

INTERMEDIATE COURSE

GROUP – II

REVISION TEST PAPERS

SEPTEMBER, 2026



BOARD OF STUDIES (ACADEMIC)
THE INSTITUTE OF CHARTERED ACCOUNTANTS OF INDIA
(Set up by an Act of Parliament)
New Delhi

©THE INSTITUTE OF CHARTERED ACCOUNTANTS OF INDIA

All rights reserved. No part of this publication may be reproduced, stored in a retrieval system, or transmitted, in any form, or by any means, electronic, mechanical, photocopying, recording, or otherwise, without prior permission, in writing, from the publisher.

Edition : July, 2026

Website : www.icaai.org

E-mail : bosnoida@icaai.in

Department/Committee : Board of Studies (Academic)

Price :

ISBN No. :

Published by : The Publication Directorate on behalf of
The Institute of Chartered Accountants of India,
ICAI Bhawan, Post Box No. 7100, Indraprastha
Marg, New Delhi- 110 002, India.

Typeset and designed at Board of Studies (A).

Printed by :

Contents

	<i>Page Nos.</i>
<i>Objective & Approach</i>	<i>i –vii</i>
<i>Objective of Revision Test Paper</i>	<i>i</i>
<i>Planning & Preparing for Examination</i>	<i>ii</i>
<i>Subject-wise Applicability</i>	<i>iii</i>
 <i>Paper-wise RTPs</i>	
Paper 4: Cost and Management Accounting.....	1 – 49
Paper 5: Auditing and Ethics	50 – 73
Paper 6: Financial Management and Strategic Management	74 – 115

REVISION TEST PAPER, SEPTEMBER, 2026– OBJECTIVE & APPROACH

(Students are advised to go through the following paragraphs carefully to derive maximum benefit out of this RTP)

I. Objective of Revision Test Paper

Revision Test Papers are one among the many educational inputs provided by the Board of Studies (Academic) to its students. Popularly referred to as RTP by the students, it is one of the very old publications of the BOS(A) whose significance and relevance from the examination perspective has stood the test of time.

The primary objectives of the RTP are:

- To help students get an insight of their preparedness for the forthcoming examination;
- To update them on the latest developments relevant for the forthcoming examination in select subjects;
- To enhance the confidence level of the students adequately.

Students must bear in mind that the RTP contains a variety of questions based on different topics of the syllabi and thus a comprehensive study of the entire syllabus is a pre-requisite before answering the questions of the RTP. In other words, in order to derive maximum benefit out of the RTPs, it is advised that before proceeding to solve the questions given in the RTP, students ought to have thoroughly read the Study Materials and Statutory Update, wherever applicable.

The topics on which the questions are set herein have been carefully selected and meticulous attention has been paid in framing different types of questions. Detailed answers are provided to enable the students to do a self-assessment and have a focused approach for effective preparation.

Live Virtual Classes by renowned subject experts conducted free of charge for the students of Foundation, Intermediate and Final levels provide the students much required support in preparing for their exams conveniently at home as these classes can be accessed live or viewed later as recorded lectures through hand-held devices such as smart phones, laptops, I-pads, tablets, etc. anytime anywhere. Further,

students are advised to attempt the Multiple-Choice Questions (MCQs) at MCQ Paper Practice Portal which is a holistic platform for self-assessment within the stipulated timeframe.

Students are welcome to send their suggestions for fine tuning the RTP to the Joint Director, Board of Studies (Academic), The Institute of Chartered Accountants of India, A-29, Sector-62, Noida 201309 (Uttar Pradesh). RTP is also available on BOS Knowledge Portal at <https://boslive.icaai.org> for downloading.

II. Planning and preparing for examination

Ideally, when the RTP reaches your hand, you must have finished reading the relevant Study Materials of all the subjects available at the BoS Knowledge Portal. Get a good grasp of the concepts/ provisions/ amendments/ cases discussed therein.

After reading the Study Materials alongwith Statutory Update thoroughly, then, proceed to solve the questions given in the RTP on your own. RTP is an effective tool to revise and refresh the concepts and provisions discussed in the Study Material. RTPs are provided to you to help you assess your level of preparation. Hence you must solve the questions given therein on your own and thereafter compare your answers with the answers given therein.

Examination tips

How well a student fares in the examination depends upon the level and depth of his preparation. However, there are certain important points which can help a student better his performance in the examination. These useful tips are given below:

- Reach the examination hall well in time.
- As soon as you get the question paper, read it carefully and thoroughly. You are given separate 15 minutes for reading the question paper.
- Plan your time so that appropriate time is awarded for each question.

- First impression is the last impression. The question which you can answer in the best manner should be attempted first.
- Always attempt to do all questions. Therefore, it is important that you must finish each question within allocated time. Keep sometime for checking the answers as well.
- Read the question carefully more than once before starting the answer to understand very clearly as to what is required.
- Answer all parts of a question one after the other; do not answer different parts of the same question at different places.
- Write in a neat and legible hand-writing.
- Always be concise and write to the point and do not try to fill pages unnecessarily.
- There must be logical expression of the answer.
- In case a question is not clear, you may state your assumptions and then answer the question.
- Check your answers carefully and underline important points before leaving the examination hall.
- In case of case scenario based MCQs, read the facts given in the case attentively. Also, read each MCQ based thereon and all the options carefully, before choosing the correct answer.

III. Subject-wise Applicability

PAPER – 4: COST AND MANAGEMENT ACCOUNTING

The Revision Test Paper (RTP) of Cost and Management Accounting comprises two Divisions containing a total of 16 questions. Division A consists of Case Scenario based MCQs and Division B contains descriptive questions covering the entire syllabus. The RTP has been designed to provide comprehensive practice of both theoretical concepts and computational aspects of Cost and Management Accounting.

A summary of the questions both theoretical and computational has been given for your reference:

Q. No.	Topic	About the Problem
Division A		
1.	Overheads	Allocation of overheads, redistribution of service department expenses and job costing.
2.	Activity Based Costing (ABC) Method	Analysis of product profitability under conventional and ABC systems.
3.	Process Costing	Valuation of output using weighted average method.
4.	Marginal Costing	Calculation of additional units required to maintain operating income.
Division B		
5.	Material Costing	Calculation of EOQ, stock levels and quantity discount decision.
6.	Employee Cost	Calculation of labour cost under different incentive systems.
7.	Employee Cost and Direct Expenses	Calculation of direct expenses.
8.	Cost Sheet	Preparation of Cost Sheet.
9.	Cost Accounting Systems	Preparation of Costing and Financial Profit & Loss Accounts and Reconciliation Statement.
10.	Job and Batch Costing	Calculation of batch cost, profitability and Economic Batch Quantity.
11.	Process Costing	Preparation of Process Accounts and Equivalent Production Statement.
12.	Joint Product and By-product	Apportionment of joint cost.
13.	Service Costing	Calculation of cost per passenger-kilometre.

14.	Standard Costing and Budgetary Control	Preparation of budgets and calculation of variances.
15.	Marginal Costing	Analysis of product mix and replacement decision.
16.(a)	Introduction to Cost and Management Accounting	Installation of costing system and practical difficulties.
16.(b)	Introduction to Cost and Management Accounting	Types of costs.
16.(c)	Budget and Budgetary Control	Steps involved in budgetary control.
16.(d)	Activity Based Costing (ABC) Method	Cost drivers for different cost pools.

PAPER – 5: AUDITING AND ETHICS

The Revisionary Test Paper (RTP) is a tool to refresh your knowledge which you have acquired while doing your conceptual study from Study Material and other modes of knowledge like BoS Live Learning Classes, Webinars, Saransh – Last Mile Referencer, Case Scenarios Booklet, Model Test Papers, Students' Journal, Bare Acts etc.

RTP of Auditing and Ethics for September, 2026 comprises twenty questions, including case scenario-based multiple-choice questions, independent multiple choice questions, and descriptive questions. These questions cover the entire syllabus, which is divided into eleven chapters as discussed in the study material.

These 20 questions are taken from different topics like Nature, Objective and Scope of Audit, Audit Strategy, Audit Planning and Audit Program, Risk Assessment and Internal Control, Audit Evidence, Audit of Items of Financial Statements, Audit Documentation, Completion and Review, Audit Report, Special Features of Audit of Different Type of Entities, Audit of Banks and Ethics and Terms of Audit Engagements. The chapter's name is clearly indicated before each question. The questions in the RTP have been arranged in the same sequence as prescribed in the study material to facilitate easy revision by the students. An attempt has been made to cover the syllabus comprehensively.

PAPER – 6: FINANCIAL MANAGEMENT AND STRATEGIC MANAGEMENT**Section – A: Financial Management**

The Revision Test Paper (RTP) of Financial Management comprises of two Divisions of total 10 questions: Division A (Case scenario based MCQs) which contains 1 case scenario and 2 caselets and Division B (Descriptive questions) which contains 7 questions for full coverage of the syllabus. Theoretical questions along with computational problems have also been incorporated so that you are able to give emphasis to the theoretical portion of the syllabus as well. Since this paper's inclination is more towards numerical-oriented questions which involve mathematical calculations, therefore, it is very important that you have thoroughly studied the theoretical aspects of the subject and are also clear about the concepts and logic behind the mathematical workings and formulae.

A summary of the questions both theoretical and computational has been given for your reference:

Q. No.	Topic	About the Problem
Division A		
1.	Cost of Capital	Weighted average cost of capital
2.	Leverage	Calculation of Sales
3.	Ratio Analysis	Creditors Turnover Ratio
Division B		
4.	Ratio Analysis	Preparation of Financial Statement.
5.	Leverage	Calculation of important financial vitals.
6.	Dividend Decision	Calculation of current market price.
7.	Investment Decision	Ranking of capital budgeting decisions.
8.	Working Capital	Determination of Effective cost of Factoring.
9.	Cash Budget	Preparation of Cash Budget
10(a)	Introduction	Importance of Financial Management.
10(b)	Types of Financing	Foreign Bonds.
10(c)	Working Capital	Working capital requirements.

Section – B: Strategic Management

The Revision Test Paper on the subject of Strategic Management for the September 2026 examination contains sixteen questions. The questions have been selected from all the sections/chapters uniformly to cover whole syllabus. Questions are based on different skill levels, i.e., "Comprehension & Knowledge" as well as "Analysis & Application".

The questions included are of different categories – multiple choice questions based on case scenario and application based multiple choice questions, distinguish between, short notes, descriptive and questions based on practical scenarios. The first question contains multiple choice questions based on case scenario are subdivided into five different parts. Questions from two to six are application based multiple choice questions. All multiple-choice questions are given with four alternatives and the student has to opt for the correct option. Subsequently, ten different questions have been included to cover all the five chapters of the syllabus. Chapter names have been mentioned before questions. A descriptive question based on practical scenario has been included from each section. Another descriptive question has also been included from each section of the syllabus.

The students should take up this Revision test paper as a tool to check their preparedness in the subject. Mere reading of Revision Test Paper will not be helpful. To properly self-assess the preparation in the subject, students must attempt the questions on their own. Compare your answers with the suggested answers and hints given to assess the level of preparation and identify areas where more focus is required. Then you may work on these areas to improve the quality of answers that you write.

Work hard and perform well in the examination!



PAPER – 4: COST AND MANAGEMENT ACCOUNTING



QUESTIONS

PART I - Case Scenario based MCQs

Case Scenarios

1. Apex Mobility Systems Ltd. manufactures smart airport luggage carts used in major international airports. The company operates a centralized factory with two production departments—Fabrication and Assembly, and two service departments—Stores and Maintenance.

Due to rising operational costs and increased competition, management has decided to analyze overhead allocation and costing accuracy for better pricing and profitability decisions.

For the financial year ending 31st March 2026, the following budgeted data is available:

Allocated Overhead Costs (₹)

Department	Amount (₹)
Fabrication	18,20,000
Assembly	9,60,000
Stores	3,00,000
Maintenance	2,40,000

Other Overheads (₹)

Particulars	Amount (₹)
Factory Rent	18,00,000
Building Insurance	2,00,000
Plant Insurance	2,40,000
Depreciation on Machinery	3,20,000
Canteen Subsidy	5,00,000

Direct Costs (₹)

Department	Material (₹)	Labour (₹)	Total (₹)
Fabrication	75,00,000	10,00,000	85,00,000
Assembly	2,00,000	15,00,000	17,00,000

Additional Information

Basis	Fabrication	Assembly	Stores	Maintenance
Floor area (sq. m.)	30,000	12,000	3,000	5,000
Plant value (₹)	20,00,000	10,00,000	1,00,000	2,00,000
Store requisitions	4,000	2,000	—	—
Maintenance hours	3,000	2,500	500	—
No. of employees	150	100	40	20
Machine hours	35,00,000	80,000	—	—
Labour hours	80,000	30,00,000	—	—

The company also received a **special job order (Job No. AMS-101)** with the following details:

- Direct Material = ₹ 1,50,000
- Direct Labour:
 - Fabrication: 300 hours @ ₹ 20/hr
 - Assembly: 200 hours @ ₹ 20/hr

- Machine hours:
 - Fabrication: 250 hours
 - Assembly: 180 hours

You are required to answer the following questions:

- (i) Total overhead allocated from Stores Department to production Department is:
 - (A) ₹ 2,53,099
 - (B) ₹ 5,43,669
 - (C) ₹ 5,06,197
 - (D) ₹ 5,01,486
- (ii) Total overhead allocated from Maintenance Department to other Department is:
 - (A) ₹ 5,43,669
 - (B) ₹ 5,01,486
 - (C) ₹ 5,06,197
 - (D) ₹ 42,186
- (iii) Most appropriate overhead recovery rate for Fabrication Department is:
 - (A) ₹ 1.21 per machine hour
 - (B) ₹ 12 per machine hour
 - (C) ₹ 20 per machine hour
 - (D) ₹ 4.56 per machine hour
- (iv) Most appropriate overhead recovery rate for Assembly Department is:
 - (A) ₹ 18 per labour hour
 - (B) ₹ 2.50 per labour hour
 - (C) ₹ 20 per labour hour
 - (D) ₹ 0.71 per labour hour

(v) Full production cost of Job No. AMS-101 is:

- (A) ₹ 2,20,000
- (B) ₹ 2,50,099
- (C) ₹ 1,60,445
- (D) ₹ 3,62,525

2. NutritionCrunch Pvt. Ltd. is a fast-growing company in the health food industry, specializing in the production of nutritious snack bars. The company manufactures three popular variants—Alpha, Beta, and Gamma—in a fully automated production facility.

Due to increasing competition and pressure on margins, management has become concerned that the existing conventional costing system, which allocates overheads simply based on units sold, may not be accurately reflecting the true cost and profitability of each product.

To improve cost accuracy, the company is considering the adoption of an Activity-Based Costing (ABC) system, which allocates overheads based on actual resource consumption such as inspection hours, machine usage, and special activities like packaging and advertising.

The following data has been compiled for analysis for one month:

Overheads (Per Month)

- Inspection Cost = ₹ 84,000
- Machine Repairs & Maintenance = ₹ 1,56,000
- Mold (Dye) Cost = ₹ 14,500
- Total Selling Overheads = ₹ 1,80,000

Product Data

Particulars	Alpha	Beta	Gamma
Prime Cost per unit (₹)	14	10	9
Selling Price per unit (₹)	22	16	13
Units per Production Run	2,440	3,020	3,220
Defective Units per Run	40	20	20

Inspection Hours per Run	2	5	3
Mold Cost per Run (₹)	300	400	350
Machine Hours per Run	25	15	35
Units Sold per Month	24,000	60,000	32,000

The following Additional Information is provided:

1. The company follows a just-in-time approach, meaning all non-defective units produced are sold during the same month. There is no opening or closing inventory.
2. Under the current system, all production and selling overheads are allocated purely based on the number of units sold, without considering the actual consumption of resources by each product.
3. Out of total selling overheads, ₹ 90,000 relates to advertising expenses, which are incurred only for Beta and Gamma, as these products face stiff competition in the market.
4. Alpha does not require advertising due to its established demand.
5. Product Beta requires special packaging to maintain its competitive position.
6. A cost of ₹ 60,000 per month is incurred exclusively for this purpose and is included in the total selling overheads.

As a production cum finance manager of the company, you are required to answer the following questions:

- (i) What is the total combined gross margin of all the products?
 - (A) ₹ 6,12,000
 - (B) ₹ 6,48,500
 - (C) ₹ 6,30,000
 - (D) ₹ 6,68,600
- (ii) What is the total prime cost excluding cost of defective for all the products?
 - (A) ₹ 19,18,000

- (B) ₹ 12,16,000
 (C) ₹ 12,24,000
 (D) ₹ 10,10,000
- (iii) Ranking of Products under Conventional System is:
 (A) Beta – I, Alpha – II, Gamma – III
 (B) Alpha – I, Beta – II, Gamma – III
 (C) Beta – I, Gamma – II, Alpha – III
 (D) Gamma – I, Beta – II, Alpha – III
- (iv) What is the total net profit for all the products:
 (A) ₹ 2,34,100
 (B) ₹ 2,28,000
 (C) ₹ 2,04,000
 (D) ₹ 1,98,000
- (v) Ranking of Products under ABC System is:
 (A) Alpha – I, Beta – II, Gamma – III
 (B) Beta – I, Alpha – II, Gamma – III
 (C) Alpha – I, Gamma – II, Beta – III
 (D) Gamma – I, Beta – II, Alpha – III
3. Kanika Ltd. has furnished the following information pertaining to its process account for the month of March 2026:

Value of opening work-in-process	₹ 10,020
Cost incurred during the month	₹ 1,14,180
Finished goods units	1665
Closing work-in-process	150

Closing work-in-process is completed to the extent of 40%. Costs are incurred evenly throughout the month. The Company uses weighted average method for flow of costs.

What is the value of finished goods for the month of March 2026?

- (A) ₹ 1,19,880
 - (B) ₹ 1,25,000
 - (C) ₹ 1,24,200
 - (D) ₹ 98,500
4. The current selling price is ₹ 136 per unit. Variable costs are expected to increase from ₹ 76 to ₹ 82 per unit. Fixed costs of ₹ 5,32,000 will not change. How many additional units are required to be sold in the order to maintain an operating income of ₹ 3,45,500?
- (A) 1,500 units
 - (B) 1,462 units
 - (C) 1,625 units
 - (D) 1,250 units

PART - II Descriptive Questions

Material Cost

5. M/s Esha Materials Private Limited produces a product which names "ESS". The consumption of raw material for the production of "ESS" is 210 Kgs to 350 Kgs per week. Other information is as follows:

Procurement Time: 5 to 9 Days

Purchase price of Raw Materials: ₹ 100 per kg

Ordering Cost per Order: ₹ 200

Storage Cost: 1% per month plus ₹ 2 per unit per annum

Consider 365 days a year.

You are required to CALCULATE:

- (a) Economic Order Quantity

- (b) Re-Order Level (ROL)
- (c) Maximum Stock Level
- (d) Minimum Stock Level
- (e) Average Stock Level
- (f) Number of Orders to be placed per year
- (g) Total Inventory Cost
- (h) If the supplier is willing to offer 1% discount on purchase of total annual quantity in two orders, whether offer is acceptable?
- (i) If the answer is no, what should be the counteroffer w.r.t. percentage of discount?

Employee Cost and Direct Expenses

6. The existing incentive system of Alpha Limited is as under:

Normal working week	5 days of 8 hours each plus 3 late shifts of 3 hours each
Rate of Payment	Day work: ₹ 160 per hour Late shift: ₹ 225 per hour
Average output per operator for 49-hours week i.e. including 3 late shifts	240 articles

In order to increase output and eliminate overtime, it is decided to switch on to a system of payment by results. The following information is obtained:

Time-rate (as usual)	:	₹ 160 per hour
Basic time allowed for 15 articles	:	2.5 hours
Piece-work rate	:	Add: 20% to basic piece-rate
Premium Bonus	:	Add: 50% to time.

If during the last week 270 articles are produced in a 40-hour week.

Required:

- (i) CALCULATE weekly earnings, number of articles produced and labour cost per article for one operator under the following systems:
 - (a) Existing time-rate
 - (b) Straight piece-work
 - (c) Rowan system
 - (d) Halsey premium system
 - (ii) PREPARE a Statement showing hours worked, weekly earnings, number of articles produced and labour cost per article for one operator under the above systems.
7. The following expenditures were incurred in Aditya Ltd. For the month of March 20X8:

		Amount (₹)
(i)	Paid for power & fuel	4,80,200
(ii)	Wages paid to factory workers	8,44,000
(iii)	Bill paid to job workers	9,66,000
(iv)	Royalty paid for production	8,400
(v)	Fee paid to technician hired for the job	96,000
(vi)	Administrative overheads	76,000
(vii)	Commission paid to sales staffs	1,26,000

You are required to CALCULATE direct expenses for the month.

Cost Sheet

8. The following details are available from the books of Nova Manufacturing Ltd. for the year ending 31st March 2026:

Nova Manufacturing Ltd. produces high-precision metal components for industrial machinery. During the year, the company invested in new automation facilities, expanded factory supervision, and adopted new inventory control systems. The following data has been extracted from the cost accounting records:

Particulars	Amount (₹)
Purchase of raw materials	1,02,50,000
Consumable materials	6,20,000
Direct wages	72,40,000
Carriage inward	2,10,000
Wages to foreman and storekeeper	10,20,000
Other indirect wages to factory staff	1,95,000
Expenditure on research & development for new automation systems	12,80,000
Salary to accountants	8,40,000
Employer's contribution to EPF & ESI	9,00,000
Cost of power & fuel	33,20,000
Production planning office expenses	15,50,000
Salary to delivery staff	18,20,000
Income tax for the assessment year 2025–26	3,60,000
Fees to statutory auditor	2,20,000
Fees to cost auditor	1,10,000
Fees to independent directors	11,80,000
Factory maintenance & repairs	7,30,000
Depreciation on plant & machinery	9,20,000
Quality control department expenses	5,40,000
Office rent	11,50,000
Insurance on finished goods warehouse	3,40,000
Packing materials	4,80,000
Donation to State Disaster Relief Fund	1,50,000
Value of sales	3,48,90,000

Opening Inventories (as on 01-04-2025):

- Raw Materials: ₹ 8,10,000

- Work-in-Progress: ₹ 9,25,000
- Finished Goods: ₹ 16,90,000

Closing Inventories (as on 31-03-2026):

- Raw Materials: ₹ 5,90,000
- Work-in-Progress: ₹ 7,80,000
- Finished Goods: ₹ 12,40,000

During the year, 2,000 defective units were produced due to machine malfunction.

The abnormal loss (not includible in cost) amounted to ₹ 4,60,000 and the scrap value realized was ₹ 40,000.

From the above information, PREPARE a COST SHEET for the year ended 31st March 2026.

Cost Accounting Systems

9. The financial books of a company reveal the following data for the year ended 31st March, 2026:

	(₹)
Opening Stock:	
Finished goods 875 units	76,525
Work-in-process	33,000
01.04.2025 to 31.3.2026	
Raw materials consumed	7,84,000
Direct Labour	4,65,000
Factory overheads	2,65,000
Goodwill written off	95,000
Administration overheads	3,15,000
Interest paid	72,000
Bad Debts	21,000
Selling and Distribution Overheads	65,000

Interest received	18,500
Rent received	72,000
Sales 14,500 units	20,80,000
Closing Stock: Finished goods 375 units	43,250
Work-in-process	48,200

The cost records provide as under:

Factory overheads are absorbed at 60% of direct wages.

Administration overheads are recovered at 20% of factory cost.

Selling and distribution overheads are charged at ₹ 5 per unit sold.

Opening Stock of finished goods is valued at ₹ 105 per unit.

The company values work-in-process at factory cost for both Financial and Cost Profit Reporting.

Required:

- (i) Prepare statements for the year ended 31st March, 2026, show
 - the profit as per financial records
 - the profit as per costing records.
- (ii) Present a statement reconciling the profit as per costing records with the profit as per Financial Records.

Job & Batch Costing

10. Pintu Ltd. operates in beverages industry where it manufactures soft-drink in three sizes of Large (3 litres), Medium (1.5 litres) and Small (600 ml) bottles. The products are processed in batches. The 5,000 litres capacity processing plant consumes electricity of 90 Kilowatts per hour and a batch takes 1 hour 45 minutes to complete. Only symmetric size of products can be processed at a time. The machine set-up takes 15 minutes to get ready for next batch processing. During the set-up power consumption is only 20%.
 - (i) The current price of Large, Medium and Small are ₹ 150, ₹ 90 and ₹ 50 respectively.

- (ii) To produce a litre of beverage, 14 litres of raw material-W and 25 ml of Material-C are required which costs ₹ 0.50 and ₹ 1,000 per litre respectively.
- (iii) 20 direct workers are required. The workers are paid ₹ 880 for 8 hours shift of work.
- (iv) The average packing cost per bottle is ₹ 3
- (v) Power cost is ₹ 7 per Kilowatt -hour (Kwh)
- (vi) Other variable cost is ₹ 30,000 per batch.
- (vii) Fixed cost (Administration and marketing) is ₹ 4,90,00,000.
- (viii) The holding cost is ₹ 1 per bottle per annum.

The marketing team has surveyed the following demand (bottle) of the product:

Large	Medium	Small
3,00,000	7,50,000	20,00,000

You are required to CALCULATE profit/ loss per batch and also COMPUTE Economic Batch Quantity (EBQ).

Process Costing

11. A company produces a component, which passes through two processes. During the month of November, 2025, materials for 40,000 components were put into Process- I of which 30,000 were completed and transferred to Process- II. Those not transferred to Process- II were 100% complete as to materials cost and 50% complete as to labour and overheads cost. The Process- I costs incurred were as follows:

Direct Materials	₹ 3,00,000
Direct Wages	₹ 3,50,000
Factory Overheads	₹ 2,45,000

Of those transferred to Process II, 28,000 units were completed and transferred to finished goods stores. There was a normal loss with no salvage value of 200 units in Process II. There were 1,800 units, remained

unfinished in the process with 100% complete as to materials and 25% complete as regard to wages and overheads.

Costs incurred in Process-II are as follows:

Packing Materials	₹ 80,000
Direct Wages	₹ 71,125
Factory Overheads	₹ 85,350

Packing material cost is incurred at the end of the second process as protective packing to the completed units of production.

Required:

- (i) PREPARE Statement of Equivalent Production, Cost per unit and Process I A/c.
- (ii) PREPARE statement of Equivalent Production, Cost per unit and Process II A/c.

Joint Product and By-Product

12. A manufacturing unit producing Product X also generates a by-product Y, which undergoes additional processing to obtain the finished product. The details of the joint manufacturing costs are provided below:

Material	₹ 5,000
Labour	₹ 3,000
Overhead	₹ 2,000
	<u>₹ 10,000</u>

Subsequent cost in ₹ are given below:

	X	Y
Material	3,000	1,500
Labour	1,400	1,000
Overhead	600	500
	<u>5,000</u>	<u>3,000</u>

Selling prices are

X	₹ 16,000
Y	₹ 8,000

Estimated profit on selling prices is 25% for X and 20% for Y.

On the assumption that selling and distribution expenses are incurred in proportion to the respective sales values, distribute the joint manufacturing costs and prepare a statement indicating the cost of production of X and Y.

Service Costing

13. Royal Transport Services runs fleet of buses within the limits of Jaipur city. The following are the details which were incurred by the company during October, 2025:

	(₹)
Cost of each Bus	24,00,000
Garage Rent	1,00,000
Insurance	25,000
Road tax	20,000
Manager's Salary	60,000
Assistant's Salary (Two)	32,000 each
Supervisor's Salary (Three)	24,000 each
Driver's Salary (Twenty-Five)	20,000 each
Cleaner's Salary (Twenty)	5,000 each
Office Staff's Salary	1,00,000
Consumables	1,20,000
Repairs & Maintenance	90,000
Other Fixed Expenses	72,000
Diesel (10 Kms per Litre)	80 per litre
Oils & Lubricants	1,45,000
Tyres and tubes	35,000
Depreciation	10% p.a. on Cost

Other details are as below:

Capacity

12 Buses 60 Passengers

13 Buses 50 Passengers

Each bus makes 4 round trips a day covering a distance of 10 Kilometers in each trip (One Way) on an average. During the trips 80% of the seats are occupied. The annual records show that 5 buses are generally required to be kept away from roads each day for repairs.

You are required to CALCULATE cost per passenger-km.

Cost sheet to be prepared on the basis of 25 buses.

Standard Costing and Budget & Budgetary Control

14. ABC Manufacturing Ltd. is a medium-sized manufacturing company engaged in the production of a single industrial component used in engineering applications. In recent months, the company has experienced fluctuations in demand due to changing market conditions and increased competition.

In order to ensure better cost control, efficient utilization of resources, and improved planning, the management has decided to implement a detailed budgeting and standard costing system for the financial year 2025. The Cost Accountant of the company has been entrusted with the responsibility of preparing budgets and analyzing variances for performance evaluation.

You are provided with the following data relating to the first six months of the year 2025:

Sales Budget (Units)

Month	January	February	March	April	May	June
Units	12,000	13,500	15,000	16,500	17,000	18,500

The company follows a policy of maintaining finished goods inventory at the end of each month equal to 25% of the budgeted sales for the following month. The opening finished goods inventory as on

1st January 2025 was 3,000 units. There is no work-in-progress inventory at any point of time.

Each unit of finished product requires two types of materials as detailed below:

Material	Quantity per Unit	Rate per kg
Material A	5 kg	₹ 12
Material B	4 kg	₹ 18

The stock of raw materials on 1st January 2025 was:

- Material A: 25,000 kg
- Material B: 18,000 kg

The company maintains closing stock of raw materials at the end of each month equal to 60% of the next month's production requirement to avoid stock-outs and ensure uninterrupted production.

Direct Labour

Each unit of finished product requires 0.8 direct labour hours.

Based on past experience and wage agreements, the total budgeted direct labour cost for the first quarter of the year has been estimated at ₹ 15,36,000.

Actual data for the quarter one, ended on March 31, 2025 is as under:

Despite careful planning, actual results differed from estimates due to operational inefficiencies and changes in input prices.

Actual production: 42,000 units

Actual Material Consumption

Material	Quantity (kg)	Rate per kg
Material A	2,10,000	₹12.50
Material B	1,65,000	₹18.40

Actual Labour Data

- Actual hours worked: 35,000 hours
- Actual labour cost: ₹ 17,85,000

Required:

- (A) Prepare the following budgets:
1. Monthly production budget for the quarter January to March, 2025.
 2. Monthly raw material consumption quantity budget for January to April, 2025.
 3. Materials purchase quantity budget for the first quarter of the year 2025.
- (B) Calculate the following variances for the quarter ended 31st March, 2025:
1. Material Cost Variance
 2. Material Price Variance
 3. Material Usage Variance
 4. Labour Cost Variance
 5. Labour Rate Variance
 6. Labour Efficiency Variance

Marginal Costing

15. XYZ Limited manufactures three different products and the following information has been collected from the books of accounts:

	Products		
	A	B	C
Sales Mix	35%	35%	30%
Selling Price	₹ 30	₹ 40	₹ 20
Variable Cost	₹ 15	₹ 20	₹ 12
Total Fixed Costs			₹ 1,80,000
Total Sales			₹ 6,00,000

The company has currently under discussion, a proposal to discontinue the manufacture of Product C and replace it with Product P, when the following results are anticipated:

	Products		
	A	B	C
Sales Mix	50%	25%	25%
Selling Price	₹ 30	₹ 40	₹ 30
Variable Cost	₹ 15	₹ 20	₹ 15
Total Fixed Costs			₹ 1,80,000
Total Sales			₹ 6,40,000

Will you advise the company to change over to production of P? Give reasons for your answer.

Miscellaneous

16. (a) You have been asked to install a costing system in a manufacturing company. What practical difficulties will you expect and how will you propose to overcome the same?
- (b) State the types of cost in the following cases:
- Interest paid on own capital not involving any cash outflow.
 - Withdrawing money from bank deposit for the purpose of purchasing new machine for expansion purpose.
 - Rent paid for the factory building which is temporarily closed
 - Cost associated with the acquisition and conversion of material into finished product.
- (c) Describe the steps involved in the budgetary control technique.
- (d) Provide example(s) of the cost driver for the following cost pools:

Cost Pool
Quality Control
Research and Development
Machine Maintenance
Employee Training Costs
Customer Service



SUGGESTED ANSWERS

1. Working Note:

Table of Primary Distribution of Overheads and Direct Costs

Particulars	Basis of Apportionment	Total Amount	Production Department		Service Departments	
			Fabrication	Assembly	Stores	Maintenance
Overheads Allocated	Allocation	33,20,000	18,20,000	9,60,000	3,00,000	2,40,000
Direct Costs	Actual	1,02,00,000	85,00,000	17,00,000	---	---
Total			1,03,20,000	26,60,000	3,00,000	2,40,000

Other Overheads

Particulars	Basis	Total (₹)	Fabrication	Assembly	Stores	Maintenance
Factory Rent	Floor Area (30:12:3:5)	18,00,000	10,80,000	4,32,000	1,08,000	1,80,000
Building Insurance	Floor Area	2,00,000	1,20,000	48,000	12,000	20,000
Plant Insurance	Plant Value (20:10:1:2)	2,40,000	1,45,455	72,727	7,273	14,545
Depreciation	Plant Value	3,20,000	1,93,939	96,970	9,697	19,394
Canteen Subsidy	Employees (150:100:40:20)	5,00,000	2,41,935	1,61,290	64,516	32,258
Total		30,60,000	17,81,329	8,10,987	2,01,486	2,66,197

Total after Primary Distribution

Particulars	Total (₹)	Fabrication	Assembly	Stores	Maintenance
Total Overheads	63,80,000	36,01,330	17,70,987	5,01,486	5,06,197

Re-distribution of Service Departments' Expenses (Step Method)

Particulars	Basis of Apportionment	Production Department		Service Departments	
		Fabrication	Assembly	Stores	Maintenance
Overheads as per Primary distribution	As per Primary distribution	36,01,330	17,70,987	5,01,486	5,06,197
Maintenance Department Cost	Maintenance Hours (30:25:5:-)	2,53,099	2,10,915	42,183	(5,06,197)
		38,54,429	19,81,902	5,43,669	---
Stores Department	No. of Stores Requisition (5:2:-:-)	3,88,335	1,55,334	(5,43,669)	
		42,42,764	21,37,236	---	---

(i) (B) ₹ 5,43,669

Total overhead allocated from Stores Department
= ₹ 5,43,669

(ii) (C) ₹ 5,06,197

Total overhead allocated from Maintenance Department
= ₹ 5,06,197

(iii) (A) ₹ 1.21 per machine hour**Overhead Recovery Rate - Fabrication Department**

Basis: Machine Hours = 35,00,000

Rate = $42,42,764 / 35,00,000 = ₹ 1.21$ per machine hour

(iv) (D) ₹ 0.71 per labour hour**Overhead Recovery Rate - Assembly Department**

Basis: Labour Hours = 30,00,000

Rate = $21,37,236 / 30,00,000 = ₹ 0.71$ per labour hour

(v) (C) ₹ 1,60,445

Calculation of Full Production Cost (Job AMS-101)

Particulars	Amount (₹)
Direct Materials	1,50,000
Direct Labour:	
- Fabrication Deptt. (300 hours × ₹ 20)	6,000
- Assembly Deptt. (200 hours × ₹ 20)	4,000
Production Overheads:	
- Fabrication Deptt. (250 hours × ₹ 1.21)	303
- Assembly Deptt. (200 hours × ₹ 0.71)	142
Total Production Cost	1,60,445

2. (i) (D) ₹ 6,68,600

(ii) (C) ₹ 12,24,000

Statement Showing Total Gross Margin

Particulars	Alpha (₹)	Beta (₹)	Gamma (₹)	Total (₹)
Sales Units	24,000	60,000	32,000	1,16,000
Selling Price per unit	22	16	13	—
Sales Value (A)	5,28,000	9,60,000	4,16,000	19,04,000
Prime Cost per unit	14	10	9	—
Prime Cost (B)	3,36,000	6,00,000	2,88,000	12,24,000
Gross Margin (A – B)	1,92,000	3,60,000	1,28,000	6,80,000
Cost of Defective units	5,600	4,000	1,800	11,400
Net Gross Margin (B – C)	1,86,400	3,56,000	1,26,200	6,68,600

(iii) (A) Beta – I, Alpha – II, Gamma – III

Statement Showing Rank and Net Profit as per Conventional Accounting System

Particulars	Alpha	Beta	Gamma	Total
Sales Units/ Production (good units)	24,000	60,000	32,000	1,16,000
Gross Margin (₹) ...(A)	1,92,000	3,60,000	1,28,000	6,80,000
Cost of Defective units...(B)	5,600	4,000	1,800	11,400
Production Overheads (₹) $(\frac{2,54,500}{116} \times 24/60/32)$	52,655	1,31,638	70,207	2,54,500
Selling Overheads (₹) $(\frac{1,80,000}{116} \times 24/60/32)$	37,241	93,103	49,656	1,80,000
Sub-Total Overheads (₹) ...(C)	89,896	2,24,741	1,19,863	4,34,500
Net Profit (₹) ...(A – B – C)	96,504	1,31,259	6,337	2,34,100
Ranking	II	I	III	—

(iv) (A) ₹ 2,45,500

(v) (A) Alpha – I, Beta – II, Gamma – III

Workings

No.	Particulars	Alpha	Beta	Gamma	Total
(1)	Gross Production (Units / Run)	2,440	3,020	3,220	—
(2)	Defectives / Run	40	20	20	—
(3)	Good Units / Run	2,400	3,000	3,200	—
(4)	Sales Units	24,000	60,000	32,000	—
(5)	No. of Runs	10	20	10	—
(6)	Gross Production 1 x 5)	24,400	60,400	32,200	—
(7)	Prime Cost / Unit	14	10	9	—
(8)	Prime Cost (₹)	3,41,600	6,04,000	2,89,800	12,35,400
(9)	Inspection Hours / Run	2	5	3	—

(10)	Total Inspection Hours (9 x 5)	20	100	30	150
(11)	Machine Hours / Run	25	15	35	—
(12)	Total Machine Hours (11 x 5)	250	300	350	900
(13)	Mold Cost / Run	300	400	350	—
(14)	Total Mold Cost (13 x 5)	3,000	8,000	3,500	14,500

Statement Showing Production & Selling Overheads

Particulars	Alpha	Beta	Gamma	Total
Inspection Cost $(\frac{84,000}{150} \times 20/100/30)$	11,200	56,000	16,800	84,000
Machine Maintenance $(\frac{1,56,000}{900} \times 250/300/350)$	43,333	52,000	60,667	1,56,000
Mold Cost	3,000	8,000	3,500	14,500
Production Overheads	57,533	1,16,000	80,967	2,54,500
Advertisement $(\frac{90,000}{92} \times 60/32)$	—	58,696	31,304	90,000
Packing	—	60,000	—	60,000
Other Overheads $(\frac{30,000}{116} \times 24/60/32)$	6,207	15,517	8,276	30,000
Selling Overheads	6,207	1,34,213	39,580	1,80,000

Statement Showing Rank and Net Profit as per Activity Based Costing System

Particulars	Alpha	Beta	Gamma	Total
Sales Units	24,000	60,000	32,000	1,16,000
Gross Margin (₹) ...(A)	1,92,000	3,60,000	1,28,000	6,80,000
Cost of Defective units(B)	5,600	4,000	1,800	11,400
Production Overheads (₹)	57,533	1,16,000	80,967	2,54,500

Selling Overheads (₹)	6,207	1,34,213	39,580	1,80,000
Sub-Total Overheads (₹)(C)	63,740	2,50,213	1,20,547	4,34,500
Net Profit (₹)(A – B – C)	1,22,660	1,05,787	5,653	2,34,100
Ranking	I	II	III	—

Calculate Cost of Defective Units:

Product	Defectives per Run	Runs	Total Defectives	Per unit cost	Total cost (₹)
Alpha	40	10	400	14	5,600
Beta	20	20	400	10	4,000
Gamma	20	10	200	9	1,800

3. (A) ₹ 1,19,880

Equivalent Units = 100% of 1665 + 40% of 150 units
= 1665 + 60 = 1,725 units

Cost per unit = (₹ 10,020 + ₹ 1,14,180) ÷ 1,725
= ₹ 72 per unit

Cost of Completed units in the process:

= 1665 × 72 = ₹ 1,19,880

4. (C) 1,625 units

Projected Unit sales = (Fixed costs + Target operating income) ÷ unit Contribution margin.

= (₹ 5,32,000 + ₹ 3,45,500) ÷ (₹ 136 - ₹82)

= ₹ 8,77,500 ÷ 54

= 16,250 units

Existing Sales in units = (Fixed costs + operating income) ÷ unit Contribution margin.

= (₹ 5,32,000 + ₹ 3,45,500) ÷ (₹ 136 - ₹ 76)

= ₹ 8,77,500 ÷ 60

= 14,625 units

Increase in units: $16,250 - 14,625 = 1,625$ units

5. As procurement time is given in days, consumption should also be calculated in days:

$$\text{Maximum Consumption per Day: } \frac{350}{7} = 50 \text{ Kgs}$$

$$\text{Minimum Consumption per Day: } \frac{210}{7} = 30 \text{ Kgs.}$$

$$\text{Average Consumption per Day: } \frac{(50+30)}{2} = 40 \text{ Kgs}$$

(a) Calculation of Economic Order Quantity (EOQ)

Annual consumption of Raw Materials (A): $40 \text{ Kgs} \times 365 \text{ days} = 14,600 \text{ Kgs}$

Storage or Carrying Cost per unit per annum (C): $(₹ 100 \times 1\% \times 12 \text{ months}) + ₹ 2 = ₹ 14$

Ordering Cost (O): ₹ 200 per Order

$$\begin{aligned} \text{EOQ} &= \sqrt{\frac{2 \times A \times O}{C}} \\ &= \sqrt{\frac{2 \times 14,600 \times 200}{14}} = 646 \text{ Kgs.} \end{aligned}$$

(b) Re-Order Level (ROL) = (Maximum consumption Rate × Maximum Procurement Time)

$$= 50 \text{ kgs per day} \times 9 \text{ days}$$

$$= 450 \text{ kgs}$$

(c) Maximum Stock Level = Recorder Level + Recorder Quantity – (Minimum Consumption Rate × Minimum Procurement Time)

$$= 450 \text{ kgs} + 646 \text{ kgs} - (30 \text{ kgs} \times 5 \text{ days})$$

$$= 946 \text{ kgs}$$

(d) Minimum Stock Level = Recorder Level – (Average consumption Rate × Average Procurement Time)

$$= 450 \text{ kgs} - (40 \text{ kgs} \times 7 \text{ days})$$

$$= 170 \text{ kgs}$$

$$\begin{aligned}
 \text{(e) Average Stock Level} &= \frac{\text{Maximum Stock Level} + \text{Minimum Stock Level}}{2} \\
 &= \frac{946 \text{ kgs} + 170 \text{ kgs}}{2} \\
 &= 558 \text{ kgs}
 \end{aligned}$$

(f) Number of Orders to be placed per year

$$\begin{aligned}
 &= \frac{\text{Annual Consumption of Raw Materials}}{\text{EOQ}} \\
 &= \frac{14600 \text{ kgs}}{646 \text{ kgs}} \\
 &= 22.60 \text{ Orders or 23 Orders}
 \end{aligned}$$

(g) Total Inventory Cost

$$\begin{aligned}
 \text{Cost of Materials (A x Purchase Price) (14600 kgs x ₹ 100)} &= ₹ 14,60,000 \\
 \text{Total Ordering Cost (No. of Orders x O) (23 Orders x 200)} &= ₹ 4,600 \\
 \text{Total Carrying Cost (EOQ / 2 x C) (646 kgs / 2 x ₹ 14)} &= ₹ 4,522 \\
 \text{Total Inventory Cost} &= ₹ 14,69,122
 \end{aligned}$$

(h) If the supplier is willing to offer 1% discount on purchase of total annual quantity in two orders:

$$\begin{aligned}
 \text{Offer Price} &= ₹ 100 \times 99\% = ₹ 99 \\
 \text{Revised Carrying Cost} &= (₹ 99 \times 1\% \times 12 \text{ months}) + ₹ 2 = ₹ 13.88 \\
 \text{Revised Order Quantity} &= 14600 \text{ kgs} / 2 \text{ Orders} = 7300 \text{ kgs}
 \end{aligned}$$

Total Inventory Cost at Offer Price

$$\begin{aligned}
 \text{Cost of Materials (A x Purchase Price) (14600 kgs x ₹ 99)} &= ₹ 14,45,400 \\
 \text{Total Ordering Cost (No. of Orders x O) (2 Orders x 200)} &= ₹ 400 \\
 \text{Total Carrying Cost (EOQ / 2 x C) (7300 kgs / 2 x ₹ 13.88)} &= ₹ 50,662 \\
 \text{Total Inventory Cost} &= ₹ 14,96,462
 \end{aligned}$$

Advice: As total inventory cost at offer price is ₹ 27,340 (14,96,462 – 14,69,122) higher, offer should not be accepted.

(i) **Counter-offer:**

Let Discount Rate = $z\%$

Counter-Offer Price = $\text{₹ } 100 - z\% = \text{₹ } 100 - z$

Revised Carrying Cost = $[(\text{₹ } 100 - z) \times 1\% \times 12 \text{ months}] + \text{₹ } 2$

= $\text{₹ } 12 - 0.12z + \text{₹ } 2$

= $\text{₹ } 14 - 0.12z$

Total Inventory Cost at Counter-Offer Price

Cost of Materials (A x Purchase Price) $[14600 \text{ kgs} \times (\text{₹ } 100 - z)]$
= $\text{₹ } 14,60,000 - 14,600z$

Total Ordering Cost (No. of Orders x O) $(2 \text{ Orders} \times 200) = \text{₹ } 400$

Total Carrying Cost (EOQ / 2 x C) $[7300 \text{ kgs} / 2 \times (\text{₹ } 14 - 0.12z)]$

= $\text{₹ } 51,100 - 438z$

Total Inventory Cost = $\text{₹ } 15,11,500 - 15038z$

$\text{₹ } 14,69,122 = \text{₹ } 15,11,500 - 15038z$

Or $15038z = 42,378$

Or $z = 2.82$

Therefore, discount should be at least 2.82% in offer price.

6. (i) (a) **Existing time rate**

Weekly wages:

Normal shift	(40 hours × ₹ 160):	₹ 6,400
Late shift	(9 hours × ₹ 225)	₹ 2,025
		<u>₹ 8,425</u>

(b) **Piece Rate System**

15 articles are produced in 2.5 hours

Therefore, to produce 270 articles, hours required is

$\frac{2.5 \text{ hours}}{15 \text{ articles}} \times 270 \text{ articles} = 45 \text{ hours.}$

Cost of producing 270 articles:

At basic time rate (45 hours × ₹160) = ₹7,200

Add: Bonus @ 20% on basic Piece rate ₹1,440

Earning for the week ₹8,640

(c) Rowan Premium System

(i) Time allowed for producing 270 articles

$$\left(\frac{2.5 \text{ hours}}{15 \text{ articles}} \times 270 \text{ articles} \times 150\% \right) = 67.5 \text{ hours}$$

(ii) Time taken to produce 270 articles = 40.0 hours

(iii) Time Saved = 67.5 – 40 = 27.5 hours

Earnings under Rowan Premium system:

$$= (\text{Time taken} \times \text{Rate per hour}) + \left(\frac{\text{Time saved}}{\text{Time allowed}} \times \text{Time taken} \times \text{Rate per hour} \right)$$

$$= (40 \text{ hours} \times ₹160) + \left(\frac{27.5 \text{ hours}}{67.5 \text{ hours}} \times 40 \text{ hours} \times ₹160 \right) = ₹ 9,007.41$$

(d) Halsey Premium System

$$= (\text{Time taken} \times \text{Rate per hour}) + \left(\frac{1}{2} \times \text{Time saved} \times \text{Rate per hour} \right)$$

$$= (40 \text{ hours} \times ₹160) + \left(\frac{1}{2} \times 27.5 \text{ hours} \times ₹160 \right) = ₹6,400 + ₹2,200$$

$$= ₹8,600$$

(ii) Statement showing hours worked, weekly earnings, number of articles produced and cost per article

Method of Payment	Hours worked	Weekly earnings (₹)	Number of articles produced	Labour cost per article (₹)
Existing time rate	49	8,425.00	240	35.10
Straight piece rate system	40	8,640.00	270	32.00

Rowan System	Premium	40	9,007.41	270	33.36
Halsey System	Premium	40	8,600.00	270	31.85

7. Calculation of Direct Expenses

		Amount (₹)
(i)	Paid for power & fuel	4,80,200
(ii)	Bill paid to job workers	9,66,000
(iii)	Royalty paid for production	8,400
(iv)	Fee paid to the technician	96,000
	Total Direct expenses	15,50,600

Notes:

- (i) Wages paid to factory workers is direct employee cost.
- (ii) Administrative overhead is indirect expense.
- (iii) Commission paid to sales staffs comes under selling expenses.

8. Statement of Cost of Nova Manufacturing Ltd. for the year ended 31st March, 2026:

Sl. No.	Particulars	Amount (₹)	Amount (₹)
(i)	Material Consumed:		
	Purchase of Raw Materials	1,02,50,000	
	Carriage Inward	2,10,000	
	Add: Opening Stock of Raw Materials	8,10,000	
	Less: Closing Stock of Raw Materials	(5,90,000)	
	Raw Material Consumed		1,06,80,000
(ii)	Direct Employee (Labour) Cost:		
	Direct Wages	72,40,000	
	Employer's Contribution to EPF & ESI	9,00,000	
	Total Direct Employee Cost		81,40,000

(iii)	Direct Expenses:		
	Consumable Materials	6,20,000	
	Cost of Power & Fuel	33,20,000	
	Total Direct Expenses		39,40,000
	Prime Cost		2,27,60,000
(iv)	Works / Factory Overheads:		
	Wages to Foreman & Storekeeper	10,20,000	
	Other Indirect Wages to Factory Staff	1,95,000	
	Factory Maintenance & Repairs	7,30,000	
	Depreciation on Plant & Machinery	9,20,000	
	<i>(Abnormal Loss – Not included in cost)</i>	—	
	Total Factory Overheads		28,65,000
	Gross Factory Cost		2,56,25,000
	Add: Opening WIP	9,25,000	
	Less: Closing WIP	(7,80,000)	
	Factory Cost		2,57,70,000
(v)	Quality Control Department Expenses		5,40,000
(vi)	Research & Development Cost (Automation Systems)		12,80,000
(vii)	Production Planning Office Expenses		15,50,000
	Cost Of Production		2,91,40,000
	Add: Opening Stock of Finished Goods	16,90,000	
	Less: Closing Stock of Finished Goods	(12,40,000)	
	Cost Of Goods Sold		2,95,90,000
(viii)	Administrative Overheads:		
	Salary to Accountants	8,40,000	
	Fees to Statutory Auditor	2,20,000	
	Fees to Cost Auditor	1,10,000	
	Fees to Independent Directors	11,80,000	

	Office Rent	11,50,000	
	Total Administrative Overheads		35,00,000
(ix)	Selling & Distribution Overheads:		
	Salary to Delivery Staff	18,20,000	
	Insurance on Finished Goods Warehouse	3,40,000	
	Packing Materials	4,80,000	
	Total Selling & Distribution Overheads		26,40,000
	Cost Of Sales		3,57,30,000
	Profit / (Loss) (Balancing Figure)		(8,40,000)
	Sales		3,48,90,000

Notes:

- Abnormal loss of ₹ 4,60,000 (Scrap ₹ 40,000) is excluded from the cost sheet.
- Income tax and donation are not included in cost sheets.

9. (i) **Statement of Profit as per financial records
(for the year ended March 31, 2026)**

	(₹)		(₹)
To Opening stock:		By Sales	20,80,000
Finished Goods	76,525	By Closing stock:	
Work-in-process	33,000	Finished Goods	43,250
To Raw materials consumed	7,84,000	Work-in-Process	48,200
To Direct labour	4,65,000	By Rent received	72,000
To Factory overheads	2,65,000	By Interest received	18,500
To Goodwill written off	95,000		
To Administration overheads	3,15,000		
To Selling & distribution overheads	65,000		
To Interest paid	72,000		
To Bad debts	21,000		

To Profit	70,425		
	22,61,950		22,61,950

**Statement of Profit as per costing records
(for the year ended March 31,2026)**

	(₹)	(₹)
Sales revenue (14,500 units) (A)		20,80,000
<u>Cost of Sales:</u>		
Opening stock (875 units x ₹ 105)	91,875	
Add: Cost of production of 14,000 units (Refer to Working Note 1& 2)	18,15,360	
Less: Closing stock $\left(\frac{₹18,15,360 \times 375 \text{ units}}{14,000 \text{ units}} \right)$	(48,626)	
Production cost of goods sold (14,500 units)	18,58,609	
Selling & distribution overheads (14,500 units x ₹ 5)	72,500	
Cost of sales: (B)	19,31,109	19,31,109
Profit: {(A) – (B)}		1,48,891

(ii) Statement of Reconciliation

(Reconciling the profit as per costing records with the profit as per financial records)

	(₹)	(₹)
Profit as per Cost Accounts		1,48,891
Add: Factory overheads over absorbed (₹ 2,79,000 – ₹ 2,65,000)	14,000	
S&D overheads over absorbed (₹ 72,500 – ₹ 65,000)	7,500	
Opening stock overvalued (₹ 91,875 – ₹ 76,525)	15,350	
Interest received	18,500	

Rent received	72,000	1,27,350
		2,76,241
Less: Administration overheads under recovery (₹ 3,15,000 – ₹ 3,02,560)	12,440	
Closing stock overvalued (₹ 48,626 – ₹ 43,250)	5,376	
Goodwill written off	95,000	
Interest paid	72,000	
Bad debts	21,000	2,05,816
Profit as per financial accounts		70,425

Working Notes:

1. Number of units produced		Units
Sales		14,500
Add: Closing stock		<u>375</u>
Total		14,875
Less: Opening stock		<u>875</u>
Number of units produced		<u>14,000</u>
2. Cost Sheet		
	(₹)	(₹)
Raw materials consumed		7,84,000
Direct labour		4,65,000
Prime cost		12,49,000
Factory overheads (60% of direct wages)		2,79,000
Factory cost		15,28,000
Add: Opening work-in-process		33,000
Less: Closing work-in-process		(48,200)
Factory cost of goods produced		15,12,800

Administration overheads (20% of factory cost)		3,02,560
Cost of production of 14,000 units		18,15,360

Cost of production per unit:

$$= \frac{\text{Total Cost of Production}}{\text{No. of units produced}} = \frac{\text{₹ 18,15,360}}{14,000 \text{ units}} = \text{₹ 129.67}$$

10. Workings:

1. **Maximum number of bottles that can be processed in a batch:**

$$2. = \frac{5,000 \text{ ltrs}}{\text{Bottle volume}}$$

Large		Medium		Small	
Qty (ltr)	Max bottles	Qty (ltr)	Max bottles	Qty (ltr)	Max bottles
3	1,666	1.5	3,333	0.6	8,333

*For simplicity of calculation small fractions has been ignored.

Number of batches to be run:

		Large	Medium	Small	Total
A	Demand	3,00,000	7,50,000	20,00,000	
B	Bottles per batch (Refer WN-1)	1,666	3,333	8,333	
C	No. of batches [A÷B]	180	225	240	645

*For simplicity of calculation small fractions has been ignored.

Quantity of Material-W and Material C required to meet demand:

	Particulars	Large	Medium	Small	Total
A	Demand (bottle)	3,00,000	7,50,000	20,00,000	
B	Qty per bottle (Litre)	3	1.5	0.6	
C	Output (Litre) [A×B]	9,00,000	11,25,000	12,00,000	32,25,000
D	Material-W per litre of output (Litre)	14	14	14	

E	Material-W required (Litre) $[C \times D]$	1,26,00,000	1,57,50,000	1,68,00,000	4,51,50,000
F	Material-C required per litre of output (ml)	25	25	25	
G	Material-C required (Litre) $[(C \times F) \div 1000]$	22,500	28,125	30,000	80,625

3. No. of Man-shift required:

		Large	Medium	Small	Total
A	No. of batches	180	225	240	645
B	Hours required per batch (Hours)	2	2	2	
C	Total hours required (Hours) $[A \times B]$	360	450	480	1,290
D	No. of shifts required $[C \div 8]$	45	57	60	162
E	Total manshift $[D \times 20 \text{ workers}]$	900	1,140	1,200	3,240

4. Power consumption in Kwh

		Large	Medium	Small	Total
For processing					
A	No. of batches	180	225	240	645
B	Hours required per batch (Hours)	1.75	1.75	1.75	21.75
C	Total hours required (Hours) $[A \times B]$	315	393.75	420	1,128.75
D	Power consumption per hour	90	90	90	90
E	Power consumption in Kwh $[C \times D]$	28,350	35,437.5	37,800	1,01,587.5
F	Per batch consumption (Kwh) $[E \div A]$	157.5	157.5	157.5	157.5
For set-up					
G	Hours required per batch (Hours)	0.25	0.25	0.25	0.25
H	Total hours required (Hours) $[A \times G]$	45	56.25	60	161.25
I	Power consumption per hour $[20\% \times 90]$	18	18	18	18
J	Power consumption in Kwh $[H \times I]$	810	1,012.5	1,080	2,902.5

K	Per batch consumption (Kwh) [J ÷ A]	4.5	4.5	4.5	4.5
---	--	-----	-----	-----	-----

Calculation of Profit/ loss per batch:

	Particulars	Large	Medium	Small	Total
A	Demand (bottle)	3,00,000	7,50,000	20,00,000	30,50,000
B	Price per bottle (₹)	150	90	50	
C	Sales value (₹) [A × B]	4,50,00,000	6,75,00,000	10,00,00,000	21,25,00,000
	Direct Material cost:				
E	Material-W (₹) [Qty in WN - 3 × ₹ 0.50]	63,00,000	78,75,000	84,00,000	2,25,75,000
F	Material-C (₹) [Qty in WN-3 × ₹ 1,000]	2,25,00,000	2,81,25,000	3,00,00,000	8,06,25,000
G	[E+F]	2,88,00,000	3,60,00,000	3,84,00,000	10,32,00,000
H	Direct Wages (₹) [Man-shift in WN-4 × ₹ 880]	7,92,000	10,03,200	10,56,000	28,51,200
I	Packing cost (₹) [A × ₹ 3]	9,00,000	22,50,000	60,00,000	91,50,000
	Power cost (₹)				
J	For processing (₹) [WN-5 × ₹ 7]	1,98,450	2,48,062.5	2,64,600	7,11,112.5
K	For set-up time (₹) [WN-5 × ₹ 7]	5,670	7,087.5	7,560	20,317.5
L	[J+K]	2,04,120	2,55,150	2,72,160	7,31,430
M	Other variable cost (₹) [No. of batch in WN - 2 × ₹ 30,000]	54,00,000	67,50,000	72,00,000	1,93,50,000

N	Total Variable cost per batch [G+H+I+L+M]	3,60,96,120	4,62,58,350	5,29,28,160	13,52,82,630
O	Profit/ loss before fixed cost [C-N]	89,03,880	2,12,41,650	4,70,71,840	7,72,17,370
P	Fixed Cost				4,90,00,000
Q	Total Profit [O-P]				2,82,17,370

Computation of Economic Batch Quantity (EBQ):

$$EBQ = \sqrt{\frac{2 \times D \times S}{C}}$$

D = Annual Demand for the Product = Refer A below

S = Set-up cost per batch = Refer D below

C = Carrying cost per unit per annum =Refer E below

	Particulars	Large	Medium	Small
A	Annual Demand (bottle)	3,00,000	7,50,000	20,00,000
Set-up Cost:				
B	Power cost for set-up time (₹) [Consumption per batch in WN-5 × ₹ 7]	31.50	31.50	31.50
C	Other variable cost (₹) *	30,000	30,000	30,000
D	Total Set-up cost [B+C]	30,031.50	30,031.50	30,031.50
E	Holding cost:	1.00	1.00	1.00
F	EBQ (Bottle)	1,34,234	2,12,243	3,46,592

* Other variable cost is assumed to be part of set-up cost.

11.

Process I**Statement of Equivalent Production and Cost**

Input (Units)	Particulars	Output Units	Equivalent Production					
			Materials		Labour		Overheads	
			(%)	Units	(%)	Units	(%)	Units
40,000	Completed	30,000	100	30,000	100	30,000	100	30,000
	Closing WIP	10,000	100	10,000	50	5,000	50	5,000
40,000		40,000		40,000		35,000		35,000

Particulars	Materials	Labour	Overhead	Total
Cost incurred (₹)	3,00,000	3,50,000	2,45,000	8,95,000
Equivalent units	40,000	35,000	35,000	
Cost per equivalent unit (₹)	7.50	10.00	7.00	24.50

Process-I Account

Particulars	Units	(₹)	Particulars	Units	(₹)
To Materials	40,000	3,00,000	By Process-II A/c (30,000 units × ₹ 24.5)	30,000	7,35,000
To Labour		3,50,000	By Closing WIP*	10,000	1,60,000
To Overhead		2,45,000			
	40,000	8,95,000		40,000	8,95,000

* (Material 10,000 units × ₹ 7.5) + (Labour 5,000 units × ₹ 10) + (Overheads 5,000 units × ₹ 7)

= ₹ 75,000 + ₹ 50,000 + ₹ 35,000 = ₹ 1,60,000

Process II**Statement of Equivalent Production and Cost**

Input (Units)	Particulars	Output Units	Equivalent Production					
			Materials		Labour		Overheads	
			(%)	Units	(%)	Units	(%)	Units
30,000	Completed	28,000	100	28,000	100	28,000	100	28,000
	Normal loss	200		--		--		--

	Closing WIP	1,800	100	1,800	25	450	25	450
30,000		30,000		29,800		28,450		28,450

Particulars	Materials	Labour	Overhead	Total
Process-I Cost	7,35,000	--	--	7,35,000
Cost incurred (₹)	--	71,125	85,350	1,56,475
Equivalent units	29,800	28,450	28,450	--
Cost per equivalent unit (₹)	24.6644	2.5000	3.0000	30.1644

Process-II Account

Particulars	Units	(₹)	Particulars	Units	(₹)
To Process-I A/c	30,000	7,35,000	By Normal loss A/c	200	--
To Packing Material	--	80,000	By Finished Goods Stock A/c	28,000*	9,24,604
To Direct Wages	--	71,125	By Closing WIP	1,800**	46,871
To Factory Overhead	--	85,350			
	30,000	9,71,475		30,000	9,71,475

* $28,000 \times ₹ 30.1644 = ₹ 8,44,603 + ₹ 80,000$ (Packing Material Cost)
= ₹ 9,24,604

** $1,800 \text{ units} \times ₹ 24.6644 + 450 \text{ units} \times (₹ 2.5 + ₹ 3) = ₹ 46,871$

12. Apportionment of Joint Costs

Particulars	X (₹)	Y (₹)
Selling Price	16,000	8,000
Less: Estimated profit	4,000 (25% of ₹ 16,000)	1,600 (20% of ₹ 8,000)
Cost of sales	12,000	6,400
Less: Selling & Distribution exp. (Refer working note)	267 (₹ 400 × 2/3)	133 (₹ 400 × 1/3)
Less: Subsequent cost	5,000	3,000
Share of Joint cost	6,733	3,267

So, Joint cost of manufacture is to be distributed to X & Y in the ratio of 6733:3267.

Statement showing Cost of Production of X and Y

Elements of cost	Joint Cost		Subsequent Cost		Total Cost	
	X	Y	X	Y	X	Y
Material	3,367	1,633	3,000	1,500	6,367	3,133
Labour	2,020	980	1,400	1,000	3,420	1,980
Overheads	1,346	654	600	500	1,946	1,154
Cost of production					11,733	6,267

Working Note:

Calculation of Selling and Distribution Expenses

Particulars	(₹)
Total Sales Revenue (₹ 16,000 + ₹ 8,000)	24,000
Less: Estimated Profit (₹ 4,000 + ₹ 1,600)	(5,600)
Cost of Sales	18,400
Less: Cost of production:	
- Joint Costs	(10,000)
- Subsequent costs (₹ 5,000 + ₹ 3,000)	(8,000)
Selling and Distribution expenses (Balancing figure)	400

13. Operating Cost Sheet

Particulars	Amount (₹)	Amount (₹)
<u>Standing Charges:</u>		
Depreciation (₹ 24,00,000 x 10% x 1/12 x 25)	5,00,000	
Garage Rent	1,00,000	
Insurance	25,000	
Road Tax	20,000	

Manager's Salary	60,000	
Assistant's Salary (₹ 32,000 x 2)	64,000	
Supervisor's Salary (₹ 24,000 x 3)	72,000	
Driver's Salary (₹ 20,000 x 25)	5,00,000	
Cleaner's Salary (₹ 5,000 x 20)	1,00,000	
Office Staff's Salary	1,00,000	
Consumables	1,20,000	
Repairs & Maintenance	90,000	
Other Fixed Expenses	<u>72,000</u>	18,23,000
<u>Running Charges</u>		
Diesel (49,600 Kms / 10 Kms x ₹ 80 per unit)	3,96,800	
Oils & Lubricants	1,45,000	
Tyres and tubes	<u>35,000</u>	<u>5,76,800</u>
Total Operating Cost		<u>23,99,800</u>

$$\begin{aligned}
 \text{Cost per passenger-km} &= \frac{\text{Total Operating Cost}}{\text{Passenger -kms}} \\
 &= \frac{23,99,800}{27,18,080} \\
 &= 0.883
 \end{aligned}$$

Working Note:

Calculation of Total Kilometers and Passenger Kilometers

Specification	Total Km.	Passenger-Km.
12 Buses (60 Passengers)	29,760 Kms (10 Kms × 4 x 2 trips × 31 days x 12 Buses)	14,28,480 (29760 Kms x 60 Pass. x 80%)
13 Buses (50 Passengers)	32,240 Kms (10 Kms × 4 x 2 trips × 31 days x 13 Buses)	12,89,600 (32240 Kms x 50 Pass. x 80%)
Total	62,000	27,18,080

Since 5 buses out of 25 buses are kept for repairs every day

Actual total Km. $62,000 \times 20/25 = 49,600$

14. (A) (i) Production Budget for January to March 2025

(Quantitative)

Particulars	Jan	Feb	Mar	April
Budgeted Sales	12,000	13,500	15,000	16,500
Add: Closing Stock (25% of next month sales)	3,375	3,750	4,125	4,250
Total Requirement	15,375	17,250	19,125	20,750
Less: Opening Stock	3,000	3,375	3,750	4,125
Budgeted Production	12,375	13,875	15,375	16,625

Total Budgeted Production (Q1) = $12,375 + 13,875 + 15,375$
= 41,625 units

(ii) Raw Material Consumption Budget (Quantity)

Month	Output (Units)	Material A (5 kg/unit)	Material B (4 kg/unit)
January	12,375	61,875	49,500
February	13,875	69,375	55,500
March	15,375	76,875	61,500
April	16,625	83,125	66,500
Total (Q1)		2,08,125	1,66,500

(iii) Raw Materials Purchase Quantity Budget (Quarter I)

Material A (kg)

Particulars	Quantity
Material required for production	2,08,125
Add: Closing Stock (60% of April requirement = $83,125 \times 60\%$)	49,875
Total Requirement	2,58,000
Less: Opening Stock	25,000
Purchase Quantity	2,33,000 kg

Material B (kg)

Particulars	Quantity
Material required for production	1,66,500
Add: Closing Stock (60% of April requirement = 66,500 × 60%)	39,900
Total Requirement	2,06,400
Less: Opening Stock	18,000
Purchase Quantity	1,88,400 kg

(B) Calculation of Material Cost Variance**Working Data**

- Standard Quantity for actual output (42,000 units):
 - Material A = 42,000 × 5 = 2,10,000 kg
 - Material B = 42,000 × 4 = 1,68,000 kg

Material Cost Variance Statement

Particulars	Material A (₹)	Material B (₹)	Total (₹)
(a) Std Price × Std Qty	₹ 12 × 2,10,000 = 25,20,000	₹ 18 × 1,68,000 = 30,24,000	55,44,000
(b) Std Price × Actual Qty	₹ 12 × 2,10,000 = 25,20,000	₹ 18 × 1,65,000 = 29,70,000	54,90,000
(c) Actual Cost	₹ 12.5 × 2,10,000 = 26,25,000	₹ 18.40 × 1,65,000 = 30,36,000	56,61,000

Material Usage Variance = Standard Rate × Std. Qty. – Standard Rate × Actual Quantity

- A = 25,20,000 – 25,20,000 = Nil
- B = 30,24,000 – 29,70,000 = 54,000 (F)
- Total = 54,000 (F)

Material Price Variance = Actual Quantity x Standard rate – Actual Quantity x Actual Rate

- A = 25,20,000 – 26,25,000 = 1,05,000 (A)
 - B = 29,70,000 – 30,36,000 = 66,000 (A)
- Total = 1,71,000 (A)

Material Cost Variance = Standard Cost for Actual output – Actual cost

- A = 25,20,000 – 26,25,000 = 1,05,000 (A)
 - B = 30,24,000 – 30,36,000 = 12,000 (A)
- Total = 1,17,000 (A)

Calculation of Labour Cost Variances:

Working Notes

Budgeted output (Q1) = 41,625 units

Standard labour hours = 41,625 × 0.8 = 33,300 hours

Standard rate per hour = $\frac{\text{Budgeted direct labour cost}}{\text{Budgeted direct labour hours}}$

= ₹ 15,36,000 / 33,300 = ₹ 46.13 (approx.)

Standard hours for actual output = 42,000 × 0.8 = 33,600 hours

Actual rate per hour = ₹ 17,85,000 / 35,000 = ₹ 51

Direct Labour Efficiency Variance = Std Rate × (Std Hours – Actual Hours)

= 46.13 × (33,600 – 35,000)

= 46.13 × (–1,400)

= ₹ 64,582 (A)

Direct Labour Rate Variance = Actual Hours × (Std Rate – Actual Rate)

= 35,000 × (46.13 – 51)

= 35,000 × (–4.87)

$$= ₹ 1,70,450 \text{ (A)}$$

$$\text{Direct Labour Cost Variance} = (\text{Std Rate} \times \text{Std Hours}) - \text{Actual Cost}$$

$$= (46.13 \times 33,600) - 17,85,000$$

$$= 15,49,968 - 17,85,000$$

$$= ₹ 2,35,032 \text{ (A)}$$

15.

XYZ Limited

Evaluation of Change over to Product P from Product C

Existing Production

	Products			Total
	A	B	C	
Selling Price (₹)	30	40	20	
Less: Variable Cost (₹)	15	20	12	
Contribution per unit (₹)	15	20	8	
P/V Ratio	50%	50%	40%	
Sales Mix	35%	35%	30%	
Contribution <i>per rupee of sales</i> (P/V Ratio $\times$ Sales Mix)	17½%	17½%	12%	47%
Present Total Contribution (₹ 6,00,000 $\times$ 47%)				₹ 2,82,000
Less: Fixed Costs				₹ 1,80,000
Present Profit				₹ 1,02,000
Present Break-Even Sales (₹ 1,80,000/0.47)				₹ 3,82,979

Proposed Production

	Products			Total
	A	B	C	
Selling Price (₹)	30	40	30	
Less: Variable Cost (₹)	15	20	15	
Contribution <i>per unit</i> (₹)	15	20	15	

P/V Ratio	50%	50%	50%	
Sales Mix	50%	25%	25%	
Contribution <i>per rupee of sales</i> (P/V Ratio x Sales Mix)	25%	12½%	12½%	50%
Proposed Total Contribution (₹ 6,40,000 x 50%)				₹ 3,20,000
Less: Fixed Costs				₹ 1,80,000
Proposed Profit				₹ 1,40,000
Proposed Break Even Sales (₹ 1,80,000/0.50)				₹ 3,60,000

16. (a) The practical difficulties with which one usually confronted with while installing a costing system in a manufacturing company are as follows:
- (i) **Lack of top management support:** Installation of a costing system does not receive the adequate support of top management. They consider it as interference in their work. They believe that such, a system will involve additional paperwork. They also have a misconception in their minds that the system is meant for keeping a check on their activities.
 - (ii) **Resistance from cost accounting departmental staff:** The staff resists because of fear of losing their jobs and importance after the implementation of the new system.
 - (iii) **Non-co-operation from user departments:** The foremen, supervisor and other staff members may not co-operate in providing requisite data, as this would not only add to their responsibilities but will also increase paper work of the entire team as well.
 - (iv) **Shortage of trained staff:** Since cost accounting system's installation involves specialised work, there may be a shortage of trained staff.

To overcome these practical difficulties, necessary steps required are:

- To sell the idea to top management – To convince them of the utility of the system.

- Resistance and non-co-operation can be overcome by behavioral approach. To deal with the staff concerned effectively.

- Proper training should be given to the staff at each level

Regular meetings should be held with the cost accounting staff, user departments, staff and top management to clarify their doubts/misgivings.

(b)

	Type of costs
Interest paid on own capital not involving any cash outflow.	Imputed Cost
Withdrawing money from bank deposit for the purpose of purchasing new machine for expansion purpose.	Opportunity Cost
Rent paid for the factory building which is temporarily closed	Shut Down Cost
Cost associated with the acquisition and conversion of material into finished product.	Product Cost

- (c) There are certain steps involved in the budgetary control technique. They are as follows:

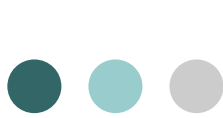
- (i) **Definition of objectives:** A budget being a plan for the achievement of certain operational objectives, it is desirable that the same are defined precisely. The objectives should be written out; the areas of control demarcated; and items of revenue and expenditure to be covered by the budget stated.
- (ii) **Location of the key (or budget) factor:** There is usually one factor (sometimes there may be more than one) which sets a limit to the total activity. Such a factor is known as key factor. For proper budgeting, it must be located and estimated properly.
- (iii) **Appointment of controller:** Formulation of a budget usually

required whole time services of a senior executive known as budget controller; he must be assisted in this work by a Budget Committee, consisting of all the heads of department along with the Managing Director as the Chairman.

- (iv) **Budget Manual:** Effective budgetary planning relies on the provision of adequate information which are contained in the budget manual. A budget manual is a collection of documents that contains key information for those involved in the planning process.
- (v) **Budget period:** The period covered by a budget is known as budget period. The Budget Committee determines the length of the budget period suitable for the business. It may be months or quarters or such periods as coincide with period of trading activity.
- (vi) **Standard of activity or output:** For preparing budgets for the future, past statistics cannot be completely relied upon, for the past usually represents a combination of good and bad factors. Therefore, though results of the past should be studied but these should only be applied when there is a likelihood of similar conditions repeating in the future.

(d)

Cost Pool	Cost Driver
Quality Control	- Number of Inspections - Product Units Produced
Research and Development	- Number of research projects - Personnel hours on a project
Machine Maintenance	Machine Hours
Employee Training Costs	- Number of Training Hours - Employees Trained
Customer Service	- Number of service calls - Number of products serviced - Hours spent on servicing products



PAPER – 5: AUDITING AND ETHICS



QUESTIONS

PART – I: Multiple Choice Questions based on Case Scenarios

Integrated Case Scenario (MCQs 1–5)

CA Arjun, the statutory auditor of XYZ Ltd., was engaged to conduct the audit of the financial statements for the financial year 2025-26. During the year, the company undertook a complex cross-border restructuring involving overseas subsidiaries, extensive import-export transactions and compliance with applicable foreign exchange regulations. Before accepting and continuing the engagement, CA Arjun ensured that the engagement team possessed the necessary professional competence, industry expertise and updated technical knowledge required for auditing such specialised transactions and regulatory matters.

During the course of the audit, CA Arjun identified instances of delayed realisation of export proceeds and related non-compliances with applicable foreign exchange regulations.

Management represented that the delays were temporary and expected to be resolved through ongoing negotiations with overseas customers. Management further requested that these matters should not be specifically highlighted in the audit documentation or communications with those charged with governance. Considering the company's long-standing relationship with his firm and the possibility of losing future assignments, CA Arjun intentionally avoided adequately documenting and communicating these identified non-compliances, although he continued to perform other audit procedures in accordance with the Standards on Auditing.

While auditing trade receivables arising largely from overseas operations affected by restructuring, CA Arjun obtained an ageing analysis which showed that more than 60% of receivable balances were outstanding for more than 180 days. Management explained that the delays were industry-wide and assured the auditor that the amounts were fully recoverable based on ongoing restructuring negotiations and expected settlement arrangements. The auditor, however, neither obtained external confirmations from major debtors nor examined subsequent receipts after the reporting date and instead relied primarily upon management representations and past recovery trends while concluding that the provision for bad and doubtful debts was adequate.

During the audit, CA Arjun also noted an ongoing income-tax litigation relating to disallowance of certain cross-border transaction expenses. Although the first appellate authority had ruled in favour of the company, the Income Tax Department had filed a further appeal before the High Court. While the amount involved (₹ 10 lakhs) was individually below materiality level, the auditor remained concerned about the appropriateness of management's assessment and disclosure of the contingent liability. Management relied upon a legal opinion obtained from its external legal counsel to support its conclusion that the matter would likely be decided in the company's favour. Accordingly, CA Arjun considered the procedures required under SA 501 regarding litigation and claims.

In the audit of purchases and imported raw materials, CA Arjun observed a substantial increase of nearly 40% compared to the previous year, along with concentration of procurement from a limited number of overseas vendors following the restructuring exercise. To understand these fluctuations, he performed analytical procedures including trend analysis and category-wise comparison of purchases. He also verified inward gate entry records with corresponding purchase invoices; however, such testing was restricted to selected months during the year and excluded transactions recorded close to the year-end. No additional substantive procedures were designed to specifically address the identified risk of incorrect cut-off assertion or improper recording of purchases around the reporting date.

Further, during the year XYZ Ltd. underwent several significant changes including replacement of senior management personnel, transition from the previous financial reporting framework to Ind AS, and introduction of new

regulatory compliance requirements affecting financial reporting and disclosures. Despite these developments materially affecting the scope and reporting considerations of the audit engagement, CA Arjun decided to continue the engagement under the original terms agreed at the commencement of the audit without formally revising or documenting changes in the engagement letter.

On the basis of above, answer the following MCQs (1-5)

1. Which of the following best describes CA Arjun's conduct regarding the identified foreign exchange non-compliances?
 - (a) He has complied with ethical requirements since substantive audit procedures were otherwise performed properly
 - (b) Only professional competence is affected since the issue relates to technical interpretation of regulations
 - (c) His conduct results in violation of professional behaviour and ethical responsibilities despite performing audit procedures
 - (d) There is no ethical violation since management assumed responsibility for the non-compliances
2. Based on audit procedures performed for trade receivables, which of the following represents the most significant audit concern?
 - (a) Risk that receivables may not exist due to fictitious sales entries
 - (b) Risk that receivables are understated due to incomplete recording
 - (c) Risk that receivables are overstated due to inadequate provision for bad and doubtful debts
 - (d) Risk that receivables are incorrectly classified between current and non-current assets
3. In relation to the pending tax litigation and legal opinion obtained by management, which of the following procedures would be most appropriate under SA 501?
 - (a) Meet the external legal counsel directly without involving management

- (b) Send a direct inquiry letter independently to the external legal counsel
 - (c) Meet the external legal counsel only after obtaining management representation letter
 - (d) Send a letter of inquiry to the external legal counsel with management's permission
4. Which of the following is the most significant deficiency in the audit procedures performed for purchases and imported raw materials?
- (a) Inadequate audit procedures around year-end transactions resulting in cut-off risk
 - (b) Excessive reliance on tests of details instead of analytical procedures
 - (c) Failure to perform analytical procedures for purchases
 - (d) Failure to verify legal existence of overseas vendors
5. Considering the significant changes during the year, which of the following best evaluates CA Arjun's decision regarding the engagement terms?
- (a) No revision was necessary since audit procedures could be modified internally by the auditor
 - (b) Revision of engagement terms was necessary due to significant changes affecting scope of audit and reporting requirements
 - (c) Revision of engagement terms becomes necessary only if management formally requests such revision
 - (d) No revision was required since the auditor had audited the company in earlier years as well

General MCQs

6. LR & Co., Chartered Accountants, are conducting the statutory audit of Beta Exports Ltd. for the financial year ended 31st March 2026. During the audit, the engagement team is verifying the borrowings of the company.

It is observed that the company has obtained a loan denominated in foreign currency. While checking the year-end balances, the auditor verifies the closing exchange rate and recalculates the loan amount to ensure that it has been properly restated in the financial statements in accordance with applicable accounting standards.

Based on above scenario, identify the assertion that the auditor is trying to verify:

- (a) Completeness
 - (b) Rights and obligations
 - (c) Valuation
 - (d) Existence
7. An auditor wants to ensure that he has complete knowledge of all locations where a company's inventories are stored. Since all such storage locations are stated to be taken on rent, the auditor seeks an independent source of audit evidence to verify whether all inventory storage locations have been disclosed by management:
- Which of the following is the most relevant audit procedure in this regard?
- (a) Inspecting GST registration certificate downloaded from GST portal
 - (b) Visiting locations stated in rent agreements
 - (c) Verifying copies of rent agreements provided
 - (d) Inspecting certificate of incorporation of company
8. While evaluating the reliability of audit evidence, the audit team identifies the following documents:
- 1. Delivery challans prepared by the company evidencing dispatch of goods to a job worker
 - 2. Shipping bill details downloaded from the customs portal and stored in the company's system

3. Bank statements downloaded from the bank's official portal and maintained in the company's records
4. Supplier quotations received and stored in the company's official email inbox

A discussion arises among the audit team regarding classification of these documents as internal or external audit evidence, particularly considering that some documents, although generated externally, are accessed through the company's system. The engagement partner emphasizes the importance of source and reliability of evidence in accordance with Standards on Auditing.

Which of the following statements is most appropriate regarding the nature of audit evidence in the above case?

- (a) 1, 2, 3 and 4 are in nature of external evidence.
- (b) Only 2 and 3 are in nature of external evidence.
- (c) Only 1, 2, and 3 are in nature of external evidence.
- (d) Only 2, 3, 4 are in nature of external evidence.

PART II – Descriptive Questions

Chapter 1 - Nature, Objective and Scope of Audit

9. ABC Ltd., a listed company, has engaged CST & Co., Chartered Accountants, as statutory auditors to audit its financial statements for the financial year ending on 31st March, 2026. The financial statements have been prepared by the management in accordance with the applicable financial reporting framework and the requirements of the Companies Act, 2013.

During the audit engagement, the auditor evaluates the financial statements using prescribed accounting principles and auditing standards, gathers sufficient appropriate audit evidence and expresses an opinion to enhance the confidence of shareholders, investors, lenders and other stakeholders in the financial statements.

In the above context:

- (a) Explain the meaning of an assurance engagement.

- (b) Considering the meaning of an assurance engagement, identify the practitioner, responsible party and intended users?
- (c) Discuss the elements of an assurance engagement.

Chapter 2 - Audit Strategy, Audit Planning and Audit Programme

10. KLM & Co., Chartered Accountants, were appointed as the statutory auditors of XYZ Ltd. for the financial year ended 31st March, 2026. During the planning phase, the engagement partner developed the overall audit strategy and a detailed audit plan.

While conducting the audit, certain unexpected risks relating to inventory valuation and internal control weaknesses were identified. Accordingly, the audit team modified the audit procedures, including changes in the nature, timing, and extent of testing. The engagement partner ensured that all such changes and the reasons for them were properly recorded.

Before completion of the audit, a junior auditor raised a query regarding the auditor's responsibility to document the overall audit strategy, audit plan, and significant changes made during the course of the audit together with the reasons for such changes.

With reference to SA 300 "Planning an Audit of Financial Statements", explain the auditor's documentation requirements relating to the overall audit strategy, audit plan, and significant changes made during the course of the audit together with the reasons for such changes.

Chapter 3 - Risk Assessment and Internal Control

11. PQR & Co., Chartered Accountants, are the statutory auditors of LMN Ltd. During the audit for the financial year ended 31st March, 2026, the auditor considers relying on audit evidence obtained in the previous audits regarding the operating effectiveness of certain internal controls over revenue recognition.

However, during discussions with management, it is observed that there have been some changes in personnel in the accounts department and certain IT systems have been upgraded. The auditor is evaluating whether it is appropriate to rely on audit evidence obtained in previous audits or whether fresh testing of controls is required.

In view of above, discuss the factors the auditor should consider while using audit evidence obtained in previous audits and the requirement regarding establishing its continuing relevance.

Chapter 4 - Audit Evidence

12. TUV & Co., Chartered Accountants, are appointed as statutory auditors of DEF Ltd. for the year ending on 31st March, 2026. During the audit of trade receivables, the auditors assess a high risk of material misstatement due to weak internal controls and absence of effective testing of controls.

As a result, the audit team decides to rely more on substantive procedures, particularly tests of details, to obtain sufficient appropriate audit evidence. While planning the audit sampling, a junior auditor raises a query regarding how the assessment of risk of material misstatement impacts the sample size.

In the above context, explain how the assessment of risk of material misstatement influences the sample size for tests of details.

13. VW & Co., Chartered Accountants, are auditing GHI Ltd., a company engaged in infrastructure development. The company has recognized significant amount of provisions relating to environmental restoration costs based on a report prepared by an external environmental expert engaged by the management.

During the audit, the auditor considers using this report as audit evidence. However, the auditor is concerned about the reliability of the expert's work and the extent to which it can be relied upon without performing additional procedures.

Considering above facts, explain the factors that affect the nature, timing and extent of audit procedures when audit evidence is based on the work of a management's expert.

Chapter 5 - Audit of Items of Financial Statements

14. XYZ & Co., Chartered Accountants, are statutory auditors of JKL Ltd., a manufacturing company, for the financial year ended 31st March 2026. During the audit, the engagement partner emphasises the importance of

verifying the completeness of inventories, as inventory constitutes a significant portion of total assets.

The audit team observes that inventory is stored at multiple locations, including third-party warehouses and that the company deals in consignment goods as well. Further, there are concerns regarding cut-off errors and discrepancies between physical stock and accounting records.

Having regard to above, explain the audit procedures to establish the completeness of inventories.

Chapter 6 - Audit Documentation

15. ABC & Co., Chartered Accountants, have completed the audit of PQR Ltd., a large and complex entity, for the financial year ended 31st March, 2026. During the audit, several significant matters were identified, including revenue recognition issues and valuation of financial instruments.

Before finalising the audit file, the engagement partner suggests preparing a structured summary highlighting all key issues identified during the audit and how they were resolved. Mr. D, audit assistant queries the purpose and usefulness of such a document in audit documentation.

With reference to the above situation, explain the concept of Completion Memorandum (Audit Documentation Summary) and its significance in audit.

Chapter 7 - Completion and Review

16. EF & Co., Chartered Accountants, are the appointed statutory auditors of UVW Ltd. for the financial year ended 31st March, 2026. During the audit, the auditor reviews management's assessment of the company's ability to continue as a going concern. The company has a consistent history of profitability and easy access to bank finance. However, management has not prepared a detailed analysis to support its assessment.

In a separate case, EF & Co. are auditing XYZ Ltd. The auditor notices that management's assessment of the entity's ability to continue as a going concern covers only 9 months from the date of the financial statements.

Explain how the auditor should evaluate management's assessment of the entity's ability to continue as a going concern in the above cases.

Chapter 8 - Audit Report

17. "Using the Work of Another Auditor" is a critical area in the audit of entities having branches or components audited by auditors other than the principal auditor.

With reference to SA 600 – Using the Work of Another Auditor, explain:

1. The need for coordination and proper understanding between the principal auditor and the other auditor; and
2. The procedures to be performed by the principal auditor to evaluate and use the work of the other auditor, including circumstances where the principal auditor may need to visit the component or examine its records.

Chapter 9 - Special Features of Audit of Different Type of Entities

18. You have been appointed as the statutory auditor of a society "Bright Future Welfare Society", registered for promoting educational and social welfare activities in rural areas. The society receives donations from public, grants from government agencies and contributions from foreign donors for conducting awareness programs and skill development camps.

During audit for the financial year 2025-26, you observe that society has incurred substantial expenditure on welfare activities, administrative expenses and purchase of educational materials. Certain expenditures were later reimbursed by specific donors based on utilisation certificates submitted by society. Further, a few complaints alleging improper utilisation of funds were filed before the Registrar of Societies and an inquiry was initiated regarding the financial condition and functioning of the governing body.

The management has also claimed exemption under the Income Tax Act and informed that the society is registered under the Foreign Contribution (Regulation) Act, 2010 for receiving overseas donations. As an auditor, explain the various audit considerations and procedures relevant in the audit of a society.

Chapter 10 - Audit of Banks

19. During the statutory audit of Pragati Bank Ltd. for the financial year ended 31st March, 2026, CA Nikhil examined the advances portfolio and noticed several irregular loan accounts. A cash credit facility granted to M/s Aarav Traders amounting to ₹ 80 lakhs had remained non-performing for 8 months.

Another loan granted to M/s Bright Metals amounting to ₹ 120 lakhs, secured by assets valued at ₹ 90 lakhs, had remained in the doubtful category for 6 months.

A term loan of ₹ 200 lakhs granted to M/s Crest Infrastructure, secured to the extent of ₹ 120 lakhs, continued as doubtful for 30 months.

Further, a loan of ₹ 150 lakhs granted to M/s Delta Exports, having security value of only ₹ 40 lakhs, had remained doubtful for more than 5 years.

In another case, an advance of ₹ 50 lakhs granted to M/s Eagle Industries was identified by the internal auditor as irrecoverable, though the same had not yet been written off by the bank.

The management, however, made provisions that were substantially lower than the prudential requirements prescribed by the RBI. Comment on the classification of these assets and the adequacy of provisions required to be made by the bank.

Chapter 11 - Ethics and Terms of Audit Engagements

20. During the statutory audit of Cee Manufacturing Ltd. for the financial year ended 31st March 2026, CA Karan, the engagement partner of Karan & Co., observed several circumstances affecting independence of auditors. One of the partners of the audit firm held shares in the company. The audit firm had also granted a loan to one of the directors of the company. Further, fees received from Cee Manufacturing Ltd.

constituted a major portion of the firm's annual revenue and the firm was concerned that adverse reporting might result in loss of the engagement.

It was also noticed that the audit firm undertook internal audit and management consultancy services for the company during the year and these areas were now subject to statutory audit. In addition, one of the audit team members recently served as Finance Manager of the company before joining the audit firm. Identify the threats to independence arising in the above case and explain their implications.



SUGGESTED ANSWERS

PART – I: Answers to Multiple Choice Questions

MCQ No.	Answer
1.	(c)
2.	(c)
3.	(d)
4.	(a)
5.	(b)
6.	(c)
7.	(a)
8.	(d)

PART – II: Answers to Descriptive Questions

9. Meaning of Assurance Engagement

"Assurance engagement" means an engagement in which a practitioner expresses a conclusion designed to enhance the degree of confidence of the intended users other than the responsible party about the outcome of the evaluation or measurement of a subject matter against criteria.

It means that the practitioner gives an opinion about specific information due to which users of information are able to make

confident decisions knowing well that chance of information being incorrect is diminished.

Identification in the given case:

- (I) Practitioner: CST & Co., Chartered Accountants
- (II) Responsible Party: Management of ABC Ltd.
- (III) Intended Users: Shareholders, Investors, lenders and other stakeholders

Elements of an Assurance Engagement

Following elements comprise an assurance engagement: -

- (i) **A three party relationship involving a practitioner, a responsible party and intended users:** An assurance engagement involves abovesaid three parties. A practitioner is a person who provides the assurance. The term practitioner is broader than auditor. Audit is related to historical information whereas practitioner may provide assurance not necessarily related to historical financial information.

A responsible party is the party responsible for preparation of subject matter.

Intended users are the persons for whom an assurance report is prepared. These persons may use the report in making decisions.

- (ii) **An appropriate subject matter:** It refers to the information to be examined by the practitioner. For example, financial information contained in financial statements while conducting audit of financial statements.
- (iii) **Suitable criteria:** These refer to benchmarks used to evaluate the subject matter like standards, guidance, laws, rules and regulations.
- (iv) **Sufficient appropriate evidence:** The practitioner performs an assurance engagement to obtain sufficient appropriate evidence. It is on the basis of evidence that conclusions are arrived and an opinion is formed by auditor.

(v) A written assurance report in appropriate form

A written report is provided containing conclusion that conveys the assurance about the subject matter. A written assurance report is the outcome of an assurance engagement.

10. The auditor shall document:

- (a) the overall audit strategy
- (b) the audit plan and
- (c) any significant changes made during the audit engagement to the overall audit strategy or the audit plan, and the reasons for such changes.

The documentation of the overall audit strategy is a record of the key decisions considered necessary to properly plan the audit and to communicate significant matters to the engagement team.

The documentation of the audit plan is a record of the planned nature, timing and extent of risk assessment procedures and further audit procedures at the assertion level in response to the assessed risks. It also serves as a record of the proper planning of the audit procedures that can be reviewed and approved prior to their performance. The auditor may use standard audit programs and/or audit completion checklists, tailored as needed to reflect the particular engagement circumstances.

A record of the significant changes to the overall audit strategy and the audit plan, and resulting changes to the planned nature, timing and extent of audit procedures, explains why the significant changes were made, and the overall strategy and audit plan finally adopted for the audit. It also reflects the appropriate response to the significant changes occurring during the audit.

In the given facts, M/s KLM & Co. have complied with the documentation requirements by recording the audit strategy, audit plan, and all significant changes along with reasons, thereby ensuring proper audit planning and compliance with auditing standards.

- 11. Using Audit Evidence Obtained in Previous Audits:** In determining whether it is appropriate to use audit evidence about the operating effectiveness of controls obtained in previous audits, and, if so, the length of the time period that may elapse before retesting a control, the auditor shall consider the following:
- (a) The effectiveness of other elements of internal control, including the control environment, the entity's monitoring of controls, and the entity's risk assessment process
 - (b) The risks arising from the characteristics of the control, including whether it is manual or automated
 - (c) The effectiveness of general IT-controls
 - (d) The effectiveness of the control and its application by the entity, including the nature and extent of deviations in the application of the control noted in previous audits, and whether there have been personnel changes that significantly affect the application of the control
 - (e) Whether the lack of a change in a particular control poses a risk due to changing circumstances and
 - (f) The risks of material misstatement and the extent of reliance on the control

If the auditor plans to use audit evidence from a previous audit about the operating effectiveness of specific controls, the auditor shall establish the continuing relevance of that evidence by obtaining audit evidence about whether significant changes in those controls have occurred subsequent to the previous audit.

Considering the given facts, the auditor should carefully evaluate the above factors, especially personnel changes and IT system upgrades, and establish whether the previous audit evidence remains relevant before deciding to rely on it or perform fresh testing.

- 12.** The higher the auditor's assessment of the risk of material misstatement, the larger the sample size needs to be. The auditor's assessment of the risk of material misstatement is affected by inherent risk and control risk.

For example, if the auditor does not perform tests of controls, the auditor's risk assessment cannot be reduced for the effective operation of internal controls with respect to the particular assertion. Therefore, in order to reduce audit risk to an acceptably low level, the auditor needs a low detection risk and will rely more on substantive procedures. The more audit evidence that is obtained from tests of details (that is, the lower the detection risk), the larger the sample size will need to be. Thus, we can say that there will be an increase in sample size in case of an increase in the auditor's assessment of the risk of material misstatement.

As per given facts, since the risk of material misstatement is high, the auditor should increase the sample size for tests of details to obtain sufficient appropriate audit evidence and reduce audit risk to an acceptably low level.

- 13.** When information to be used as audit evidence has been prepared using the work of a management's expert, the nature, timing and extent of audit procedures may be affected by such matters:
- The nature and complexity of the matter to which the management's expert relates.
 - The risks of material misstatement in the matter.
 - The availability of alternative sources of audit evidence.
 - The nature, scope and objectives of the management's expert's work.
 - Whether the management's expert is employed by the entity, or is a party engaged by it to provide relevant services.
 - The extent to which management can exercise control or influence over the work of the management's expert.
 - Whether the management's expert is subject to technical performance standards or other professional or industry requirements.
 - The nature and extent of any controls within the entity over the management's expert's work.

- The auditor's knowledge and experience of the management's expert's field of expertise.
- The auditor's previous experience of the work of that expert.

In view of above, the auditor should evaluate the above factors before relying on the environmental expert's report and determine the appropriate nature, timing and extent of further audit procedures to ensure the reliability of audit evidence.

14. Audit procedure to establish the Completeness of Inventories:

1. Perform analytical procedures (comparison tests with industry averages, budgets, prior years, trend analysis, etc.).
 - Compute inventory turnover ratio (COGS/ average inventory)
 - Perform vertical analysis (inventory/ total assets)
 - Compare budgetary expectations vis-vis actuals
2. Examine non-financial information related to inventory, such as weights and other measurements.
3. Perform purchase and sales cut-off tests. Trace shipping documents (bills of lading and receiving reports, warehouse records, and inventory records) to accounting records immediately before and after year-end.
4. With respect to tagged inventory, perform tests for omitted transactions and tests for invalid transactions.
5. Verify the clerical and arithmetical accuracy of inventory listings.
6. Reconcile physical inventory amounts with perpetual records.
7. Reconcile physical counts with general ledger control totals.
8. Reconcile inventories which belong to client but are held with third parties like transporters, warehouses, port authorities etc.
9. Goods received on consignment basis have been properly segregated from other items of inventory.

In the given situation, by performing the above procedures, the auditor can ensure that all inventory items have been completely recorded in the books and no material items have been omitted.

- 15. Completion Memorandum or Audit Documentation Summary:** The auditor may consider it helpful to prepare and retain as part of the audit documentation a summary (sometimes known as a completion memorandum) that describes-

- the significant matters identified during the audit and
- how they were addressed.

Such a summary may facilitate effective and efficient review and inspection of the audit documentation, particularly for large and complex audits. Further, the preparation of such a summary may assist auditor's consideration of the significant matters. It may also help the auditor to consider whether there is any individual relevant SA objective that the auditor cannot achieve that would prevent the auditor from achieving the overall objectives of the auditor.

In light of the above, a completion memorandum will help systematically document significant audit issues and their resolution, thereby facilitating efficient review of the audit file and providing a clear summary of important audit conclusions reached during the audit.

- 16. Evaluating management's assessment:** The auditor shall evaluate management's assessment of the entity's ability to continue as a going concern. Management's assessment of the entity's ability to continue as a going concern is a key part of the auditor's consideration of management's use of the going concern basis of accounting.

In the case of UVW Ltd., it is not the auditor's responsibility to rectify the lack of analysis by management. In some circumstances, however, the lack of detailed analysis by management to support its assessment may not prevent the auditor from concluding whether management's use of the going concern basis of accounting is appropriate in the circumstances.

For example, when there is a history of profitable operations and a ready access to financial resources, as in the case of UVW Ltd., management may make its assessment without detailed analysis. In this case, the auditor's evaluation of the appropriateness of management's assessment may be made without performing detailed evaluation procedures if the auditor's other audit procedures are sufficient to enable the auditor to conclude whether management's use of the going concern basis of accounting in the preparation of the financial statements is appropriate in the circumstances.

However, in circumstances where the entity does not have strong financial indicators or where uncertainty exists, evaluating management's assessment of the entity's ability to continue as a going concern, may include an evaluation of the process management followed to make its assessment, the assumptions on which the assessment is based and management's plans for future action and whether management's plans are feasible in the circumstances.

In the separate case of XYZ Ltd., while evaluating management's assessment of the entity's ability to continue as a going concern, the auditor shall cover the same period as that used by management to make its assessment as required by the applicable financial reporting framework, or by law or regulation if it specifies a longer period. If management's assessment of the entity's ability to continue as a going concern covers less than twelve months from the date of the financial statements, the auditor shall request management to extend its assessment period to at least twelve months from that date.

Accordingly, in the case of UVW Ltd., the auditor may conclude that management's use of the going concern basis of accounting is appropriate even without detailed analysis, provided sufficient appropriate audit evidence is available from other audit procedures and the company continues to demonstrate profitable operations and access to financial resources. However, in the case of XYZ Ltd., management's assessment is inadequate as it covers only 9 months from the date of the financial statements. Therefore, the auditor should request management to extend the assessment period to at least twelve months

and thereafter evaluate the appropriateness of the going concern assumption in accordance with SA 570 (Revised).

- 17. Using the Work of another Auditor:** When the accounts of the branch are audited by a person other than the company's auditor (or principal auditor), there is need for a clear understanding of the role of such other auditor and the company's auditor in relation to the audit of the accounts of the branch and the audit of the company as a whole; also, there is great necessity for a proper rapport between these two auditors for the purpose of an effective audit. In recognition of these needs, the Council of the Institute of Chartered Accountants of India has dealt with these issues in SA 600, "Using the Work of another Auditor". It makes clear that in certain situations, the statute governing the entity may confer a right on the principal auditor to visit a component and examine the books of account and other records of the said component, if he thinks it necessary to do so. Where another auditor has been appointed for the component, the principal auditor would normally be entitled to rely upon the work of such auditor unless there are special circumstances to make it essential for him to visit the component and/or to examine the books of account and other records of the said component. Further, it requires that the principal auditor should perform procedures to obtain sufficient appropriate audit evidence, that the work of the other auditor is adequate for the principal auditor's purposes, in the context of the specific assignment.

When using the work of another auditor, the principal auditor should ordinarily perform the following procedures:

- (a) advise the other auditor of the use that is to be made of the other auditor's work and report and make sufficient arrangements for co-ordination of their efforts at the planning stage of the audit. The principal auditor would inform the other auditor of matters such as are as requiring special consideration, procedures for the identification of inter-component transactions that may require disclosure and the time-table for completion of audit; and

- (b) advise the other auditor of the significant accounting, auditing and reporting requirements and obtain representation as to compliance with them.

The principal auditor might discuss with the other auditor the audit procedures applied or review a written summary of the other auditor's procedures and findings which may be in the form of a completed questionnaire or check-list. The principal auditor may also wish to visit the other auditor. The nature, timing and extent of procedures will depend on the circumstances of the engagement and the principal auditor's knowledge of the professional competence of the other auditor. This knowledge may have been enhanced from the review of the previous audit work of the other auditor.

- 18.** The auditor's considerations and procedures relevant in the audit of a society:
- (a) The auditor should ascertain governing legislation of society i.e. Societies Registration Act, 1860 or any applicable state law under which it has been registered.
 - (b) Object of society needs to be ascertained from its memorandum of association/bye laws. Its activities may include charitable, social, cultural or educational activities.
 - (c) Ascertain whether society has obtained registration under Foreign Contribution (Regulation) Act, 2010 in case foreign contributions are received.
 - (d) Ascertain whether it is also registered under relevant provisions of Income Tax Act which may make it eligible for tax exemption on its income.
 - (e) Obtain an understanding of internal control to design audit procedures with special reference to donations and various expenditures incurred in relation to achievements of objects of society.
 - (f) Evaluate appropriateness of accounting policies with special reference to donations and grants. Also evaluate accounting policies in relation to specific grants.

- (g) In case some expenses incurred by society are reimbursed by donors, ascertain how these are recognised in financial statements.
- (h) Ascertain, if any inquiry has been held by Registrar under applicable law in the working or financial condition of society and its implications for auditor's opinion.
- (i) Ascertain all cases of irregular, illegal or improper expenditure or failure or omission to recover monies or other property belonging to society or of loss or waste of money or other property thereof.
- (j) Ascertain whether such expenditure or waste was caused in consequence of breach of trust or misapplication or any other misconduct on the part of governing body.

Thus, in the audit of *Bright Future Welfare Society*, the auditor should ensure that the financial affairs and activities of the society are carried out in accordance with its stated objectives and the applicable legal and regulatory framework. Considering the receipt of grants, public donations, foreign contributions, reimbursement-based funding arrangements and the inquiry initiated by the Registrar of Societies, the auditor should exercise professional skepticism while evaluating the utilization of funds and governance practices of the society.

The auditor should also evaluate the effect of any adverse findings, non-compliance, or irregularities in the financial statements and determine the consequential impact on the audit report, including the need for suitable reporting or modification, wherever necessary.

- 19.** As per prudential norms applicable to banks in India, an asset which remains non-performing for a period less than or equal to 12 months is classified as a Substandard Asset and requires provision at 15% of the outstanding amount. Accordingly, the advance granted to M/s Aarav Traders, which remained NPA for 8 months, should be classified as a Substandard Asset and provision should be made at 15% of ₹ 80 lakhs, i.e., ₹ 12 lakhs.

The advance granted to M/s Bright Metals amounting to ₹ 120 lakhs, secured to the extent of ₹ 90 lakhs, had remained doubtful for 6 months. Since the doubtful period is less than 1 year, it should be classified as Doubtful Asset – up to 1 year (D1). Provision is required at 25% on the

secured portion and 100% on the unsecured portion. Therefore, provision on secured portion of ₹ 90 lakhs would amount to ₹ 22.5 lakhs, while unsecured portion of ₹ 30 lakhs would require full provision of ₹ 30 lakhs, resulting in total provision requirement of ₹ 52.5 lakhs.

The advance granted to M/s Crest Infrastructure amounting to ₹ 200 lakhs, secured by assets valued at ₹ 120 lakhs, had remained doubtful for 30 months. Since the doubtful period is more than 1 year but less than 3 years, the asset should be classified as Doubtful Asset – 1 to 3 years (D2). Provision is required at 40% on the secured portion and 100% on the unsecured portion. Therefore, provision on secured portion of ₹ 120 lakhs would amount to ₹ 48 lakhs, while unsecured portion of ₹ 80 lakhs would require full provision of ₹ 80 lakhs. Hence, the total provision required would be ₹ 128 lakhs.

The advance granted to M/s Delta Exports remained doubtful for more than 5 years and therefore falls under Doubtful Asset – more than 3 years (D3). In such cases, provision is required at 100% on both secured and unsecured portions. Hence, the entire outstanding amount of ₹ 150 lakhs requires provision.

Further, where loss has been identified by the bank, internal auditor, external auditor, or regulator but the amount has not yet been written off, the asset is treated as a Loss Asset requiring 100% provision. Therefore, the advance of ₹ 50 lakhs granted to M/s Eagle Industries should be classified as a Loss Asset and fully provided for.

Thus, the bank is required to make adequate provisions in accordance with prudential norms relating to income recognition, asset classification and provisioning, failing which profits and advances would be overstated in the financial statements.

- 20.** In the given case, both self-interest threats and self-review threats to auditor's independence are present.

Self-interest threats occur when an auditing firm, its partner or associate could benefit from a financial interest in an audit client. In the present case, holding shares in Cee Manufacturing Ltd. by a partner of the audit firm creates a direct financial interest in the client and therefore

constitutes a self-interest threat. Similarly, granting a loan to a director of the company also creates a financial relationship affecting auditor independence. Further, undue dependence on the fees received from the client gives rise to a self-interest threat because the auditor may become reluctant to issue adverse findings due to fear of losing the engagement.

Self-review threats occur when during a review of any judgement or conclusion reached in a previous audit or non-audit engagement, or when a member of the audit team was previously a director or senior employee of the client. In the given case, the audit firm had undertaken internal audit and management consultancy services for the company, which are now subject matters of statutory audit. Thus, the auditor would be reviewing work performed by the firm itself, resulting in a self-review threat. Further, one of the audit team members had recently served as Finance Manager of the company. Since such person may be required to examine accounting records and decisions made during his own tenure, a self-review threat also arises in this situation.

Accordingly, these circumstances impair the independence and objectivity of the auditor and appropriate safeguards should be implemented to reduce the threats to an acceptable level.



PAPER – 6: FINANCIAL MANAGEMENT AND STRATEGIC MANAGEMENT

6A: FINANCIAL MANAGEMENT



QUESTIONS

Case Scenarios

1. AURO Engineering Pvt. Ltd. is engaged in the manufacturing of industrial machinery and heavy engineering equipment used in infrastructure, automobile, and renewable-energy projects. Over the last few years, the company has achieved stable growth in revenues and profitability due to increasing demand from domestic and export markets. The management is presently evaluating its long-term financing strategy in view of its proposed expansion into high-capacity precision engineering equipment.

The General Manager - Finance of the company CA Jenisha K informed the Board of Directors that the company has been maintaining a balanced capital structure consisting of equity shares, preference shares, and long-term debentures. However, with the proposed expansion plans, the company is considering additional debt financing to take advantage of financial leverage and tax benefits associated with debt capital.

As on 31st March, 2026, the company had the following capital structure at book values:

Particulars	Amount (₹)
Equity Share Capital (1,00,00,000 shares)	30,00,00,000

11.5% Preference Shares	6,00,00,000
10% Debentures	10,00,00,000
Total Capital Employed	46,00,00,000

The equity shares of the company are currently quoted at ₹ 300 per share in the stock market. The company expects to pay a dividend of ₹ 15 per equity share next year, and the dividend is expected to grow at a constant rate of 5% per annum indefinitely. The applicable corporate tax rate for the company is 35%.

The management is now considering raising additional debt of ₹ 5,00,00,000 by issuing 12% debentures. The Finance Director expects that the proposed increase in financial leverage may improve shareholders' returns in the short run. As a result of the revised financing plan, the expected dividend per share is estimated to increase to ₹ 20 per share, while the dividend growth rate is expected to remain unchanged at 5% per annum. However, due to increased financial risk arising from higher leverage, the market price of the company's equity shares is expected to decline to ₹ 250 per share.

The Board of Directors has requested the finance team to evaluate the impact of the proposed financing decision on the company's overall cost of capital and advise whether the revised capital structure would be financially beneficial for the company.

You are required to answer the following the questions:

- (i) What will be the Cost of Equity (K_e) under the existing capital structure?
 - (a) 9%
 - (b) 10%
 - (c) 10.25%
 - (d) 11%
- (ii) What will be the existing Weighted Average Cost of Capital (WACC) of the company?
 - (a) 9.12%

- (b) 9.43%
 - (c) 9.85%
 - (d) 10.20%
- (iii) What will be the revised Cost of Equity (K_e) after raising additional debt?
- (a) 11%
 - (b) 12%
 - (c) 13%
 - (d) 14%
- (iv) What will be the after-tax cost of the newly issued debentures?
- (a) 6.80%
 - (b) 7.20%
 - (c) 7.80%
 - (d) 8.40%
- (v) What will be the revised Weighted Average Cost of Capital (WACC) after the proposed debt financing?
- (a) 10.12%
 - (b) 10.48%
 - (c) 11.04%
 - (d) 11.62%
2. Total Assets & Current liabilities of the Manju Limited are 50 lakhs & 10 lakhs respectively. ROCE is 15%, measure of business operating risk is at 3.5 & P/V ratio is 70%. Calculate Sales.
- (a) 21 lakhs
 - (b) 30 lakhs
 - (c) 37.50 lakhs
 - (d) 40 lakhs

3. MT Ltd.'s opening stock was ₹ 3,20,000 and the closing stock was ₹ 4,80,000. Sales during the year were ₹ 18,00,000 and the gross profit ratio was 30% on sales. Average accounts payable are ₹ 1,20,000.

Creditors Turnover Ratio = ?

- (a) 11.83
- (b) 13.75
- (c) 14.00
- (d) 15.50

Ratio

4. The following information of ASD Ltd. relate to the year ended 31st March, 2026:

Net profit	8% of sales
Raw materials consumed	20% of Cost of Goods Sold
Direct wages	10% of Cost of Goods Sold
Stock of raw materials	3 months' usage
Stock of finished goods	6% of Cost of Goods Sold
Gross Profit	15% of Sales
Debt collection period	2 Months
(All sales are on credit)	
Current ratio	2 : 1
Fixed assets to Current assets	13 : 11
Fixed assets to sales	1 : 3
Long-term loans to Current liabilities	2 : 1
Capital to Reserves and Surplus	1 : 4

You are required to PREPARE-

- (a) Profit & Loss Statement of ASD Limited for the year ended 31st March, 2026 in the following format.

Particulars	(₹)	Particulars	(₹)
To Direct Materials consumed	?	By Sales	?
To Direct Wages	?		
To Works (Overhead)	?		
To Gross Profit c/d	?		
	?		?
To Selling and Distribution Expenses	?	By Gross Profit b/d	?
To Net Profit	?		
	?		?

(b) Balance Sheet as on 31st March, 2026 in the following format.

Liabilities	(₹)	Assets	(₹)
Share Capital	?	Fixed Assets	1,30,00,000
Reserves and Surplus	?	Current Assets:	
Long term loans	?	Stock of Raw Material	?
Current liabilities	?	Stock of Finished Goods	?
		Debtors	?
		Cash	?
	?		?

Leverage

5. Anirban Ltd. is a well-established manufacturing company engaged in producing industrial components for various engineering industries. The management intends to assess the company's financial performance and capital structure efficiency using key financial ratios and leverage measures. The following information has been extracted from the company's latest financial statements.

Capital Structure of Anirban Ltd.

Source of Finance	Amount (₹)
Equity Share Capital (₹10 per share)	8,00,000
10% Preference Share Capital (₹100 per share)	5,00,000
12% Debentures (₹100 each)	7,00,000
Total Capital Employed	20,00,000

Additional Information:

1. The company reported a Profit After Tax (PAT) of ₹ 2,80,000 during the year.
2. The applicable corporate tax rate is 30%.
3. Total operating expenses, including depreciation of ₹ 96,800, are equal to 1.5 times the Earnings Before Interest and Tax (EBIT).
4. Equity shareholders were paid a dividend at the rate of 15%.
5. The market price per equity share is ₹ 23.

Required:

Based on the information provided above, calculate the following:

- (i) Operating Leverage and Financial Leverage.
- (ii) Preference Dividend Cover and Equity Dividend Cover.
- (iii) Earnings Yield Ratio.
- (iv) Price–Earnings (P/E) Ratio.

Show all necessary workings and assumptions clearly.

Dividend decision

6. The stocks of Firms A and B are considered to be equally risky. Investors expect the share of Firm A, which does not intend to pay any dividend, to be worth ₹ 100 one year from now.

Similarly, investors expect a total payoff of ₹ 100 from the share of Firm B after one year, comprising ₹ 10 as dividend income and ₹ 90 as the expected share price.

Dividends are taxed at 25 percent, while capital gains are taxed at 12 percent.

Assuming that each stock is expected to provide a post-tax rate of return of 18 percent and that the radical position holds, determine the current market prices of the shares of Firms A and B.

Capital Budgeting Decision

7. The management of P Limited is evaluating two mutually exclusive investment alternatives, namely Machine I and Machine II, for acquisition. The company has a cost of capital of 12% and is subject to a corporate tax rate of 30%.

The relevant details of the two machines are provided below:

Particulars	Machine I	Machine II
Initial Cost of Machine	₹ 10,00,000	₹ 15,00,000
Useful Life	5 years	6 years
Annual Income Before Depreciation and Tax	₹ 3,45,000	₹ 4,55,000

Additional Information:

- Depreciation is to be charged using the Straight-Line Method (SLM) over the useful life of each machine.

Required:

- Compute the following capital budgeting indicators for each machine:
 - Discounted Payback Period (DPP)
 - Net Present Value (NPV)
 - Internal Rate of Return (IRR)
- Based on the results obtained, recommend which machine should be selected by the management of P Limited, providing appropriate justification.

The present value factors of Re. 1 are as follows:

Year	1	2	3	4	5	6
At 12%	.893	.797	.712	.636	.567	.507
At 13%	.885	.783	.693	.613	.543	.480
At 14%	.877	.769	.675	.592	.519	.456
At 15%	.870	.756	.658	.572	.497	.432
At 16%	.862	.743	.641	.552	.476	.410

Working Capital Management

8. A firm has total annual sales of ₹ 200 lakhs, of which 80% are made on credit. The company offers credit terms of 2/40, net 120. Out of the total credit customers, 50% avail themselves of the cash discount, while the remaining customers settle their accounts after 120 days.

Based on past experience, bad debt losses amount to approximately 1% of credit sales. In addition, the firm incurs ₹ 2,40,000 per annum in administering its credit sales. These costs can be avoided because a factor is willing to purchase the firm's receivables.

The factor will charge a 2% commission and provide advances against receivables at an interest rate of 18%, while retaining 10% of the receivables as a reserve.

Required:

- (i) Determine the effective cost of factoring. Assume a 360-day year.
 - (ii) If bank finance for working capital is available at an interest rate of 14%, advise whether the firm should avail itself of the factoring service.
9. You have been asked to prepare a cash budget for the next quarter, January through March, for Jahanara Fashions. They have provided you with the following information:
- a. Sales are expected to be: ₹ 400,000 in January, ₹ 400,000 in February, and ₹ 600,000 in March. All sales will be in cash.

- b. The estimated purchases are: ₹380,000 in January, ₹ 360,000 in February, and ₹ 450,000 in March. Payments for purchases will be made after a lag of one month. Outstanding on account of purchases in December last are ₹ 350,000.
- c. The rent per month is ₹ 10,000 and the partners' personal withdrawal per month is ₹25,000.
- d. Salaries and other expenses, payable in cash, are expected to be: ₹ 25,000 in January, ₹ 20,000 in February, and ₹ 30,000 in March.
- e. They plan to buy furniture worth ₹ 40,000 on cash payment in January.
- f. The cash balance at present is ₹ 6,000. Their target cash balance, however, is ₹ 15,000. What will be surplus/ deficit of cash in relation to their target cash balance?

Miscellaneous

10. (a) PQR Ltd. expanded its business by purchasing new machinery and increasing production. However, due to poor financial planning, the company is facing cash shortages, rising expenses, and difficulty managing its working capital. The management is now focusing on better budgeting, cost control, and cash flow management. In the light of the above case, explain the importance of financial management and how it helps a business achieve growth, profitability, and financial stability.
- (b) Global Infra Ltd., an Indian infrastructure company, plans to raise funds from international markets for its expansion project. The Finance Director is evaluating various foreign bond options. Explain various foreign bonds for Global Infra Ltd. and their key features.
- (c) Sunrise Healthcare Pvt. Ltd. operates a chain of pharmacies across India. The company has recently experienced rising raw material costs, fluctuations in exchange rates affecting imported medicines, and increasing inventory levels due to uncertain demand. Management is also reviewing its credit policy to improve cash

flows and is considering various short-term financing options to meet working capital needs.

In the context of the above case, discuss the factors that should be considered by Sunrise Healthcare Pvt. Ltd. while planning its working capital requirements.



SUGGESTED ANSWERS/HINTS

Division A: Case Scenario

(i) (b) 10%

Using Dividend Growth Model:

$$K_e = \frac{D_1}{P_0} + g$$

Where:

- $D_1 = ₹ 15$
- $P_0 = ₹ 300$
- $g = 5\%$

$$\begin{aligned} K_e &= \frac{15}{300} + 0.05 \\ &= 0.05 + 0.05 \\ &= 10\% \end{aligned}$$

(ii) (b) 9.43%

Cost of Preference Shares

$$K_p = 11.5/100 = 11.5\%$$

After-tax Cost of Debentures

$$K_d = 10\% (1 - 0.35) = 6.5\%$$

WACC Computation

Source	Amount (₹)	Weight (W)	Cost (C)	Weighted Cost (W x C)
Equity Shares	30,00,00,000	0.6522	10%	6.52%
Preference Shares	6,00,00,000	0.1304	11.5%	1.50%
Debentures	10,00,00,000	0.2174	6.5%	1.41%
Total	46,00,00,000	1.0000		9.43%

(iii) (c) 13% Solution:

Using Dividend Growth Model:

$$K_e = \frac{20}{250} + 0.05$$

$$= 0.08 + 0.05$$

$$= 13\%$$

(iv) (c) 7.80%

$$K_d = 12\% (1 - 0.35)$$

$$= 7.8\%$$

(v) (c) 11.04%
Revised Capital Structure

Particulars	Amount (₹)
Equity Share Capital	30,00,00,000
Preference Shares	6,00,00,000
Existing Debentures	10,00,00,000
New Debentures	5,00,00,000
Total Capital	51,00,00,000

Revised WACC Computation

Source	Weight (W)	Cost (C)	Weighted Cost (W x C)
Equity Shares	0.5882	13%	7.65%
Preference Shares	0.1176	11.5%	1.35%

Existing Debentures	0.1961	6.5%	1.27%
New Debentures	0.0981	7.8%	0.77%
Total	1.0000		11.04%

2. (b) ROCE = EBIT / Total Capital Employed

Total Capital Employed = Total Assets – Current Liabilities

= 50 lakhs – 10 lakhs

= 40 lakhs

EBIT = 40 lakhs x 15%

= 6 lakhs

Now, OL of 3.5 = Contribution / EBIT

Therefore Contribution = 6 Lakhs X 3.5 = 21 lakhs

Sales = Contribution/PV Ratio = 21 lakhs/0.7 = 30 lakhs

3. (a) 11.83

Creditors Turnover Ratio = Purchases / Average Accounts Payable

Cost of Goods Sold = Opening Stock + Purchases - Closing Stock

Purchases = ₹ 12,60,000 + ₹ 4,80,000 – ₹ 3,20,000

Purchases = ₹ 14,20,000

Average Accounts Payable = ₹ 1,20,000

Creditors Turnover Ratio = Purchases/Average Accounts Payable

Creditors Turnover Ratio = ₹ 14,20,000 / ₹ 1,20,000

Creditors Turnover Ratio = 11.833

Therefore, the Creditors Turnover Ratio is 11.833.

4. Working Notes:

- (i) Calculation of Sales

$$\frac{\text{Fixed Assets}}{\text{Sales}} = \frac{1}{3}$$

$$\therefore \frac{1,30,00,000}{\text{Sales}} = \frac{1}{3} \Rightarrow \text{Sales} = ₹ 3,90,00,000$$

- (ii) Calculation of Current Assets

$$\frac{\text{Fixed Assets}}{\text{Current Assets}} = \frac{13}{11}$$

$$\therefore \frac{1,30,00,000}{\text{Current Assets}} = \frac{13}{11} \Rightarrow \text{Current Assets} = ₹ 1,10,00,000$$

- (iii) Calculation of Raw Material Consumption and Direct Wages

	₹
Sales	3,90,00,000
Less: Gross Profit (15 % of Sales)	<u>58,50,000</u>
Cost of Goods sold	<u>3,31,50,000</u>

Raw Material Consumption (20% of Cost of Goods Sold) ₹ 66,30,000

Direct Wages (10% of Cost of Goods Sold) ₹ 33,15,000

- (iv) Calculation of Stock of Raw Materials (= 3 months usage)

$$= 66,30,000 \times \frac{3}{12} = ₹ 16,57,500$$

- (v) Calculation of Stock of Finished Goods (= 6% of Cost of Goods Sold)

$$= 3,31,50,000 \times \frac{6}{100} = ₹ 19,89,000$$

- (vi) Calculation of Current Liabilities

$$\frac{\text{Current Assets}}{\text{Current Liabilities}} = 2$$

$$\frac{1,10,00,000}{\text{Current Liabilities}} = 2 \Rightarrow \text{Current Liabilities} = ₹ 55,00,000$$

(vii) Calculation of Debtors

$$\text{Average collection period} = \frac{\text{Debtors}}{\text{Credit Sales}} \times 12 \text{ months}$$

$$\frac{\text{Debtors}}{3,90,00,000} \times 12 = 2 \Rightarrow \text{Debtors} = ₹ 65,00,000$$

(viii) Calculation of Long-term Loan

$$\frac{\text{Long term Loan}}{\text{Current Liabilities}} = \frac{2}{1}$$

$$\frac{\text{Long term loan}}{55,00,000} = \frac{2}{1} \Rightarrow \text{Long term loan} = ₹ 1,10,00,000$$

(ix) Calculation of Cash Balance

	₹
Current assets	1,10,00,000
Less: Debtors	65,00,000
Raw materials stock	16,57,500
Finished goods stock	<u>19,89,000</u>
	1,01,46,500
Cash balance	<u>8,53,500</u>

(x) Calculation of Net worth

Fixed Assets	1,30,00,000
Current Assets	<u>1,10,00,000</u>
Total Assets	2,40,00,000
Less: Long term Loan	1,10,00,000
Current Liabilities	<u>55,00,000</u>
	1,65,00,000
Net worth	75,00,000

$$\text{Net worth} = \text{Share capital} + \text{Reserves} = ₹ 75,00,000$$

$$\frac{\text{Capital}}{\text{Reserves and Surplus}} = \frac{1}{4} \Rightarrow \text{Share Capital} = ₹ 75,00,000 \times \frac{1}{5}$$

$$= ₹ 15,00,000$$

$$\text{Reserves and Surplus} = ₹ 75,00,000 \times \frac{4}{5} = ₹ 60,00,000$$

**Profit and Loss Statement of ASD Ltd.
for the year ended 31st March, 2026**

Particulars	(₹)	Particulars	(₹)
To Direct Materials consumed	66,30,000	By Sales	3,90,00,000
To Direct Wages	33,15,000		
To Works (Overhead) (Bal. fig.)	2,32,05,000		
To Gross Profit c/d (15% of Sales)	58,50,000		
	3,90,00,000		3,90,00,000
To Selling and Distribution Expenses (Bal. fig.)	27,30,000	By Gross Profit b/d	58,50,000
To Net Profit (8% of Sales)	31,20,000		
	58,50,000		58,50,000

Balance Sheet of ASD Ltd. as at 31st March, 2026

Liabilities	(₹)	Assets	(₹)
Share Capital	15,00,000	Fixed Assets	1,30,00,000
Reserves and Surplus	60,00,000	Current Assets:	
Long term loans	1,10,00,000	Stock of Raw Material	16,57,500
Current liabilities	55,00,000	Stock of Finished Goods	19,89,000
		Debtors	65,00,000
		Cash	8,53,500
	2,40,00,000		2,40,00,000

5. Working Notes:

	(₹)
Net Profit after Tax	2,80,000
Tax @ 30%	1,20,000
EBT	4,00,000
Interest on Debentures	84,000
EBIT	4,84,000
Total Operating Expenses (1.5 times of EBIT)	7,26,000
Sales	12,10,000

(i) Operating Leverage

Variable operating expenses = ₹ 7,26,000 - 96,800 = ₹ 6,29,200

$$= \frac{\text{Contribution}}{\text{EBIT}} = \frac{\text{₹ } (12,10,000 - 6,29,200)}{\text{₹ } 4,84,000} = \frac{\text{₹ } 5,80,800}{\text{₹ } 4,84,000} = 1.2 \text{ times}$$

$$\text{Financial Leverage} = \frac{\text{EBIT}}{\text{EBT}} = \frac{4,84,000}{4,00,000} = 1.21 \text{ times}$$

(ii) Cover for Preference Dividend

$$= \frac{\text{PAT}}{\text{Preference Share Dividend}} = \frac{\text{₹ } 2,80,000}{\text{₹ } 50,000} = 5.6 \text{ times}$$

Cover for Equity Dividend

$$= \frac{(\text{PAT} - \text{Preference Dividend})}{\text{Equity Share Dividend}} = \frac{\text{₹ } (2,80,000 - 50,000)}{\text{₹ } 1,20,000}$$

$$= \frac{\text{₹ } 2,30,000}{\text{₹ } 1,20,000} = 1.92 \text{ times}$$

(iii) Earning Yield Ratio

$$= \frac{\text{EPS}}{\text{Market Price}} \times 100$$

$$= \left(\frac{\frac{2,30,000}{80,000} \times 100}{23} \right)$$

$$= \frac{2.875}{23} \times 100 = 12.5\%$$

(iv) **Price – Earnings Ratio (PE Ratio)**

$$= \frac{\text{Market Price}}{\text{EPS}} = \frac{23}{2.875}$$

$$= 8 \text{ times}$$

Note: All operating expenses, other than depreciation, are variable costs.

6.

	A	B
Next year's price	100	90
Dividend	0	10
Let the current price be	A	B
Post-tax capital appreciation	0.88(100-A)	0.88 (90-B)
Post-tax dividend income	0	0.75 x 10
Total return	<u>0.88 (100-A)</u>	<u>0.88 (90-B) + 7.5</u>
	A	B
	= 18%	=18%
Current price (obtained by solving the preceding equation)	A = ₹ 83.02	B = ₹ 81.79

7. (i) **Computation of Discounted Payback Period, Net Present Value (NPV) and Internal Rate of Return (IRR) for Two Machines**

Calculation of Cash Inflows

	Machine - I (₹)	Machine - II (₹)
Annual Income before Tax and Depreciation	3,45,000	4,55,000
Less: Depreciation		

Machine – I: 10,00,000 / 5	2,00,000	-
Machine – II: 15,00,000 / 6	-	<u>2,50,000</u>
Income before Tax	1,45,000	2,05,000
Less: Tax @ 30 %	<u>43,500</u>	<u>61,500</u>
Income after Tax	1,01,500	1,43,500
Add: Depreciation	<u>2,00,000</u>	<u>2,50,000</u>
Annual Cash Inflows	<u>3,01,500</u>	<u>3,93,500</u>

Year	P.V. of Re.1 @12%	Machine – I			Machine – II		
		Cash flow	P.V.	Cumulative P.V	Cash flow	P.V.	Cumulative P.V.
1	0.893	3,01,500	2,69,240	2,69,240	3,93,500	3,51,396	3,51,396
2	0.797	3,01,500	2,40,296	5,09,536	3,93,500	3,13,620	6,65,016
3	0.712	3,01,500	2,14,668	7,24,204	3,93,500	2,80,172	9,45,188
4	0.636	3,01,500	1,91,754	9,15,958	3,93,500	2,50,266	11,95,454
5	0.567	3,01,500	1,70,951	10,86,909	3,93,500	2,23,115	14,18,569
6	0.507	-	-	-	3,93,500	1,99,505	16,18,074

Discounted Payback Period for:

Machine – I

$$\begin{aligned}
 \text{Discounted Payback Period} &= 4 + \frac{(10,00,000 - 9,15,958)}{1,70,951} \\
 &= 4 + \frac{84,042}{1,70,951} = 4 + 0.4916 \\
 &= 4.49 \text{ years or 4 years and 5.9 months}
 \end{aligned}$$

Machine – II

$$\begin{aligned}
 \text{Discounted Payback Period} &= 5 + \frac{(15,00,000 - 14,18,569)}{1,99,505} = 5 + \frac{81,431}{1,99,505} \\
 &= 5 + 0.4082
 \end{aligned}$$

= 5.41 years or 5 years and 4.9 months

Net Present Value for:

Machine – I

$$\text{NPV} = ₹ 10,86,909 - 10,00,000 = ₹ 86,909$$

Machine – II

$$\text{NPV} = ₹ 16,18,074 - 15,00,000 = ₹ 1,18,074$$

Internal Rate of Return (IRR) for:

Machine – I

$$\text{P.V. Factor} = \frac{\text{Initial Investment}}{\text{Annual Cash Inflow}} = \frac{10,00,000}{3,01,500} = 3.3167$$

PV factor falls between 15% and 16%

Present Value of Cash inflow at 15% and 16% will be:

$$\text{Present Value at 15\%} = 3.353 \times 3,01,500 = 10,10,930$$

$$\text{Present Value at 16\%} = 3.274 \times 3,01,500 = 9,87,111$$

$$\text{IRR} = 15 + \frac{10,10,930 - 10,00,000}{10,10,930 - 9,87,111} \times (16 - 15) = 15 + \frac{10,930}{23,819} \times 1$$

$$= 15.4588\%$$

$$= 15.46\%$$

Machine - II

$$\text{P.V. Factor} = \frac{15,00,000}{3,93,500} = 3.8119$$

Present Value of Cash inflow at 14% and 15% will be:

$$\text{Present Value at 14\%} = 3.888 \times 3,93,500 = 15,29,928$$

$$\text{Present Value at 15\%} = 3.785 \times 3,93,500 = 14,89,398$$

$$\text{IRR} = 14 + \frac{15,29,928 - 15,00,000}{15,29,928 - 14,89,398} \times (15 - 14) = 14 + \frac{29,928}{40,530} \times 1 = 14.7384\%$$

= 14.74%

(ii) Advise to the Management

Ranking of Machines in terms of the Three Methods

	Machine - I	Machine - II
Discounted Payback Period	I	II
Net Present Value	II	I
Internal Rate of Return	I	II

Advise: Since Machine - I has better ranking than Machine – II, therefore, Machine – I should be selected

8.

Particulars	(₹)
Total Sales	₹ 200 lakhs
Credit Sales (80%)	₹ 160 lakhs
Receivables for 40 days	₹ 80 lakhs
Receivables for 120 days	₹ 80 lakhs
Average collection period [(40 × 0.5) + (120 × 0.5)]	80 days
Average level of Receivables (₹ 1,60,00,000 × 80/360)	₹ 35,55,556
Factoring Commission (₹ 35,55,556 × 2/100)	₹ 71,111
Factoring Reserve (₹ 35,55,556 × 10/100)	₹ 3,55,556
Amount available for advance {₹ 35,55,556 - (3,55,556 + 71,111)}	₹ 31,28,889
- Factor will deduct his interest @ 18% : - Interest = $\frac{₹ 31,28,889 \times 18 \times 80}{100 \times 360}$	₹ 1,25,156
Advance to be paid (₹ 31,28,889 – ₹ 1,25,156)	₹ 30,03,733

(i) Statement Showing Evaluation of Factoring Proposal

		₹
A.	Annual Cost of Factoring to the Firm:	
	Factoring commission (₹ 71,111 × 360/80)	3,20,000
	Interest charges (₹ 1,25,156 × 360/80)	<u>5,63,200</u>
	Total	<u>8,83,200</u>
B.	Firm's Savings on taking Factoring Service:	₹
	Cost of credit administration saved	2,40,000
	Bad Debts (₹ 1,60,00,000 × 1/100) avoided	<u>1,60,000</u>
	Total	<u>4,00,000</u>
C.	Net Cost to the firm (A – B) (₹ 8,83,200 – ₹ 4,00,000)	<u>4,83,200</u>

$$\text{Effective cost of factoring} = \frac{₹ 4,83,200}{₹ 30,03,733} \times 100 = 16.09\%$$

* If cost of factoring is calculated on the basis of total amount available for advance, then, it will be

$$= \frac{₹ 4,83,200}{₹ 31,28,889} \times 100 = 15.44\%$$

(ii) If Bank finance for working capital is available at 14%, firm will not avail factoring service as 14 % is less than 16.08% (or 15.44%)

9. The projected cash inflows and outflows for the quarter, January through March, is shown below:

Month	December	January	February	March
	(₹)	(₹)	(₹)	(₹)
Inflows:				
Sales collection		4,00,000	4,00,000	6,00,000
Outflows:				

Payment to sundry creditors		3,50,000	3,80,000	3,60,000
Rent		10,000	10,000	10,000
Drawings		25,000	25,000	25,000
Salaries & other expenses		25,000	20,000	30,000
Purchase of furniture		40,000		
Total outflows 2 to 6)		4,50,000	4,35,000	4,25,000

Given an opening cash balance of ₹6,000 and a target cash balance of ₹ 15,000, the surplus/deficit in relation to the target cash balance is worked out below:

	January (₹)	February (₹)	March (₹)
1. Opening balance	6,000		
2. Inflows	400,000	400,000	600,000
3. Outflows	450,000	435,000	425,000
4. Net cash flow (2 - 3)	(50,000)	(35,000)	175,000
5. Cumulative net cash flow	(50,000)	(85,000)	90,000
6. Opening balance + Cumulative net cash flow	(44,000)	(79,000)	96,000
7. Minimum cash balance required	15,000	15,000	15,000
8. Surplus/(Deficit)	(59,000)	(94,000)	81,000

10. (a) Importance of Financial Management cannot be over-emphasized. It is, indeed, the key to successful business operations. Without proper administration of finance, no business enterprise can reach at its full potentials for growth and success. Money is to an enterprise, what oil is to an engine.

Financial Management is all about planning investment, funding the investment, monitoring expenses against budget and managing gains from the investments. Financial management

means management of all matters related to an organization's finances.

The best way to demonstrate the importance of good financial management is to describe some of the tasks that it involves:-

- (a) **Taking care** not to over-invest in fixed assets
- (b) **Balancing** cash-outflow with cash-inflows
- (c) **Ensuring** that there is a sufficient level of short-term working capital
- (d) **Setting** sales revenue targets that will deliver growth
- (e) **Increasing** gross profit by setting the correct pricing for products or services
- (f) **Controlling** the level of general and administrative expenses by finding more cost-efficient ways of running the day-to-day business operations, and
- (g) **Tax planning** that will minimize the taxes a business has to pay.

(b) Foreign Bonds

Sl. No.	Name of Bond	Salient Features
1.	Foreign Currency Convertible Bond (FCCB)	- This bond comes at a very low rate of interest. - The advantage to the issuer is that the issuer can get foreign currency at a very low cost. - The risk is that in case the bond has to be redeemed on the date of maturity, the issuer has to make the payment and at that time the issuer may not have the money.
2.	Plain Vanilla Bond	The issuer would pay the

		principal amount along with the interest rate. • This type of bond would not have any options. • This bond can be issued in the form of discounted bond or can be issued in the form of coupon bearing bond.
3.	Convertible Floating Rate Notes (FRN)	• A convertible FRN is issued by giving its holder an option to convert it into a longer term debt security with a specified coupon • It protects an investor against falling interest rate • The long- term debt security can be sold in the market and the investor can earn profit • Capital gain is not applicable to FRN
4.	Drop Lock Bond	• It is a Floating Rate Note with a normal floating rate • The floating rate bond would be automatically converted into fixed rate bond if interest rate falls below a predetermined level • The new fixed rate stays till the drop lock bond reaches its maturity • The difference between the convertible floating rate note and drop lock bond is that the former is a long option

		structure and the later one is a short option structure
5.	Variable Rate Demand Obligations	• A normal floating rate note with a nominal maturity • The holder of the floating rate note can sell the obligation back to the trustee at par plus accrued interest • It gives the investor an option to exit, so it is more liquid than the normal FRN
6.	Yield Curve Note (YCN)	• It is a structured debt security • Yield increases when prevailing interest rate declines • Yield decreases when prevailing interest rate increases • This is used to hedge the interest rate • This works like inverse floater
7.	Euro Bond	• Euro bonds are issued or traded in a country using a currency other than the one in which the bond is denominated. This means that the bond uses a certain currency, but operates outside the jurisdiction of the Central Bank that issues that currency. • Eurobonds are issued by multinational corporations, for example, a British company may issue a Eurobond in Germany, denominating it in

		U.S. dollars. It is important to note that the term has nothing to do with the euro, and the prefix "euro-" is used more generally to refer to deposit outside the jurisdiction of the domestic central bank
--	--	---

(c) **Some of the factors which need to be considered while planning for working capital requirement are:**

- 1. Need for Cash:** Identify the cash balance which allows for the business to **meet day-to-day expenses** but reduces cash holding costs (example - loss of interest on long term investment had the surplus cash invested therein).
- 2. Desired level of Inventory: Identify the level of inventory** which allows for uninterrupted production but reduces the investment in raw materials and hence increases cash flow. The techniques like Just in Time (JIT) and Economic order quantity (EOQ) are used for this.
- 3. Receivables:** Identify the **appropriate credit policy**, i.e., credit terms which will attract customers, such that any impact on cash flows and the cash conversion cycle will be offset by increased revenue and hence Return on Capital (or vice versa). The tools like Early Payment Discounts and allowances are used for this.
- 4. Short-term Financing Options:** Inventory is ideally financed by credit granted by the supplier. However, depending on the cash conversion cycle, it may be necessary to utilize a bank loan (or overdraft), or to "convert debtors to cash" through "factoring" in order to finance working capital requirements.
- 5. Nature of Business:** For e.g. in a business of restaurant,

most of the sales are in Cash. Therefore, need for working capital is very less. On the other hand, there would be a higher inventory in case of a pharmacy or a bookstore.

6. **Market and Demand Conditions:** For e.g. if an item's demand far exceeds its production, the working capital requirement would be less as investment in finished goods inventory would be very less with continuous sales.
7. **Technology and Manufacturing Policies:** For e.g. in some businesses the **demand for goods is seasonal**, in that case a business may follow a policy for steady production throughout the whole year or rather may choose a policy of production only during the demand season.
8. **Operating Efficiency:** A company can reduce the working capital requirement by **eliminating waste, improving coordination, process improvements** etc.
9. **Price Level Changes & Exchange Rate Fluctuations:** For e.g. **rising prices necessitate the use of more funds** for maintaining an existing level of activity. For the same level of current assets, higher cash outlays are required. Therefore, the effect of rising prices is that a higher amount of working capital is required. Another example would be unfavorable exchange rate movement in case of imported raw materials would warrant additional cost of same.

6B: STRATEGIC MANAGEMENT

Multiple Choice Questions

1. Green Harvest Organics (GHO), a mid-sized agricultural company based in California, specializes in producing organic fruit and vegetables for local markets. The company's mission is to promote sustainable farming while delivering fresh, organic produce to its customers. While GHO has been profitable, they aim to expand their market presence and strengthen their competitive position in the organic food industry.

To align its internal structure with its growth goals, GHO's leadership applied the McKinsey 7S Model. They identified gaps in their shared values and organizational vision, which previously focused solely on local markets & competition. Their structure and systems are also being upgraded to support larger-scale operations, while staff are undergoing training to embrace a customer-centric approach. All seven elements of the McKinsey 7S Model were aligned to support organizational growth.

To expand its market share, GHO introduced loyalty programmes to encourage repeat purchases among existing customers and launched promotional campaigns to attract consumers who previously purchased conventional produce. These initiatives aim to strengthen customer retention, attract more buyers within existing markets, and enhance GHO's competitive position without expanding into new markets or spending money on introducing new products.

The company's growth strategy also involves establishing a chain of branded farm-to-table cafes. GHO plans to connect directly with consumers and increase its control over the distribution process. This move will allow GHO to capture additional value while strengthening its brand image.

As part of their marketing efforts, GHO created subscription boxes and guided its efforts towards educating customers about off-season produce. GHO ensured consistent demand throughout the year. This

strategy also aligns with their sustainability goals by reducing food waste.

To remain cost-competitive while maintaining high quality, GHO balanced premium-quality organic produce with efficient production methods, ensuring their products remain affordable for middle-income households. Advanced agricultural technology, like precision irrigation and eco-friendly pest control, has been critical in managing the costs and creating value-based offerings.

Now, GHO faces crucial decisions about how to scale operations while staying true to its core values of sustainability and quality.

Based on the above Case Scenario, answer the Multiple Choice Questions.

- (i) Green Harvest Organics adopted a market penetration strategy by introducing loyalty programmes and promotional campaigns within its existing markets. What is the primary objective of this strategy?
 - (a) Introducing new products into existing markets
 - (b) Increasing market share by selling existing products in existing markets
 - (c) Entering new geographical markets
 - (d) Diversifying into unrelated businesses
- (ii) Green Harvest Organics plans to establish branded farm-to-table cafés to directly serve consumers. Which growth strategy is being adopted?
 - (a) Backward Integration
 - (b) Horizontal Integration
 - (c) Vertical Forward Integration
 - (d) Market Development

- (iii) Green Harvest Organics combines premium-quality organic produce with efficient production methods to offer affordable prices. Which competitive strategy does this represent?
 - (a) Cost Leadership Strategy
 - (b) Differentiation Strategy
 - (c) Best-Cost Provider Strategy
 - (d) Focus Strategy
 - (iv) Which of the following strategic initiatives best demonstrates alignment between GHO's mission of promoting sustainable farming and its long-term vision of expanding its market presence?
 - (a) Launching branded farm-to-table cafés while continuing sustainable farming practices.
 - (b) Increasing promotional discounts without improving operational capabilities.
 - (c) Diversifying into unrelated businesses to maximise short-term profits.
 - (d) Outsourcing production to suppliers with lower environmental standards.
 - (v) How does the application of the McKinsey 7S Model help Green Harvest Organics achieve its expansion objectives?
 - (a) By developing new product lines
 - (b) By aligning strategy, structure, systems, staff, skills, style and shared values to support organizational growth
 - (c) By focusing only on marketing and branding initiatives
 - (d) By expanding into international markets
2. The Board of Directors of *Alpha Group Ltd.*, which operates in the textiles, hospitality and renewable energy businesses, has decided to acquire a pharmaceutical company to diversify its business portfolio and

reduce dependence on existing industries. This decision is an example of which level of strategic management?

- (a) Corporate Level
 - (b) Business Level
 - (c) Functional Level
 - (d) Operational Level
3. *FreshKart Retail Ltd.* observed that an increasing number of customers preferred shopping through mobile applications and expected doorstep delivery. In response, the company launched an AI-enabled e-commerce platform, creating an entirely new online business segment and attracting a large customer base. The emergence of such new markets and business segments is primarily influenced by which component of the external environment?
- (a) Political environment
 - (b) Economic environment
 - (c) Sociocultural environment
 - (d) Technological environment
4. *StrideX Footwear Ltd.* is planning to strengthen its position in the sports shoe market. Before acquiring a smaller rival, the management wants to identify competitor groups based on their pricing strategies and product range to locate firms with weak competitive positions. Which strategic tool would be most useful for this purpose?
- (a) Merger and Acquisition Planning
 - (b) BCG Growth Matrix
 - (c) Strategic Group Mapping
 - (d) GE Nine-Cell Matrix
5. *PrimeVision Entertainment Ltd.* had been incurring continuous losses for several years. After evaluating all revival options, the promoters concluded that selling the company's assets would generate higher value than continuing its operations. Accordingly, they decided to

permanently close the business and pursue asset sales. Which retrenchment strategy has the company adopted?

- (a) Restructuring Business
 - (b) Liquidation Strategy
 - (c) Business Process Re-engineering
 - (d) Divestment
6. At *Nova Healthcare Pvt. Ltd.*, the Hospital Administrator supervises the overall functioning of the diagnostics department. His responsibility includes allocating resources, coordinating departmental activities and ensuring that departmental goals are achieved efficiently and effectively. The Hospital Administrator is exercising:
- (a) Strategic control
 - (b) Management control
 - (c) Administrative control
 - (d) Operational control

Descriptive Questions

Chapter 1-Introduction to Strategic Management

7. *Novatek Electronics Ltd.* is a leading manufacturer of smart home appliances and planned to expand into Tier-2 cities, invest in AI-enabled products, strengthen its dealer network and increase exports. During implementation, a foreign competitor launched low-priced products, raw material prices increased and stricter energy efficiency regulations were introduced. Consequently, the company revised its plans by launching budget friendly products, changing suppliers and accelerating energy efficient product development. Explain how this case demonstrates that strategy is partly proactive and partly reactive.
8. *PharmaLife Global Ltd.*, a multinational pharmaceutical company, is formulating its long-term strategic direction. The top management prepares a document that defines the company's desired future position, outlines its long-term aspirations, and provides a clear direction for the

organisation over the next decade. The document answers the question, "Where do we want to go?", inspires employees and stakeholders and shapes future strategic decisions without specifying detailed operational plans. Identify the conceptual element of strategic intent and explain its meaning and key characteristics.

Chapter 2-Strategic Analysis: External Environment

9. SwiftDeliver Logistics Ltd. is a same-day delivery company operating in six metropolitan cities in India. The company is considering expanding to Tier-2 cities. As part of due diligence, the Strategic Planning team is conducting an industry environment analysis. The team has gathered the following information:

- Many e-commerce firms are building in-house delivery capabilities.
- Fuel prices have risen 18% in the past year.
- Drone-based last-mile delivery start-ups are attracting significant venture capital funding.
- Large e-commerce clients negotiate aggressively on delivery rates.

Conduct a Porter's Five Forces analysis for SwiftDeliver using the information provided, identifying the relevant force for each bullet point.

10. Value Chain Analysis consists of two activities: Primary activities and Support activities. As per Michael Porter both the activities are intertwined. Do you agree with the statement? Also delineate the main areas in which primary activities of any organization are grouped.

Chapter 3-Strategic Analysis: Internal Environment

11. OrthoCare *Super Speciality Hospital* has developed an advanced robotic knee replacement surgery programme supported by years of surgeon expertise, specialised training protocols, coordinated teamwork and a unique organisational culture. Although several competing hospitals have invested in similar robotic technology, they have been unable to achieve comparable surgical outcomes because the hospital's expertise is based on complex, tacit knowledge that cannot be easily copied. Identify the characteristics of a core competency illustrated in the above case and briefly explain it.

12. Write a short note on the key strategic drivers of an organization.

Chapter 4-Strategic Choices

13. *Elite Motors Ltd.*, a luxury automobile manufacturer, exclusively targets ultra-high-net-worth individuals by offering premium cars with bespoke features such as hand-stitched leather interiors, personalised design options, and superior craftsmanship that are not available in mass-market vehicles. The company deliberately serves a narrow customer segment and differentiates its products through exceptional quality and exclusivity rather than competing on price. Identify the Porter's Generic Strategy and explain the strategy with suitable justification.
14. *EcoBuild Materials Ltd.* manufactures specialised construction materials. One of its business divisions has been evaluated using the GE Stop-Light Matrix. The analysis indicates that the division possesses medium business strength but operates in an industry with low market attractiveness. The management is reviewing the future course of action for this division. Identify the colour zone in which this business falls under the GE Stop-Light Matrix. What strategic action should the company adopt for this division? Give reasons for your answer.

Chapter 5-Strategy Implementation and Evaluation

15. *Cura-Stents India Ltd.*, a manufacturer of high-precision cardiac stents, follows stringent international quality and sterilisation standards. The Plant Director sets fixed production targets, strict quality benchmarks and standard operating procedures. Employees achieving targets receive monetary rewards, while those failing to meet standards face salary deductions and mandatory retraining. The Director mainly monitors performance and takes corrective action for deviations. Identify the style of Strategic Leadership illustrated and distinguish it from Transformational Leadership based on organisational change and employee motivation.
16. Distinguish between Strategic Planning and Operational Planning.



SUGGESTED ANSWERS/HINTS

Answer to Case Scenario and MCQ

Q. No.		Answer
1.	(i)	(b)
	(ii)	(c)
	(iii)	(c)
	(iv)	(a)
	(v)	(b)
2.	(a)	
3.	(d)	
4.	(c)	
5.	(b)	
6.	(b)	

7. The case demonstrates that **strategy is partly proactive and partly reactive** because it combines deliberate plans with responses to unforeseen developments.
- **Proactive Strategy:** *Novatek's* decision to expand into Tier-2 cities, invest in AI-enabled products, strengthen its dealer network and increase exports represents its **proactive strategy**. These are planned initiatives designed to achieve long-term objectives and build competitive advantage.
 - **Reactive Strategy:** The company also faced unexpected environmental changes, such as the entry of a foreign competitor with low-priced products, rising raw material prices and stricter energy efficiency regulations. In response, *Novatek* introduced budget friendly product variants, changed its sourcing strategy and accelerated the development of energy efficient products. These actions represent its **reactive strategy**, undertaken to address emerging challenges.

So, the case highlights that an organisation's realised strategy is a blend of **proactive (deliberate)** actions and **reactive (adaptive)** responses. While proactive strategies help achieve planned objectives, reactive strategies enable the organisation to adapt to changes in the business environment and sustain its competitive position.

8. The conceptual element of strategic intent referred to in the case is **Strategic Vision**. A **strategic vision** reflects the top management's views about the company's future direction and its product-customer-market-technology focus. It delineates management's aspirations for the business by providing a panoramic view of "**where we are to go**" and a convincing rationale for why the chosen direction makes good business sense. It points out a particular direction, charts the strategic path to be followed in the future, and helps mould the organisation's identity. A clearly articulated strategic vision communicates management's aspirations to stakeholders and steers the energies of employees towards a common direction.

Essentials of a Strategic Vision:

1. Developing a strategic vision requires management to **think creatively** about preparing the company for the future.
2. Forming a strategic vision is an exercise in **intelligent entrepreneurship**.
3. A well-articulated strategic vision **creates enthusiasm** among the members of the organisation.
4. The best-worded vision statement **clearly illuminates the direction** in which the organisation is headed.

In the given case, the document outlining the company's long-term aspirations, answering "**Where do we want to go?**" and providing direction for the next decade represents the company's **Strategic Vision**.

9. Porter's Five Forces Model, developed by Michael Porter, is a framework used to analyse the competitive forces operating in an industry and to assess its attractiveness. The analysis for *SwiftDeliver Logistics Ltd.* is as follows:

Observation	Relevant Force	Explanation
Many e-commerce firms are building in-house delivery capabilities.	Threat of New Entrants	Large e-commerce companies developing their own logistics networks increase competition in the industry. This reduces the dependence on third-party logistics providers like SwiftDeliver and may adversely affect its market share.
Fuel prices have risen 18% in the past year.	Bargaining Power of Suppliers	Fuel is a key input for logistics companies. An increase in fuel prices raises operating costs, indicating higher bargaining power of suppliers and affecting the profitability of the company.
Drone-based last-mile delivery start-ups are attracting significant venture capital funding.	Threat of Substitute Products or Services	Drone-based delivery is an alternative mode of providing last-mile delivery services. As this technology develops, it may offer faster and more cost-effective delivery solutions, posing a substitute threat to traditional logistics services.
Large e-commerce clients negotiate aggressively on delivery rates.	Bargaining Power of Buyers	Large customers place bulk orders and contribute significantly to the company's revenue. Their strong bargaining position enables them to demand lower prices, customised services, and better delivery terms, thereby reducing the company's profit margins.

The industry analysis indicates that *SwiftDeliver Logistics Ltd.* operates in a highly competitive environment characterised by increasing competition, strong bargaining power of buyers and suppliers, and emerging substitute technologies. Before expanding into Tier-2 cities,

the company should focus on improving operational efficiency, adopting innovative technologies, and differentiating its services to sustain its competitive advantage.

10. Yes, I agree with the statement that Value Chain Analysis consists of two activities: Primary activities and Support activities. As per Michael Porter both the activities are intertwined. It is a tool used to examine the activities that create value in an organization, helping to enhance efficiency and build competitive advantage. It breaks down a business's operations to identify areas for improvement in value creation.

The **primary activities** of an organization are categorized into five areas:

1. **Inbound logistics:** Activities related to receiving, storing, and distributing inputs (e.g., materials handling, stock control, and transport).
 2. **Operations:** Transforming input into final products or services (e.g., machining, packaging, assembly).
 3. **Outbound logistics:** Collecting, storing, and delivering products to customers (e.g., warehousing, transport).
 4. **Marketing and sales:** Promoting and selling the product or service, including advertising and sales administration.
 5. **Service:** Enhancing or maintaining product value (e.g., installation, repair, training).
11. The characteristic of a core competency illustrated in the given case is **Costly to Imitate**. It means that competing firms are **unable to develop or duplicate such capabilities easily**. A capability becomes difficult to imitate because it is created through the superior integration of technological, physical and human resources along with organisational culture, teamwork, experience and accumulated knowledge. Such competencies are developed over time and cannot be replicated merely by acquiring similar technology or resources.

In the given case, although competing hospitals have invested in robotic knee replacement technology, they have failed to achieve comparable surgical outcomes because *OrthoCare's* expertise is based on specialised surgeon skills, coordinated teamwork, unique organisational culture and

tacit knowledge. These capabilities are deeply embedded in the organisation and are not easily transferable or replicable.

Therefore, *OrthoCare*'s robotic knee replacement programme represents a **core competency that is costly to imitate**, providing the hospital with a **sustainable competitive advantage**. Only capabilities that are **valuable, rare, costly to imitate and non-substitutable** qualify as core competencies and become a source of sustainable competitive advantage.

12. Key Strategic Drivers of an Organization

Strategic drivers are essential elements that influence an organization's ability to differentiate itself from its competitors and achieve competitive advantage. These drivers assess the current performance of the business and provide insights into areas that need focus.

The key strategic drivers include:

1. **Industry and Markets:** Understanding the industry and markets is crucial for identifying the organization's relative position. Industries group similar companies based on their primary products, while markets are defined by the buyers and sellers of these products. Analyzing industry and market dynamics, often through tools like strategic group mapping, helps organizations evaluate competition and refine strategies.
2. **Customers:** Identifying and understanding customers is a critical driver. Customers are segmented based on their needs and spending capacity, which guides product development and marketing strategies. Differentiating between customers (buyers) and consumers (users) is vital to tailoring pricing, design, and usability strategies effectively.
3. **Products and Services:** Products and services are central to defining the business. Organizations must assess their offerings, classify products, and devise strategies for differentiation, branding, and pricing. Product innovation and marketing are key to maintaining competitiveness.

4. **Channels:** The channels through which products and services are delivered impact on accessibility and customer satisfaction. Strategies related to direct, digital, or relationship-based marketing ensure the efficient distribution of offerings to target customers.

By aligning these drivers with organizational goals, businesses can achieve sustained growth and maintain a competitive edge.

13. The **Porter's Generic Strategy** illustrated in the case is **Focused Differentiation Strategy**. A **Focused Differentiation Strategy** involves concentrating on a **narrow and well-defined market segment** and offering products or services with **unique attributes** that are valued by customers. The objective is to satisfy the specific needs of a niche market by providing superior quality, exclusivity, innovation or customised features. Customers in this segment are willing to pay a premium price for the differentiated offerings.

In the given case, **Elite Motors Ltd.** exclusively targets **ultra-high-net-worth individuals**, indicating a narrow customer segment. It differentiates its luxury automobiles through bespoke features such as hand-stitched leather interiors, personalised design options and superior craftsmanship, which are unavailable in mass-market vehicles. The company competes on the basis of uniqueness and exclusivity rather than price.

Hence, the company is adopting **Porter's Focused Differentiation Strategy**, as it combines a **focus on a niche market** with **product differentiation** to achieve a sustainable competitive advantage.

14. The business division falls in the **Yellow Zone (Selective Growth/Earnings Zone)** of the **GE Stop-Light Matrix**.

In the GE Stop-Light Matrix, a business with **medium business strength** operating in a **low market attractiveness** industry is placed in the **Yellow Zone**. Businesses in this zone require **selective investment** and careful evaluation rather than aggressive expansion.

The appropriate strategic action is to **selectively invest** only if the division has the potential to improve its competitive position or generate satisfactory returns. If the prospects for improvement are

limited and the business is unlikely to create long-term value, the company should **harvest** the business by maximising short-term cash flows or **divest** it to redeploy resources to more attractive business units.

Thus, the division belongs to the **Yellow Zone**, where the strategy is **selective investment**, with **harvesting or divestment** considered if future growth prospects remain weak.

15. The style of Strategic Leadership illustrated in the case is **Transactional Leadership**. **Transactional Leadership** focuses on **designing systems, controlling organisational activities and improving the current situation**. It uses the authority of the leader's office to exchange **rewards** such as pay and status, for desired performance. It follows a formal approach to motivation by setting **clear goals** with **explicit rewards for achievement** and **penalties for non-achievement**. This style is appropriate in **static environments**, mature industries and organisations where efficient operations and smooth functioning are essential.

In the given case, the Plant Director sets clear production targets, quality benchmarks and standard operating procedures. Employees achieving the targets receive monetary rewards, whereas those failing to meet standards are penalised through salary deductions and mandatory retraining. The Director mainly monitors performance and takes corrective action, which are the key characteristics of **Transactional Leadership**.

Difference between Transactional and Transformational Leadership

Basis	Transactional Leadership	Transformational Leadership
Organisational Change	Focuses on improving the current situation, building on the existing culture and enhancing current practices. It is suitable for stable environments and efficient operations.	Focuses on creating strategic change by inspiring employees with a vision. It is suitable in turbulent environments and when major organisational change is required.

Employee Motivation	Motivates employees through explicit rewards and penalties linked to performance.	Motivates employees through charisma, vision and intellectual stimulation, encouraging them to exceed expectations and embrace innovation.
----------------------------	---	--

Thus, the Plant Director demonstrates **Transactional Leadership**, as the emphasis is on achieving operational efficiency, ensuring compliance with standards and motivating employees through a structured system of rewards and penalties.

16.

Strategic planning	Operational planning
Strategic planning shapes the organisation and its resources.	Operational planning deals with current deployment of resources.
Strategic planning assesses the impact of environmental variables.	Operational planning develops tactics rather than strategy.
Strategic planning takes a holistic view of the organisation.	Operational planning projects current operations into the future.
Strategic planning develops overall objectives and strategies.	Operational planning makes modifications to the business functions but not fundamental changes.
Strategic planning is concerned with the long-term success of the organisation.	Operational planning is concerned with the short-term success of the organisation.
Strategic planning is a senior management responsibility.	Operational planning is the responsibility of functional managers.