

MOCK TEST PAPER –2

INTERMEDIATE: GROUP – I

PAPER – 3: COST AND MANAGEMENT ACCOUNTING

Answers are to be given only in English except in the case of the candidates who have opted for Hindi medium. If a candidate has not opted for Hindi medium his/ her answer in Hindi will not be valued.

Question No. 1 is compulsory.

Attempt any **four** questions from the remaining **five** questions.

Working notes should form part of the answer.

Time Allowed – 3 Hours

Maximum Marks – 100

1. Answer the following:

- (a) A company makes 1,500 units of a product for which the profitability statement is given below:

	(₹)
Sales	1,20,000
Direct Materials	30,000
Direct Labour	35,000
Variable Overheads	15,000
Fixed Cost	16,800
Profit	22,200

After the first 500 units of production, the company has to pay a premium of ₹ 5 per unit towards overtime labour. The premium so paid has been included in the direct labour cost of ₹ 35,000 given above.

You are required to COMPUTE the Break-even point.

- (b) Madhu Ltd has calculated a predetermined overhead rate of ₹22 per machine hour for its Quality Check (QC) department. This rate has been calculated for the budgeted level of activity and is considered as appropriate for absorbing overheads. The following overhead expenditures at various activity levels had been estimated.

Total overheads	Number of machine hours
₹3,38,875	14,500
₹3,47,625	15,500
₹3,56,375	16,500

You are required to:

- (i) COMPUTE the variable overhead absorption rate per machine hour.
- (ii) COMPUTE the estimated total fixed overheads.
- (iii) CALCULATE the budgeted level of activity in machine hours.
- (iv) CALCULATE the amount of under/over absorption of overheads if the actual machine hours were 14,970 and actual overheads were ₹3,22,000.

- (c) R Ltd. has computed labour turnover rates for the quarter ended 31st March, 2022 as 20%, 10% and 5% under flux method, replacement method and separation method respectively. If the number of workers replaced during that quarter is 50,

- FIND OUT (i) Workers recruited and joined
(ii) Workers left and discharged and
(iii) Average number of workers on roll.

- (d) Premier Construction Company undertook a contract for ₹50,00,000 on 1st August, 2021. On 31st March, 2022 when the accounts were closed, the following information was available:

Cost of work uncertified	₹12,00,000
Cash received	₹25,00,000 (80 of work certified)
Profit transferred to costing Profit and Loss account at the end of the year on Incomplete contract	₹8,00,000

CALCULATE:

- (i) The value of work in progress certified
(ii) Degree of completion of contract
(iii) Notional Profit and
(iv) Cost of contract as on 31-03-2022. **(4 × 5 = 20 Marks)**

2. (a) The following information is available from the cost records of a company for the month of July, 2022:

(1) Material purchased	22,000 pieces	₹ 9,00,000
(2) Material consumed	21,000 pieces	
(3) Actual wages paid for	5,150 hours	₹ 2,57,500
(4) Fixed Factory overhead incurred		₹ 4,60,000
(5) Fixed Factory overhead budgeted		₹ 4,20,000
(6) Units produced	1,900	
(7) Standard rates and prices are:		
Direct material	₹ 45 per piece	
Standard input	10 pieces per unit	
Direct labour rate	₹ 60 per hour	
Standard requirement	2.5 hours per unit	
Overheads	₹ 80 per labour hour	

You are required to CALCULATE the following variances:

- (i) Material price variance
(ii) Material usage variance
(iii) Labour rate variance
(iv) Labour efficiency variance
(v) Fixed overhead expenditure variance
(vi) Fixed overhead efficiency variance

(vii) Fixed overhead capacity variance (10 Marks)

(b) A factory can produce 1,80,000 units per annum at its 60% capacity. The estimated costs of production are as under:

Direct material	₹300 per unit
Direct employee cost	₹160 per unit
Indirect expenses:	
- Fixed	₹32,50,000 per annum
- Variable	₹50 per unit
- Semi-variable	₹20,000 per month up to 50% capacity and ₹2,500 for every 20% increase in the capacity or part thereof.

If production program of the factory is as indicated below and the management desires to ensure a profit of ₹1,00,00,000 for the year, DETERMINE the average selling price at which each unit should be quoted:

First three months of the year- 50% of capacity;

Remaining nine months of the year- 75% of capacity.

(10 Marks)

3. (a) The following data are available in respect of Process-I for January 2022:

(1) Opening stock of work in process: 600 units at a total cost of ₹ 8,40,000.

(2) Degree of completion of opening work in process:

Material	100%
Labour	60%
Overheads	60%

(3) Input of materials at a total cost of ₹1,10,40,000 for 9,200 units.

(4) Direct wages incurred ₹37,20,000

(5) Production overhead ₹17,26,000.

(6) Units scrapped 200 units. The stage of completion of these units was:

Materials	100%
Labour	80%
Overheads	80%

(7) Closing work in process; 700 units. The stage of completion of these units was:

Material	100%
Labour	70%
Overheads	70%

(8) 8,900 units were completed and transferred to the next process.

(9) Normal loss is 4% of the total input (opening stock plus units put in)

(10) Scrap value is ₹600 per unit.

You are required to:

(i) COMPUTE equivalent production,

(ii) CALCULATE the cost per equivalent unit for each element.

- (iii) CALCULATE the cost of abnormal loss (or gain), closing work in process and the units transferred to the next process using the FIFO method. **(10 Marks)**
- (b) ANI Limited is a trader of a Product Z. It has decided to analyse the profitability of its five new customers. It buys Z article at ₹5,400 per unit and sells to retail customers at a listed price of ₹6,480 per unit. The data pertaining to five customers are:

	Customers				
	A	B	C	D	E
Units sold	4,500	6,000	9,500	7,500	12,750
Listed Selling Price	₹6,480	₹6,480	₹6,480	₹6,480	₹6,480
Actual Selling Price	₹6,480	₹6,372	₹5,940	₹6,264	₹5,832
Number of Purchase orders	15	25	30	25	30
Number of Customer visits	2	3	6	2	3
Number of deliveries	10	30	60	40	20
Kilometers travelled per delivery	20	6	5	10	30
Number of expedited deliveries	0	0	0	0	1

Its five activities and their cost drivers are:

Activity	Cost Driver Rate
Order taking	₹4,500 per purchase order
Customer visits	₹3,600 per customer visit
Deliveries	₹7.50 per delivery Km travelled
Product handling	₹22.50 per case sold
Expedited deliveries	₹13,500 per expedited delivery

Required:

- (i) COMPUTE the customer-level operating income of each of five retail customers (A, B, C, D and E).
- (ii) STATE the factors ANI Limited should consider in deciding whether to drop a customer. **(10 Marks)**
4. (a) N Ltd a vehicle manufacturer has prepared sales budget for the next few months, and the following draft figures are available:

Month	No. of vehicles
October	40,000
November	35,000
December	45,000
January	60,000
February	65,000

To manufacture a vehicle a standard cost of ₹5,71,400 is incurred and sold through dealers at a uniform selling price of ₹8,57,100 to customers. Dealers are paid 15% commission on selling price on sale of a vehicle.

Apart from other materials four units of Part - X are required to manufacture a vehicle. It is a policy of the company to hold stocks of Part-X at the end of each month to cover 40% of next month's production. 48,000 units of Part-X are in stock as on 1st October.

There are 9,500 nos. of completed vehicles are in stock as on 1st October and it is policy to have stocks at the end of each month to cover 20% of the next month's sales.

You are required to

- (i) PREPARE Production budget (in nos.) for the month of October, November, December and January.
- (ii) PREPARE a Purchase budget for Part-X (in units) for the months of October, November and December.
- (iii) CALCULATE the budgeted gross profit for the quarter October to December.

(10 Marks)

- (b) The following are the balances existed in the books of JPG Ltd. for the year ended, 31st March, 2022:

Particulars	Dr.	Cr.
	(₹)	(₹)
Stores Ledger Control A/c	15,00,000	
WIP Control A/c	7,50,000	
Finished Goods Control A/c	12,50,000	
Manufacturing Overheads Control A/c		75,000
Cost Ledger Control A/c		34,25,000

During the year 2022-23, the following transactions took place:

Particulars	Amount (₹)
Finished product (at cost)	11,25,000
Manufacturing Overhead incurred	4,25,000
Raw material purchased	6,25,000
Factory wages	2,00,000
Indirect labour	1,00,000
Cost of sales	8,75,000
Materials issued to production	6,75,000
Sales returned (at cost)	45,000
Material returned to suppliers	65,000
Manufacturing overhead charged to production	4,25,000

Required:

PREPARE the following control accounts and Trial balance at the end of the year:

Cost Ledger, Stores Ledger, Work-in-process, Finished Stock, Manufacturing Overhead, Wages and Cost of Sales.

(10 Marks)

5. (a) Royal transport company has been given a 50-kilometre-long route to run 6 buses. The cost of each bus is ₹ 75,00,000. The buses will make 3 round trips per day carrying on an

average 75 percent passengers of their seating capacity. The seating capacity of each bus is 48 passengers. The buses will run on an average 25 days in a month. The other information for the year 2021-22 is given below:

Garage Rent	₹ 60,000 per month
Annual Repairs & Maintenance	₹ 2,40,000 each bus
Salaries of 6 drivers	₹ 20,000 each per month
Wages of 6 conductors	₹ 16,000 each per month
Wages of 6 cleaners	₹ 10,000 each per month
Manager's salary	₹ 50,000 per month
Road Tax, Permit fee, etc.	₹ 60,000 for a quarter
Office expenses	₹ 25,000 per month
Cost of diesel per litre	₹92
Kilometer run per litre for each bus	6 kilometres
Annual Depreciation	20% of cost
Annual Insurance	4% of cost
Engine oils & lubricants (for 1,000 kilometres)	₹ 20,000

You are required to calculate the bus fare to be charged from each passenger per kilometer (upto four decimal points), if the company wants to earn profit of $33\frac{1}{3}$ percent on taking (total receipts from passengers). **(10 Marks)**

- (b) The following are the details of receipts and issues of a material of stores in a manufacturing company for the period of three months ending 30th June, 2022:

Receipts:

Date	Quantity (kg.)	Rate per kg. (₹)
April 10	1,600	50.00
April 20	2,400	49.00
May 5	1,000	51.00
May 17	1,100	52.00
May 25	800	52.50
June 11	900	54.00
June 24	1,400	55.00

There was 1,500 kg. in stock at April 1, 2022 which was valued at ₹48.00 per kg.

Issues:

Date	Quantity (kg.)
April 4	1,100
April 24	1,600
May 10	1,500
May 26	1,700
June 15	1,500
June 21	1,200

Issues are to be priced on the basis of weighted average method.

The stock verifier of the company reported a shortage of 80 kgs. on 31st May, 2022 and 60 kgs. on 30th June, 2022.

You are required to PREPARE a Stores Ledger Account. **(10 Marks)**

6. (a) DISCUSS the essentials of good Cost Accounting System.
(b) STATE various causes of and treatment of Overtime Premium in Cost Accounting.
(c) STATE Direct Expenses with examples.
(d) EXPLAIN the difference between product cost and period cost. **(4 × 5 =20 Marks)**