 |
| | d | Define multistage amplifier, and why are multiple amplifier stages used in communication systems? | 2M | CO2 | BTL1 |
| | e | How does feedback influence the gain of the amplifier? | 2M | CO3 | BTL3 |
| | f | What is the formula for closed-loop gain with negative feedback? | 2M | CO3 | BTL6 |
| | g | Classify different types of tuned amplifiers. | 2M | CO4 | BTL1 |
| | h | How does the tuned amplifier amplify signals at a particular frequency? | 2M | CO4 | BTL2 |
| | i | In power amplifiers what is the role of a heat sink | 2M | CO5 | BTL1 |
| | j | What is a power amplifier? | 2M | CO5 | BTL6 |

PART-B

UNIT-I

| | | | | |
|---|---|-----|-----|------|
| 2 | Analyze and draw the frequency response of BJT amplifier at low and high frequency. | 10M | CO1 | BTL2 |
| | | | | |

OR

| | | | | | |
|---|---|--|----|-----|------|
| 3 | a | Describe the concept of the gain-bandwidth product in the context of a BJT amplifier. | 5M | CO1 | BTL2 |
| | b | How does the parasitic capacitance between the base and collector affect the high-frequency response of a BJT amplifier? | 5M | CO1 | BTL2 |

UNIT-II

| | | | | | |
|---|---|---|----|-----|------|
| 4 | a | Describe the gain-bandwidth product in cascaded amplifiers. How does the gain in one stage influence the overall bandwidth | 5M | CO2 | BTL6 |
| | b | Describe the role of a transformer in coupling between amplifier stages. How does transformer coupling affect the frequency response and impedance matching between stages? | 5M | CO2 | BTL2 |

OR

| | | | | |
|---|---|-----|-----|------|
| 5 | Discuss and derive overall voltage, current, input and output impedance of cascade RC coupled BJT amplifier | 10M | CO2 | BTL6 |
|---|---|-----|-----|------|

UNIT-III

| | | | | |
|---|--|----|-----|------|
| 6 | a What are the main characteristics of negative feedback amplifiers? Discuss how negative feedback affects the gain, bandwidth, linearity, and distortion in an amplifier circuit. | 5M | CO3 | BTL2 |
| | b List the different feedback topologies. How does each topology affect the amplifier's gain, stability, and input/output impedance? | | | |

OR

| | | | | |
|---|--|-----|-----|------|
| 7 | Derive an expression for input impedance and output impedance for the current series and current shunt feedback amplifiers | 10M | CO3 | BTL2 |
|---|--|-----|-----|------|

UNIT-IV

| | | | | |
|---|--|----|-----|------|
| 8 | a Describe the operation of a Colpitts oscillator. What are the key components that determine its frequency of oscillation, and how does the circuit achieve frequency stability? | 5M | CO4 | BTL2 |
| | b Explain the principle of operation of a Phase-Shift oscillator. How does the feedback network in this oscillator ensure the generation of sustained oscillations, and what factors determine the frequency of oscillation? | | | |

OR

| | | | | |
|---|--|----|-----|------|
| 9 | a Discuss the importance of Q-factor in tuned amplifiers. How does the quality factor impact the bandwidth, selectivity, and gain of a tuned amplifier, | 5M | CO5 | BTL3 |
| | b Explain the working principle of a staggered tuned amplifier. How does the staggered tuning of multiple stages improve the overall frequency response and extend the bandwidth of the amplifier? | | | |

UNIT-V

| | | | | |
|----|--|-----|-----|------|
| 10 | Explain transformer coupled class-A power amplifier and derive its efficiency. | 10M | CO5 | BTL2 |
|----|--|-----|-----|------|

OR

| | | | | |
|----|--|----|-----|------|
| 11 | a What are the advantages and disadvantages of using power BJTs in amplifier circuits? Discuss their ability to handle high current and voltage, | 5M | CO5 | BTL6 |
| | b Explain the working principle of MOS (Metal-Oxide-Semiconductor) power transistors. How do power MOSFETs differ from regular MOSFETs. | | | |

| Year | 1% | 2% | 3% | 4% | 5% | 6% | 7% | 8% | 9% | 10% | 11% | 12% | 13% | 14% |
|------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 1 | 0.990 | 0.980 | 0.971 | 0.971 | 0.962 | 0.952 | 0.943 | 0.943 | 0.935 | 0.935 | 0.925 | 0.925 | 0.915 | 0.915 |
| 2 | 0.980 | 0.961 | 0.961 | 0.942 | 0.942 | 0.942 | 0.943 | 0.943 | 0.943 | 0.943 | 0.943 | 0.943 | 0.943 | 0.943 |
| 3 | 0.971 | 0.971 | 0.971 | 0.971 | 0.971 | 0.971 | 0.971 | 0.971 | 0.971 | 0.971 | 0.971 | 0.971 | 0.971 | 0.971 |
| 4 | 0.961 | 0.924 | 0.888 | 0.837 | 0.837 | 0.790 | 0.747 | 0.747 | 0.747 | 0.747 | 0.747 | 0.747 | 0.747 | 0.747 |
| 5 | 0.951 | 0.906 | 0.863 | 0.822 | 0.822 | 0.792 | 0.763 | 0.735 | 0.735 | 0.735 | 0.735 | 0.735 | 0.735 | 0.735 |
| 6 | 0.942 | 0.888 | 0.888 | 0.837 | 0.837 | 0.790 | 0.747 | 0.713 | 0.713 | 0.713 | 0.713 | 0.713 | 0.713 | 0.713 |
| 7 | 0.933 | 0.853 | 0.871 | 0.813 | 0.813 | 0.760 | 0.711 | 0.711 | 0.711 | 0.711 | 0.711 | 0.711 | 0.711 | 0.711 |
| 8 | 0.923 | 0.853 | 0.853 | 0.789 | 0.789 | 0.731 | 0.677 | 0.677 | 0.677 | 0.677 | 0.677 | 0.677 | 0.677 | 0.677 |
| 9 | 0.914 | 0.837 | 0.837 | 0.766 | 0.766 | 0.703 | 0.645 | 0.645 | 0.645 | 0.645 | 0.645 | 0.645 | 0.645 | 0.645 |
| 10 | 0.905 | 0.820 | 0.820 | 0.744 | 0.744 | 0.676 | 0.614 | 0.592 | 0.592 | 0.592 | 0.592 | 0.592 | 0.592 | 0.592 |
| 11 | 0.896 | 0.804 | 0.804 | 0.722 | 0.722 | 0.650 | 0.585 | 0.527 | 0.527 | 0.527 | 0.527 | 0.527 | 0.527 | 0.527 |
| 12 | 0.887 | 0.788 | 0.773 | 0.681 | 0.681 | 0.601 | 0.530 | 0.471 | 0.471 | 0.471 | 0.471 | 0.471 | 0.471 | 0.471 |
| 13 | 0.879 | 0.773 | 0.681 | 0.701 | 0.701 | 0.625 | 0.557 | 0.497 | 0.497 | 0.497 | 0.497 | 0.497 | 0.497 | 0.497 |
| 14 | 0.870 | 0.758 | 0.661 | 0.601 | 0.601 | 0.530 | 0.469 | 0.415 | 0.415 | 0.415 | 0.415 | 0.415 | 0.415 | 0.415 |
| 15 | 0.861 | 0.743 | 0.642 | 0.577 | 0.577 | 0.505 | 0.441 | 0.388 | 0.388 | 0.388 | 0.388 | 0.388 | 0.388 | 0.388 |
| 16 | 0.853 | 0.728 | 0.623 | 0.534 | 0.534 | 0.481 | 0.417 | 0.362 | 0.362 | 0.362 | 0.362 | 0.362 | 0.362 | 0.362 |
| 17 | 0.844 | 0.714 | 0.605 | 0.513 | 0.513 | 0.436 | 0.371 | 0.317 | 0.317 | 0.317 | 0.317 | 0.317 | 0.317 | 0.317 |
| 18 | 0.836 | 0.700 | 0.587 | 0.494 | 0.494 | 0.416 | 0.350 | 0.296 | 0.296 | 0.296 | 0.296 | 0.296 | 0.296 | 0.296 |
| 19 | 0.828 | 0.686 | 0.570 | 0.475 | 0.475 | 0.396 | 0.331 | 0.277 | 0.277 | 0.277 | 0.277 | 0.277 | 0.277 | 0.277 |
| 20 | 0.820 | 0.673 | 0.554 | 0.475 | 0.475 | 0.396 | 0.331 | 0.277 | 0.277 | 0.277 | 0.277 | 0.277 | 0.277 | 0.277 |
| 21 | 0.812 | 0.658 | 0.534 | 0.455 | 0.455 | 0.375 | 0.310 | 0.256 | 0.256 | 0.256 | 0.256 | 0.256 | 0.256 | 0.256 |
| 22 | 0.804 | 0.642 | 0.513 | 0.433 | 0.433 | 0.354 | 0.289 | 0.235 | 0.235 | 0.235 | 0.235 | 0.235 | 0.235 | 0.235 |
| 23 | 0.796 | 0.626 | 0.492 | 0.412 | 0.412 | 0.333 | 0.268 | 0.214 | 0.214 | 0.214 | 0.214 | 0.214 | 0.214 | 0.214 |
| 24 | 0.788 | 0.606 | 0.471 | 0.391 | 0.391 | 0.311 | 0.246 | 0.192 | 0.192 | 0.192 | 0.192 | 0.192 | 0.192 | 0.192 |
| 25 | 0.780 | 0.610 | 0.478 | 0.375 | 0.375 | 0.295 | 0.231 | 0.176 | 0.176 | 0.176 | 0.176 | 0.176 | 0.176 | 0.176 |
| 26 | 0.772 | 0.602 | 0.428 | 0.341 | 0.341 | 0.267 | 0.202 | 0.147 | 0.147 | 0.147 | 0.147 | 0.147 | 0.147 | 0.147 |
| 27 | 0.764 | 0.594 | 0.391 | 0.301 | 0.301 | 0.221 | 0.156 | 0.099 | 0.099 | 0.099 | 0.099 | 0.099 | 0.099 | 0.099 |
| 28 | 0.756 | 0.586 | 0.359 | 0.269 | 0.269 | 0.189 | 0.119 | 0.063 | 0.063 | 0.063 | 0.063 | 0.063 | 0.063 | 0.063 |
| 29 | 0.748 | 0.578 | 0.338 | 0.248 | 0.248 | 0.168 | 0.098 | 0.042 | 0.042 | 0.042 | 0.042 | 0.042 | 0.042 | 0.042 |
| 30 | 0.742 | 0.552 | 0.412 | 0.308 | 0.308 | 0.221 | 0.174 | 0.131 | 0.131 | 0.131 | 0.131 | 0.131 | 0.131 | 0.131 |
| 31 | 0.734 | 0.535 | 0.291 | 0.191 | 0.191 | 0.110 | 0.069 | 0.040 | 0.040 | 0.040 | 0.040 | 0.040 | 0.040 | 0.040 |
| 32 | 0.726 | 0.517 | 0.271 | 0.171 | 0.171 | 0.090 | 0.057 | 0.036 | 0.036 | 0.036 | 0.036 | 0.036 | 0.036 | 0.036 |
| 33 | 0.718 | 0.499 | 0.251 | 0.151 | 0.151 | 0.070 | 0.041 | 0.021 | 0.021 | 0.021 | 0.021 | 0.021 | 0.021 | 0.021 |
| 34 | 0.710 | 0.481 | 0.231 | 0.131 | 0.131 | 0.050 | 0.029 | 0.019 | 0.019 | 0.019 | 0.019 | 0.019 | 0.019 | 0.019 |
| 35 | 0.706 | 0.500 | 0.355 | 0.223 | 0.223 | 0.130 | 0.094 | 0.068 | 0.068 | 0.068 | 0.068 | 0.068 | 0.068 | 0.068 |
| 36 | 0.698 | 0.453 | 0.307 | 0.208 | 0.208 | 0.142 | 0.097 | 0.067 | 0.067 | 0.067 | 0.067 | 0.067 | 0.067 | 0.067 |
| 37 | 0.690 | 0.434 | 0.297 | 0.197 | 0.197 | 0.097 | 0.059 | 0.039 | 0.039 | 0.039 | 0.039 | 0.039 | 0.039 | 0.039 |
| 38 | 0.682 | 0.415 | 0.287 | 0.187 | 0.187 | 0.087 | 0.051 | 0.032 | 0.032 | 0.032 | 0.032 | 0.032 | 0.032 | 0.032 |
| 39 | 0.674 | 0.396 | 0.277 | 0.177 | 0.177 | 0.077 | 0.049 | 0.030 | 0.030 | 0.030 | 0.030 | 0.030 | 0.030 | 0.030 |
| 40 | 0.672 | 0.453 | 0.307 | 0.208 | 0.208 | 0.142 | 0.097 | 0.067 | 0.067 | 0.067 | 0.067 | 0.067 | 0.067 | 0.067 |
| 41 | 0.664 | 0.396 | 0.277 | 0.177 | 0.177 | 0.077 | 0.049 | 0.030 | 0.030 | 0.030 | 0.030 | 0.030 | 0.030 | 0.030 |
| 42 | 0.656 | 0.377 | 0.267 | 0.167 | 0.167 | 0.067 | 0.041 | 0.022 | 0.022 | 0.022 | 0.022 | 0.022 | 0.022 | 0.022 |
| 43 | 0.648 | 0.358 | 0.257 | 0.157 | 0.157 | 0.057 | 0.039 | 0.020 | 0.020 | 0.020 | 0.020 | 0.020 | 0.020 | 0.020 |
| 44 | 0.640 | 0.340 | 0.247 | 0.147 | 0.147 | 0.047 | 0.031 | 0.012 | 0.012 | 0.012 | 0.012 | 0.012 | 0.012 | 0.012 |
| 45 | 0.632 | 0.321 | 0.237 | 0.137 | 0.137 | 0.037 | 0.029 | 0.010 | 0.010 | 0.010 | 0.010 | 0.010 | 0.010 | 0.010 |
| 46 | 0.624 | 0.302 | 0.227 | 0.127 | 0.127 | 0.027 | 0.020 | 0.008 | 0.008 | 0.008 | 0.008 | 0.008 | 0.008 | 0.008 |
| 47 | 0.616 | 0.283 | 0.217 | 0.117 | 0.117 | 0.017 | 0.019 | 0.006 | 0.006 | 0.006 | 0.006 | 0.006 | 0.006 | 0.006 |
| 48 | 0.608 | 0.264 | 0.207 | 0.107 | 0.107 | 0.007 | 0.019 | 0.005 | 0.005 | 0.005 | 0.005 | 0.005 | 0.005 | 0.005 |
| 49 | 0.600 | 0.245 | 0.197 | 0.097 | 0.097 | 0.007 | 0.019 | 0.004 | 0.004 | 0.004 | 0.004 | 0.004 | 0.004 | 0.004 |
| 50 | 0.592 | 0.226 | 0.187 | 0.087 | 0.087 | 0.004 | 0.019 | 0.003 | 0.003 | 0.003 | 0.003 | 0.003 | 0.003 | 0.003 |

Table C: Present Value factor of a lump sum (PVF) of Re 1

(Contd.)

Table C: Present Value factor of Lump Sum (PVL) of Re 1

| Year | 15% | 16% | 17% | 18% | 19% | 20% | 21% | 22% | 23% | 24% | 25% | 30% | 35% | 40% |
|------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|-------|
| 1 | 0.870 | 0.862 | 0.855 | 0.847 | 0.840 | 0.833 | 0.826 | 0.820 | 0.813 | 0.806 | 0.800 | 0.769 | 0.741 | 0.714 |
| 2 | 0.756 | 0.743 | 0.731 | 0.718 | 0.706 | 0.694 | 0.683 | 0.672 | 0.661 | 0.650 | 0.640 | 0.592 | 0.549 | 0.510 |
| 3 | 0.658 | 0.641 | 0.624 | 0.609 | 0.593 | 0.579 | 0.564 | 0.551 | 0.537 | 0.524 | 0.512 | 0.455 | 0.406 | 0.364 |
| 4 | 0.572 | 0.552 | 0.534 | 0.516 | 0.499 | 0.482 | 0.467 | 0.451 | 0.437 | 0.423 | 0.410 | 0.350 | 0.301 | 0.260 |
| 5 | 0.497 | 0.476 | 0.456 | 0.436 | 0.419 | 0.402 | 0.386 | 0.370 | 0.355 | 0.341 | 0.328 | 0.269 | 0.223 | 0.186 |
| 6 | 0.432 | 0.410 | 0.390 | 0.370 | 0.352 | 0.335 | 0.319 | 0.303 | 0.289 | 0.275 | 0.241 | 0.194 | 0.144 | 0.094 |
| 7 | 0.376 | 0.354 | 0.333 | 0.314 | 0.296 | 0.279 | 0.263 | 0.249 | 0.235 | 0.222 | 0.210 | 0.159 | 0.122 | 0.095 |
| 8 | 0.327 | 0.305 | 0.285 | 0.266 | 0.249 | 0.233 | 0.218 | 0.204 | 0.191 | 0.179 | 0.168 | 0.123 | 0.091 | 0.068 |
| 9 | 0.284 | 0.263 | 0.243 | 0.227 | 0.209 | 0.194 | 0.180 | 0.167 | 0.155 | 0.144 | 0.134 | 0.094 | 0.067 | 0.048 |
| 10 | 0.247 | 0.227 | 0.208 | 0.191 | 0.176 | 0.162 | 0.149 | 0.137 | 0.126 | 0.116 | 0.107 | 0.073 | 0.050 | 0.035 |
| 11 | 0.215 | 0.195 | 0.178 | 0.162 | 0.148 | 0.135 | 0.123 | 0.112 | 0.103 | 0.094 | 0.086 | 0.056 | 0.037 | 0.025 |
| 12 | 0.187 | 0.168 | 0.152 | 0.137 | 0.124 | 0.112 | 0.102 | 0.092 | 0.083 | 0.076 | 0.069 | 0.043 | 0.027 | 0.018 |
| 13 | 0.163 | 0.145 | 0.130 | 0.116 | 0.104 | 0.093 | 0.084 | 0.075 | 0.068 | 0.061 | 0.055 | 0.033 | 0.020 | 0.013 |
| 14 | 0.141 | 0.125 | 0.111 | 0.099 | 0.088 | 0.078 | 0.068 | 0.061 | 0.053 | 0.049 | 0.044 | 0.025 | 0.015 | 0.009 |
| 15 | 0.123 | 0.108 | 0.095 | 0.084 | 0.074 | 0.065 | 0.057 | 0.051 | 0.045 | 0.040 | 0.035 | 0.020 | 0.011 | 0.006 |
| 16 | 0.107 | 0.093 | 0.081 | 0.071 | 0.062 | 0.054 | 0.047 | 0.042 | 0.036 | 0.032 | 0.028 | 0.015 | 0.008 | 0.005 |
| 17 | 0.093 | 0.080 | 0.069 | 0.060 | 0.052 | 0.045 | 0.040 | 0.035 | 0.030 | 0.026 | 0.023 | 0.012 | 0.006 | 0.003 |
| 18 | 0.081 | 0.069 | 0.059 | 0.051 | 0.044 | 0.038 | 0.033 | 0.028 | 0.024 | 0.021 | 0.018 | 0.009 | 0.005 | 0.002 |
| 19 | 0.070 | 0.060 | 0.051 | 0.043 | 0.037 | 0.031 | 0.027 | 0.023 | 0.020 | 0.017 | 0.014 | 0.007 | 0.003 | 0.002 |
| 20 | 0.061 | 0.051 | 0.043 | 0.037 | 0.031 | 0.026 | 0.022 | 0.019 | 0.016 | 0.014 | 0.012 | 0.005 | 0.002 | 0.001 |
| 25 | 0.030 | 0.024 | 0.020 | 0.016 | 0.013 | 0.010 | 0.009 | 0.007 | 0.006 | 0.005 | 0.004 | 0.001 | 0.000 | 0.000 |
| 30 | 0.015 | 0.012 | 0.010 | 0.009 | 0.007 | 0.005 | 0.004 | 0.003 | 0.002 | 0.002 | 0.001 | 0.000 | 0.000 | 0.000 |
| 35 | 0.008 | 0.006 | 0.004 | 0.004 | 0.003 | 0.002 | 0.002 | 0.001 | 0.001 | 0.001 | 0.000 | 0.000 | 0.000 | 0.000 |
| 40 | 0.004 | 0.003 | 0.002 | 0.002 | 0.001 | 0.001 | 0.001 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |
| 50 | 0.001 | 0.001 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 | 0.000 |

Unit -I

1. Define Managerial Economics. Illustrate how it helps in solving managerial problems. **(or)**
Define Managerial Economics. Explain its nature and scope.
2. Explain how managerial economics is linked with financial accounting & management.
3. Demand concepts and its functions.
4. Elasticity of Demand and different types of elasticity of demand.
5. What is demand forecasting? Explain the different methods of demand forecasting.
6. What is demand analysis? Explain the factor influencing the demand for a product. What are the various factors that influence the demand for a computer?

Unit-II

7. Production function. cobb and douglas production function.
8. What are isoquants? Explain the features of Isoquants.
9. Discuss the economies of scale that accrue to a firm.
10. What cost concepts are mainly used for management decision.
11. Define BEP. How do you determine it? Show graphical presentation of Break Even Analysis.
12. BEP Examples.

Unit-III

13. Explain the features of perfect competition. Explain how the price is determined in case of perfect competition.
14. Explain the features of oligopoly and monopolistic market competition.
15. Explain the various methods of pricing.
16. What do you mean by sole proprietorship? Explain its features. Evaluate (advantages and limitations) sole proprietorship.
17. What are the different kinds of partners.
18. Explain the steps in formation of Joint stock Company with advantages and Disadvantages of a joint stock company.

Unit-IV

19. Explain the various sources of finance.
20. Components of working capital. Factors determine the working capital requirements of a company.
21. Explain the various methods of capital budgeting.
22. Importance of capital budgeting. Steps involved in evaluating capital budgeting proposals.
23. Problems related to: **Pay Back period, ARR, NPV, PI** and Internal Rate of Return.

Unit-V

24. Concept of Financial Statement Analysis. Importance and Limitations.
25. Accounting Principles (Concepts (8) and Conventions (4)).
26. Accounting Process and Rules of accounting or Types of accounts.
27. Ratio analysis and Importance and limitations of ratio analysis.
28. Examples in **writing entries in journal and Ratio (5 Only)**

- 1. Commenced business, 2.Cash purchases, 3.Credit purchases, 4.Cash sales, 5.Credit sales,**
- 6. Purchased furniture, 7.Sold furniture, 8.Drawings (cash/goods drawn for personal use)**
- 9. Discount/Commission/ Interest Received, 10.Discount/Commission/ Interest paid**
- 11. Salaries paid, Rent paid, 12.Outstanding Salaries 13.Cash deposited at bank.**

Journal Entries in the Books of ABC Company.

| Date | Particulars | LF | Debit Amount | Credit Amount |
|------|--|----|--------------|---------------|
| 1 | Cash a/c Dr To Capital a/c (Being Commencement of Business) | | **** | **** |
| 2 | Purchases Dr To Cash a/c (Being Cash Purchases) | | **** | **** |
| 3 | Purchases a/c Dr To Person a/c (Being purchased on Credit) | | **** | **** |
| 4 | Cash a/c Dr To Sales a/c (Being cash Sales) | | **** | **** |
| 5 | Person a/c Dr To Sales a/c (Being cash Sales) | | **** | **** |
| 6 | Purchases(Furniture)a/c Dr To Cash a/c (Being Furniture Purchased) | | **** | **** |
| 7 | Cash a/c Dr To (Sales)Furniture a/c (Being Furniture sold) | | **** | **** |
| 8 | Drawing a/c Dr To Cash/ Product a/c (Being Drawings) | | **** | **** |
| 9 | Cash a/c Dr To Discount/interest a/c (Being Dis./Inter./Comm. received) | | **** | **** |
| 10 | Discount/Interest a/c Dr To Cash a/c (Being Dis./Inter./Comm. Paid) | | **** | **** |
| 11 | Salary/Rent/ Expenses a/c Dr To Cash a/c (Being Expenses Paid) | | **** | **** |
| 12 | Salary a/c Dr To Outstanding salary a/c (Being out standing salary) | | **** | **** |
| 13 | Bank a/c Dr To Cash a/c (Being cash deposited in bank) | | **** | **** |
| 14 | Cash a/c Dr To Bank a/c (Being cash Withdrawn from bank) | | **** | **** |

Q: Rules of accounting or Types of accounts

Ans: Types of Accounts are three.

1. Personal Account

Rule: **DEBIT** the Receiver
CREDIT the Giver

2. Real Account

Rule: **DEBIT** what comes in
CREDIT what goes out

3. Nominal Account

Rule: **DEBIT** All Expenses and Losses
CREDIT All Incomes and Gains

Example in Ratio Analysis:**Q: From the following Calculate 1.Current Ratio, 2.Quick Ratio and 3. Debt Equity Ratio**

| Liabilities | Amount | Assets | Amount |
|----------------------|--------|-------------------|--------|
| Equity Capital | 100000 | Land & Buildings | 120000 |
| Debentures | 50000 | Furniture | 80000 |
| Bank Loan | 150000 | Fixtures | 60000 |
| Creditors | 20000 | Stock / Inventory | 30000 |
| Bills Payables | 30000 | Debtors | 25000 |
| Bank Overdraft | 15000 | Cash/Bank Balance | 45000 |
| Outstanding Expenses | 5000 | Advance Payments | 10000 |
| | 370000 | | 370000 |

Ans:

1. Current Ratio = Current Assets/ Current Liabilities

$$\begin{aligned} \text{Current Assets} &= \text{Stock} + \text{Debtors} + \text{Cash} + \text{Adv. Payments} \\ &= 30000 + 25000 + 45000 + 10000 = 110000 \end{aligned}$$

$$\begin{aligned} \text{Current Liabilities} &= \text{Creditors} + \text{Bills Payables} + \text{Bank Overdraft} + \text{Outstanding Exp.} \\ &= 20000 + 30000 + 15000 + 5000 = 70000 \end{aligned}$$

$$\text{Current Ratio} = 110000 / 70000 = 1.54$$

2. Quick Ratio = Quick Assets / Current Liabilities

$$\begin{aligned} \text{Quick Assets} &= \text{Cash} + \text{Debtors} + \text{Adv. Payments} \\ &= 45000 + 25000 + 10000 = 80000 \\ \text{Quick Ratio} &= 80000 / 70000 = 1.12 \end{aligned}$$

3. Debt Equity Ratio= Outsiders fund / Owner's fund (Equity Capital)

$$\begin{aligned} \text{Outsiders Fund} &= \text{Debentures} + \text{Bank Loan} \\ &= 50000 + 150000 = 200000 \\ \text{Owner's Fund} &= 100000 \end{aligned}$$

$$\text{Debt Equity Ratio} = 200000 / 100000 = 2$$

4. Gross Profit Ratio = Gross Profit/Sales**5. Net Profit Ratio = Net Profit / Sales**

$$\begin{aligned} \text{Sales} - \text{Cost of Sales} &= \text{Gross Profit} \\ \text{Sales} - \text{all Costs (Expenses)} &= \text{Net Profit} \end{aligned}$$

II MID Question Paper Pattern

20 Objective Questions (Answer All Question) = 10 Marks
6 Long Questions (Answer 3 Questions) = 30 Marks

Chapter -3 (6 Objective Questions)

(2 Long Answer Questions) – 1. Break Even Analysis

Chapter -4 (7 Objective Questions)

(2 Long Answer Questions) – 1. Journal Entries

Chapter -5 (7 Objective Questions)

(2 Long Answer Questions) - 1. Ratios