INTERMEDIATE EXAMINATION **SET 1**

MODEL ANSWERS **TERM – JUNE 2026**

PAPER – 8 **SYLLABUS 2022**

COST ACCOUNTING

Time Allowed: 3 Hours **Full Marks: 100**

The figures in the margin on the right side indicate full marks.

SECTION – A (Compulsory)

1. Choose the correct option: **[15 × 2 = 30]**

(i) _____ is a method of dealing with overheads which involves spreading common costs over cost centers on the basis of benefit received.

a. overheads absorption
b. overheads apportionment
c. overheads allocation
d. overheads analysis

(ii) Calculate the Economic Order Quantity from the following information.
placed in a year.
Consumption of materials per annum : 10,000 kg
Order placing cost per order : ₹ 50
Cost per kg of raw materials : ₹ 2
Storage costs : 8% on average inventory

a. 10,000
b. 50
c. 4
d. 2,500

(iii) Under Taylor's differential piece rate scheme, if a worker fails to complete the task within the standard time, then he is paid

a. 83% of the piece work rate
b. 175% of the piece work rate
c. 67% of the piece work rate
d. 125% of the piece work rate

(iv) CAS 6 focuses on

a. Material Cost
b. Employee Cost
c. Activity-Based Costing
d. Repairs and Maintenance Cost

(v) Which section of the Companies Act, 2013, deals with the adoption and adherence to Cost Accounting Standards (CAS)?

a. Section 135
b. Section 148
c. Section 170
d. Section 184

(vi) When costing loss is ₹ 5,600, administrative overheads under-absorbed being ₹ 600, the loss as per financial accounts should be _____ .

a. ₹ 5,000
b. ₹ 5,600
c. ₹ 6,200
d. None of the above

(vii) In Reconciliation Statement, incomes shown only in financial accounts are:

a. Added to financial profit
b. Deducted from financial profit
c. Ignored
d. Deducted from costing profit

(viii) Job Costing is used in:

a. Furniture making
b. Repair shops
c. Printing press
d. All of the above

(ix) A road building company has the following data concerning one of its contracts.
Contract price ---- ₹11,200,000
Cost of work certified to date ---- ₹ 3,763,200
Estimated costs to completion ------ ₹ 2,956,800
No difficulties are foreseen on the contract.
The profit to be recognised on the contract to date is ₹ _____

a. ₹ 25,88,000
b. ₹ 25,80,800
c. ₹ 20,58,800
d. ₹ 25,08,800

(x) Process B had no opening inventory. 13,500 units of raw material were transferred in at ₹4.50 per unit. Additional material at ₹1.25 per unit was added in process. Labour and overheads were ₹6.25 per completed unit and ₹2.50 per unit incomplete.
If 11,750 completed units were transferred out, what was the closing inventory in Process B?

a. ₹ 6,562.50
b. ₹ 12,250.00
c. ₹ 14,437.50
d. ₹ 25,375.00

(xi) The cost of a product under marginal costing system includes:
a. Prime cost plus variable overhead
b. Prime cost plus fixed overhead
c. Prime cost plus factory overhead
d. Only prime cost

(xii) When sales exceeds production (in units) then profit under:
a. Marginal costing is higher than that of absorption costing
b. Marginal costing is equal to that of absorption costing
c. Marginal costing is equal to that of absorption costing
d. None of the above

(xiii) Which of the following would explain an adverse variable production overhead efficiency variance?
1. Employees were of a lower skill level than specified in the standard
2. Unexpected idle time resulted from a series of machine breakdown
3. Poor Quality material was difficult to process
a. (1), (2) and (3)
b. (1) and (2)
c. (2) and (3)
d. (1) and (3)

(xiv) Budgetary slack means:
a. Understating revenue / overstating cost
b. Overstating revenue / understating cost
c. Estimation error due to uncertainty
d. Always due to fraud

(xv) A static budget is one which:
a. Changes with output
b. Remains unchanged despite output changes
c. Is too flexible
d. Is for govt only

Answer:

(i)	(ii)	(iii)	(iv)	(v)	(vi)	(vii)	(viii)	(ix)	(x)	(xi)	(xii)	(xiii)	(xiv)	(xv)
b	d	a	a	b	c	a	d	d	c	a	a	d	b	b

Section – B

(Answer any 5 questions out of 7 questions given. Each question carries 14 Marks)

[5 × 14 = 70]

2. (a) The cost structure of an article, the selling price of which is ₹ 90,000, is as follows:

Direct materials	**50%**
Direct labour	**20%**
Overhead	**30%**

An increase of 15% in the cost of materials and of 25% in the cost of labour is anticipated. These increased cost in relation to the present selling price would cause a 25% decrease in the amount of present profit per article.

You are required:

i) To prepare a statement of profit per article at present and

ii) The revised selling price to produce the same percentage of profit to sales as before. [7]

(b) Two workers A and B, produce the same product using the same material. Their normal wage rate is also the same. A is paid bonus according to the Rowan system while B is paid bonus according to Halsey system. The time allowed to make the product is 100 hours. A takes 60 hours while B takes 80 hours to complete the product. The factory overhead rate is ₹ 20 per man hour actually worked. The factory cost for the product for A is ₹14,560 and for B it is ₹ 15,200.

Required to:

(i) Find the Normal Rate of Wages.

(ii) Find the cost of materials.

(iii) Prepare a statement comparing the factory cost of the products as made by the two workmen. [7]

Answer:

(a) Let 'x' be the total cost and 'y' be the profit for an article whose selling price is ₹ 90,000/-

X + Y = 90,000 (i)

Elements	Present Cost		Increase	Anticipated Cost
Direct Material	0.5x	15%	0.075 x	0.575 x
Direct Labour	0.2x	25%	0.050 x	0.250 x
Overheads	0.3 x	-	-	0.300 x
	X		0.125 x	1.125 x

1.125 X + 0.75 Y = ₹ 90,000 (ii)

By solving the above two equations, X = ₹ 60,000; Y = 30,000

Statement of Profit per Article:

Direct Material	0.5 of ₹ 60,000	= ₹ 30,000
Direct Labour	0.2 of ₹ 60,000	= ₹ 12,000
Overhead	0.3 of ₹ 60,000	= ₹ 18,000
Total Cost		= ₹ 60,000
Add: Profit		30,000
Selling Price		90,000

Statement of required selling price:

Direct Material 0.575 of 60,000	34,500
Direct Labour 0.250 of 60,000	15,000
Overhead 0.300 of 60,000	18,000
Total cost	67,500
Add: Anticipated profit	33,750
Selling price	1,01,250

b) Let m denotes materials cost and l denote labour cost and R denotes the rate per man hour.

Factory overheads: A 60 x 20 = ₹ 1,200

B 80 x 20 = ₹ 1,600

Factory cost = Material cost + labour cost + Factory overheads

Rowan system:

Factory cost = m + l + 1200 = ₹ 14,560

m + l + 1,200 = ₹ 14,560

m + 84R = 14,560 - 1,200

= ₹ 13,360 ---------- 1

(l) Labour cost = 60 x R + (40 /100 x 60 x R) = 60R + 24 R = 84 R

Halsey system:

Factory cost = m + l + 1200 = ₹ 14,560

m + l + 1,600 = ₹ 15,200

m + 90 R = 15,200 - 1,600

= ₹ 13,600

m + 90 R = ₹ 13,600 ---------- 2

Labour cost (l) = 80 x R + (50 /100 x 20 x R) = 80R + 10 R

By solving the above 2 equations, we can get the value of m = 10,000 and R = 40

Hence material cost is ₹ 10,000 and labour rate per hour = ₹ 40

Statement of Factory Cost

	Rowan system ₹	Halsey system ₹
Materials	10,000	10,000
Labour cost	3,360	3,600
Factory overheads	1,200	1,600
Factory cost	14,560	15,200

3. (a) From the information given below, calculate machine hour rate for the machine No.13 assuming that:

(i) When setting time is productive and

(ii) When setting time is unproductive.

Cost of machine	**₹12,00,000**
Estimated scrap Value	**₹ 50,000**
Estimated Working Life	**16,000 hours**
Time required for maintenance	**250 hours**
Productive working hours	**2,200 hours per year**
Setting up time	**5%**
Cost of repairs	**₹1,60,000 per year**
No. of operators after 2 machines	**2 persons**
Wages of Operator	**₹ 20,000 per month**
Chemicals required	**₹ 12,500 per month**
Overhead chargeable to this machine	**₹ 22,500 per month**
Insurance premium	**1% per annum**
Power 20 units per hour @ ₹ 5 per unit.	

[7]

(b) From the following profit and loss account of Vijay Ltd., for the year 31st December 2022 and other information prepare a cost sheet and also a statement reconciling the profits under Cost accounting and Financial Accounting:

Particulars	₹	Particulars	₹
To Materials	27.40,000	By Sales (1,20,000 Units)	60,00,000
To Wages	15,10,000	Finished Stock (4,000 Units)	1,60,000
To Factory Expenses	8,30,000	Work in Progress	1,20,000
To Administration Expenses	3,82,400	By Dividend	10,000
To Selling Expenses	4,50,000	By Bank Interest	8,000
To Preliminary Expenses	40,000		
To Goodwill Written-off	18.000		
To Discount on Issue of Debentures	2,000		
To Net Profit	3,25,600		
Total	62,98,000		62,98,000

In cost accounts:

a) Factory expenses have been allocated 20% of prime cost.

b) Administration expenses at ₹ 3 per unit.

c) Selling expenses at ₹ 4 per unit.

[7]

Answer:

(a) (i) When setting up time is productive:

Computation of machine Hour rate

Particulars	Per Annum	Per hour
Standing charges:	₹	₹
Wages of operators (20,000 x 2 x 12)/2	2,40,000	
Insurance (1% of ₹12,00,000)	12,000	
Overhead chargeable (22,500 x 12)	2,70,000	
Chemical required (12,500 x 12)	1,50,000	
Total standing charges	6,72,000	
Standing charges per hour (6,72,000 /2,200)		305.45
Variable charges:		
Depreciation (12,00,00 - 50,000) 16,000		71.88
Repairs (1,60,000/2,200)		72.73
Power (20 x 5)		100.00
Machine hour rate		550.06

(ii) When setting up time is unproductive:

Computation of machine Hour rate

Particulars	Per Annum	Per hour
Standing charges:		
Wages of operators (20,000 x 2 x 12)/2	2,40,000	
Insurance (1% of ₹12,00,000)	12,000	
Overhead chargeable (22,500 x 12)	2,70,000	
Chemical required (12,500 x 12)	1,50,000	
Total standing charges	6,72,000	
Standing charges per hour (6,72,000 /2,090)		321.53
Variable charges:		
Depreciation (12,00,00 - 50,000) 16,000		71.88
Repairs (1,60,000/2,090)		76.56
Power (20 x 5)		100.00
Machine hour rate		569.97

Effective machine hours = 2,200 - 5% of 2,200) = 2,200 - 110 = 2,090)

(b) **Cost Sheet**

Particulars		₹
Materials		27,40,000
Wages		15,10,000
Prime cost		42,50,000
Add: Factory expenses 20% of prime cost		8,50,000
		51,00,000
Less: Closing work in progress		1,20,000
Factory cost		49,80,000
Add: Administration expenses (1,24,000 x 3)		3,72,000
Cost of production		53,52,000
Less: Closing stock of finished 53,52,000 x 4000		1,72,645
		1,24,000
Cost of goods sold		51,79,355
Add:	Selling expenses (1,20,000 x 4)	4,80,000
	Cost sales	56,59,355
	Profit	3,40,645
	Sales	60,00,000

Reconciliation of cost and financial profits

Particulars	₹	₹
Profit as per cost books		3,40,645
Add: Income not included in cost accounts:		
Dividend	10,000	
Bank interest	8,000	
Over absorption of factory expenses	20,000	
Over absorption of selling expenses	30,000	68,000
		4,08,645
Less: Under absorption of administration expenses	10,400	
Under valuation of closing stock in financial book	12,645	
Items debited in financial only:		
Preliminary expenses	40,000	
Goodwill	18,000	
Discount on debentures	2,000	83,045
Profit as per financial Books		3,25,600

4. (a) **Mr. Raja Sekhar runs Mini-Bus Service in the town and has two vehicles. He furnishes you the following data and wants you to compute the cost per running mile.**

	Vehicle A	Vehicle B
	₹	₹
Cost of Vehicle	25,000	15,000
Road Licence (Per Year)	750	750
Salaries (Yearly)	1,800	1,200
Driver's Wage Per Hour	4	4
Cost of fuel per Litre	1.50	1.50
Maintenance per mile	1.50	2.00
Tyre cost per Mile	1.00	0.80
Garage Rent per year	1,600	550
Annual Insurance Premium	850	500
Miles run per Litre	6	5
Miles Run During the Year	15,000	6,000
Estimated life of Vehicle	1,00,000 Miles	75,000 Miles

Charge interest at 10% p.a. on the cost of Vehicle. The Vehicle runs 20 miles per hour on an average. **[7]**

(b) **Modern Construction Limited obtained a Contract No. B-37 for ₹40 lakhs. The following balances and information relate to the contract for the year ended 31st March, 2026.**

	1.4.2025	31.3.2026
Work-in-progress	₹	₹
Work Certified	9,40,000	30,00,000
Work uncertified	11,200	32,000
Materials at site	8,000	20,000
Accrued Wages	5,000	3,000

Additional information relating to the year 2015-2016 are:

Particulars	₹	Particulars	₹
Material issued from store	4,00,000	Share of General Overheads for B-37	18,000
Materials directly purchased	1,50,000	Materials Returned to Store	25,000
Wages paid	6,00,000	Materials Returned to Supplier	15,000
Architect's Fees	51,000	Fines and Penalties Paid	12,000
Plant Hire Charges	50,000		
Indirect Expenses	10,000		

The contractee pays 80% of work certified in Cash.

You are required to prepare:

(i) **Contract Account showing clearly the amount of profits transferred to Profit and Loss Account.**

(ii) **Contractee's Account.**

(iii) **Balance Sheet.** **[7]**

Answer:

(a) Computation of cost per running mile of Vehicle A

Particulars	**Per year**	**Per Mile**
Standing charges	₹	₹
Road Licence	750	
Salary		1,800
Garage rent	1,600	
Annual Insurance	850	
Interest on vehicle 10% on ₹ 25,000	2,500	
Total standing charges	7,500	
Standing charges per km 7500 / 15,000		0.50
Running or Variable charges:		
Fuel	1.50/6	0.25
Maintenance per mile		1.50
Tyre cost per mile		1.00
Depreciation	25,000 / 1,00,000	0.25
Driver's wages	4/20	0.20
Cost per running mile		3.70

Computation of cost per running mile of Vehicle B

Particulars	**Per year**	**Per mile**
Standing charges:	₹	
Road licence	750	
Salaries	1,200	
Garage rent	550	
Annual Insurance	500	
Interest on vehicle	10% on ₹ 15,000	1,500
Total standing charges		4,500
Standing charges per mile	4,500/6000	0.75
Running or variable charges:		
Fuel	1.50/5	0.30
Maintenance per mile		2.00
Tyre cost per mile		0.80
Depreciation	15,000/75,000	0.20
Driver's wages	4/20	0.20
Cost of running vehicles B per mile		4.25

(b)

Books of Modern Construction Ltd.

Contract No. B-37 Account for the year ended 31st March 2026

	₹		₹	₹
To WIP b/d (9,40,000 + 11,200)	9,51,200	By Wages Accrued b/d		5,000
To Stock (Materials) b/d	8,000	By Materials Returned to Store		25,000
To Materials Issued	4,00,000	By Materials Returned to Suppliers		15,000
To Materials Purchased	1,50,000	By WIP c/d	₹	
To Wages paid	6,00,000	Work certified	30,00,000	
To Wages Accrued c/d	3,000	Uncertified Work	32,000	30,32,000
To Architect's Fees	51,000	By Materials Stock c/d		20,000
To Plant Hire Charges	50,000			
To Indirect Expenses	10,000			
To General Overheads	18,000			
To Notional Profit c/d	8,55,800			
	30,97,000			30,97,000
To Profit and Loss A/c	4,56,427	By Notional Profit b/f		8,55,800
To WIP Reserve c/d	3,99,373			
	8,55,800			8,55,800

Note: Fines and penalties being abnormal cost are not showing in contract accounts.

CONCTRACTEE'S ACCOUNT

	₹		
To Balance c/d (80% of 30,00,000)	24,00,000	By Balance b/d (80% of 9,40,000)	7,52,000
		By Bank (Bal. figure)	16,48,000
	24,00,000		24,00,000

Balance Sheet (Extract) as on 31.3.2026

Liabilities	`		**Assets**		`
Profit and Loss A/c	4,56,427		Materials Stock at Site		20,000
Less : Fines	12,000	4,44,427	Materials Stock in Store		25,000
Outstanding Wages		3,000	WIP:		
			Work Certified	30,00,000	
			Work Uncertified	32,000	
				30,32,000	
			Less: Advance	24,00,000	
				6,32,000	
			Less: WIP Reserve	3,99,373	2,32,637

Calculation showing Profit and WIP Reserve:

Profit = $855800 \times \frac{2}{3} \times 80\% = 4,56,427$

WIP Reserve = 855800 – 4,56,427 = 3,99,373.

5. (a) A Material used on building produced in three grades.

Particulars	Process A	Process B	Process C
Raw Materials used (1,000 Tonnes) - ₹	2,00,000		
Wages (₹)	87,500	39,500	10,710
Weight Lost (% of Input)	5%	10%	20%
Scrap (Sale Price ₹ 50 per Tonne)	50 Tons	30 Tons	51 Tons
Sale Price per Tonne of Finished Goods-₹	350	500	800

Management expenses were ₹ 17,500 and selling expenses ₹ 10,000. 2/3rd of the output of process A and 50% of output of process B are passes to the next process and the balances sold. The entire output of process C is sold. Prepare accounts and a statement of Proft. [7]

(b) The standard material inputs required for 1,000 kgs. of a finished product are given below:

Material	Quantity (in Kgs.)	Standard rate per Kg. (in ₹)
A	450	20
B	400	40
C	250	60
	1,100	
Standard Loss	100	
Standard Output	1,000	

Actual production in a period was 40,000 kgs. of the finished product for which the actual quantities of material used and the prices paid thereof are as under:

Material	Quantity Used (In Kgs.)	Purchased Price per Kg (in ₹)
A	20,000	19
B	17,000	42
C	9,000	65

Required to Prepare:

i) Material Cost Variance.
ii) Material Price Variance.
iii) Material usage Variance.
iv) Material Mix Variance.
v) Material Yield Variance. [7]

Answer:

a) Process A account

	Tonnes	Amount		Tonnes	Amount
To Materials	1,000	2,00,000	By Normal Loss	50	--
To Wages	--	87,500	By Scrap	50	2,500
To Profit (Balancing figure)	--	10,000	By Sale	300	1,05,000
			By Process B	600	1,90,000
	1,000	2,97,500		1,000	2,97,500

Process B account

	Tonnes	Amount		Tonnes	Amount
To Process A	600	1,90,000	By Normal Loss	60	--
To Wages	--	39,500	By Scrap	30	1,500
To Profit (Balancing figure)	--	13,500	By Sale	255	1,27,500
			By Process C	255	1,14,000
	600	2,43,000		600	2,43,000

Process C account

	Tonnes	Amount		Tonnes	Amount
To Process B	255	1,14,000	By Normal Loss	51	--
To Wages	--	10,710	By Scrap	51	2,550
To Profit (Balancing figure)	--	240	By Sale	153	1,22,400
	255	1,24,950		255	1,24,950

Statement of Profit		₹
Profit in Process A		10,000
Profit in Process B		13,500
Profit in Process C		240
		23,740
Less : Management expenses	17,500	
Less : Selling expenses	10,000	27,500
Loss		3,760

Workings:

Calculation of value of goods transferred from process A to process B

Total value of 900 units = 2,87,500 - 2,500 = ₹ 2,85,000

Total value of 600 unts = 2,85,000 × 600/900 = ₹ 1,90,000

Calculation of value of goods transferred from process B to process C

Total value of 255 units = $\frac{2,29,500 - 1,500}{510} \times 255$ $= \frac{2,28,000}{510} \times 255$ = ₹1,14,000

b) Materia cost variance = (16,00,000 - 16,79,000) = ₹ 79,000 (A)

Materia Price variance = (16,20,000 - 16,79,000) = ₹ 59,00 (A)

Materia Usage Variance = (16,00,000 - 16,20,000) = ₹ 20,000(A)

Materia Mix Variance = (16,72,727 - 16,20,000) = ₹ 52,727 (F)

Materia Yield Variance = (16,72,727 - 16,00,000) = ₹ 72,727 (F)

Workings:

1. Actual cost of materials used = (AQ x AR)

A	20,000 x 19 =	₹ 3,80,000
B	17,000 x 42 =	₹ 7,14,000
C	9,000 x 65 =	₹ 5,85,000
	=	₹ 16,79,000

2. Standard cost of materials used:

A	20,000 x 20 =	₹ 4,00,000
B	17,000 x 40 =	₹ 6,80,000
C	9,000 x 60 =	₹ 5,40,000
	=	₹16,20,000

3. Standard cost of material if it had been used in standard proportion:

			₹
A	450/1100 x 46,000 x 20	=	3,76,364
B	400/1100 x 46,000 x 40	=	6,69,090
C	250/1100 x 46,000 x 60	=	6,27,273
			16,72,727

4. Standard cost of output:

		₹
A	450 x 40 x 20	= 3,60,000
B	400 x 40 x 40	= 6,40,000
C	250 x 40 x 60	= 6,00,000
		= 16,00,000

6. (a) The cost per unit of the three products A, B and C of a concern is as follows:

Particulars	A	B	C
	₹	₹	₹
Direct Materials	**10**	**8**	**9**
Direct Labour	**6**	**7**	**6**
Variable Expenses	**4**	**5**	**3**
Fixed Expenses	**3**	**3**	**2**
Total Cost	**23**	**23**	**20**
Profit	**9**	**7**	**6**
Selling Price	**32**	**30**	**26**
No of Unit Produced	**10,000**	**5,000**	**8,000**

Produced arrangements are such that if one production is given up, the production of the others can be raised by 50%. The directors propose that product C should be given up. Do you agree? Analyze.

[7]

(b) The following set of information is presented to you by your client AB Ltd. producing two products X and Y.

Particulars	X	Y
	₹	₹
i) Direct Materials (per Unit)	20	18
ii) Direct Wages (per Unit)	6	4
iii) Fixed overhead during the period is expected to be ₹ 1,600		
iv) Variable overhead is allocated to products at the rate of 100% of direct wages		
v) Sales Price per Unit (₹)	40	30
vi) Proposed Sales Mix		
i) 100 units of X and 200 Units of Y		
ii) 150 units of X and 150 units of Y		
iii) 200 units of X and 200 units of Y		

As a Cost Accountant, you are requested to calculate the management of AB Ltd., the following:

i) The unit marginal Cost and Unit Contribution.

ii) The total contribution and the resultant profit from each of the above sales mixes.

iii) The proposed sales mixes to earn a profit of ₹ 300 and ₹ 600 with the Total Sales of X and Y being 300 Units. [7]

Answer:

(a) **Marginal cost statement per unit**

Particulars	A		B		C	
	₹	₹	₹	₹	₹	₹
Sales		32		30		26
Less : Marginal cost						
Direct Material	10		8		9	
Direct Labour	6		7		6	
Variable expenses	4	20	5	20	3	18
Contribution		12		10		8
P/V ratio	$\frac{12}{32}\times100$	37.5%	$\frac{10}{30}\times100$	$33^{1}/_{3}\%$	$\frac{8}{26}\times100$	30.77%

Marginal cost statement

If product C is given up:	₹ **Product A**	₹ **Product B**	₹ **Total**
No of units produced	15,000	7,500	
Total contribution (₹)	1,80,000	75,000	2,55,000
Less : Fixed cost (₹)	30,000	15,000	45,000
Profit (₹)	1,50,000	60,000	2,10,000

If product B is given up:

	Product A	Product C	Total
No of units produced	15,000	12,000	
Total contribution (₹)	1,80,000	96,000	2,76,000
Less: Fixed cost (₹)	30,000	16,000	46,000
Profit (₹)	1,50,000	80,000	2,30,000

If product A is given up:

	Product B	Product C	Total
No of units produced	7,500	12,000	
Total contribution (₹)	75,000	96,000	1,71,000
Less: Fixed cost (₹)	15,000	16,000	31,000
Profit (₹)	60,000	80,000	1,40,000

Product C should not be given up. Product B may be given up as the total profit of the company increased by ₹ 20,000.

b) Marginal cost statement per unit

Particulars	Products X		Products Y	
	₹	₹	₹	₹
Selling price		40		30
Less: Marginal cost:				
Direct material	20		18	
Direct wages	6		4	
Variable overheads	6	32	4	26
Contribution		8		4

Sales mix (i): 100 units of X and 200 units of Y

Contribution for 100 unit of X	100 × 8	800
Contribution for 200 unit of Y	200 × 4	800
Total contribution		1600
Less: fixed cost		1600
Profit		Nil

Sales mix (ii): 150 units of X and 150 units of Y

Contribution for 150 unit of X	150 × 8	1200
Contribution for 150 unit of Y	150 × 4	600
Total contribution		1800
Less: fixed cost		1600
Profit		200

Sales mix (iii): 200 units of X and 100 units of Y

Contribution for 200 unit of X	200 x 8	1600
Contribution for 100 unit of Y	100 x 4	400
Total contribution		2000
Less: fixed cost		1600
Profit		400

Sales mix (iii) gives the highest profit when compared to other two sales mixes.

I. When expected profit is ₹ 300.

Let the number of units of product X be denoted as P
and the number of units of product Y be 300 - P
8P +4 (300 - P) = 1,900
8P + 1,200 - 4P = 1,900
P = 700/4 = 175 = X
Y = 300 - 175 = 125 units; Profitable sales mix: X - 175 units and Y - 125 units

II. When expected profit is ₹ 600.

Let the number of units of product Y be denoted as Q
and the number of units of product X be 300 - Q
8Q +4 (300 -Q) = 2,200
8Q + 1,200 - 4Q = 2,200 Q = 1000 / 4 = 250 = Y
X = 300 - 250 = 50 units Profitable sales mix: X - 50 units and Y - 250 units

7. (a) XYZ Engineering Company limited manufactures two products X and Y. An estimate of the number of units expected to be sold in the first seven months of 2025 is given below:

Particulars	Product X	Product Y
January	500	1,400
February	600	1,400
March	800	1,200
April	1,000	1,000
May	1,200	800
June	1,200	800
July	1,000	900

It is anticipated that:

(a) There will be no work-in-progress at the end of any month.

(b) Finished units equal to half the anticipated sales for the next month will be in stock at the end of each month (including December, 2024.

The budgeted production and production costs for the year ending 31st December, 2024 are as follows:

Particulars	Product X	Product Y
Production (Units)	**11,000**	**12,000**
Direct Materials per Unit (₹)	**12**	**19**
Direct Wages per unit (₹)	**5**	**7**
Other manufacturing charges apportionable to each type of product (₹)	**33,000**	**48,000**

You are required to prepare:

i) A production budget showing the number of units to be manufactured each month.

ii) A summarised production cost budget for the 6-month period-January to June 2025. [7]

(b) Discuss the scope of:

i) CAS 5.

ii) CAS 12. [5+2=7]

Answer:

(a)

XYZ Engineering Company Limited Production Budget (in units)
for the 6 months ending 30th June 2025

Product X:	**Jan**	**Feb**	**Mar**	**April**	**May**	**June**
Closing stock	300	400	500	600	600	500
Sales	500	600	800	1,000	1,200	1,200
	800	1,000	1,300	1,600	1,800	1,700
Less: Opening stock	250	300	400	500	600	600
Production (in units)	550	700	900	1,100	1,200	1,100
Product Y:						
Closing stock	700	600	500	400	400	450
Sales	1,400	1,400	1,200	1,000	800	800
	2,100	2,000	1,700	1,400	1,200	1,250
Less: Opening stock	700	700	600	500	400	400
Production (in units)	1,400	1,300	1,100	900	800	850

Production cost budget for the 6 months ending 30th June 2025

Production (in units)	X		Y	
	5,550		6,350	
	Unit cost	Total cost	Unit cost	Total cost
	₹	₹	₹	₹
Direct materials	12	66,600	19	1,20,650
Direct wages	5	27,750	7	44,450
Manufacturing charge	3	16,650	4	25,400
	20	1,11,000	30	1,90,500

b) Scope of

(i) **CAS 5**:

i) Determination of average transportation cost to arrive the assessable value of excisable goods.
ii) Insurance claim valuation
iii) Working out claim for freight subsidy
iv) Administrated price mechanism of freight cost element
v) Determination of inward freight costs included or to be included in the cost of purchases attributable to the acquisition
vi) Computation of freight included in the value of inventory for accounting on inventory valuation of stock hypothecated with banks/ Financial institution etc.,

(ii) **CAS 12**:

Applied to cost statements - classification, measurement, assignment, presentation and disclosure of repairs and maintenance cost including those repairing attestation

8. Answer the following Questions:

a) Differentiate Financial Accounting from Management Accounting. [4]

b) Examine the basic qualities involved in the good purchasing procedure. [5]

c) What are the items to be included and excluded under CAS 10? [5]

Answer:

a)

Financial Accounting	Management Accounting
i) The main objective is to make reports to owner, creditors and Government. Therefore, it is an external reporting process	The main objective is to assist internal Management of a Company. Therefore, it is an internal reporting process
ii) This accounting analyses the business as a whole.	This accounting analyses the business for each division, departments etc.
iii) It is concerned with past records only.	It is concerned with future plans and policies.
iv) It is concerned with monetary aspects monetary	It is concerned with monetary as well as non - aspects.
v) Rigid accounting principles and policies are followed.	Flexible rules and policies are followed.
vi) The period required to prepare final accounts is much longer.	The period of reporting is very short.
vii)Financial accounting fails to cater to the needs of the management.	It furnishes the information quickly. Therefore, it caters to the needs of the management
viii) It is compulsory for every business.	It is optional for every business.
ix) The nature of this accounting is more objective.	The nature of this accounting is more subjective.
x) It is prepared for a particular year as a whole.	It is prepared as and when the information is needed.

b) Qualities:

i) Right Quality
ii) Right Time
iii) Right Quantity
iv) Right Price
v) Right Source

c) Items - included

i) Cost which are directly identified
ii) Expenses which are incurred for the use of bought in resources
iii) Price variance if such expenses are accounted at standard cost

Items - excluded

i) If not identifiable should be considered as overheads
ii) Finance cost is not a direct expense
iii) Imputed cost
iv) Recoveries, credits, subsidy, incentive or any other which reduces the cost
v) Penalty, damages, paid to statutory authorities.