

## THE AMERICAN COLLEGE, MADURAI

(An Autonomous Institution Affiliated to Madurai Kamaraj University) Re-accredited ( $2^{nd}$  Cycle) by NAAC with Grade "A", CGPA - 3.46 on a 4-point scale

## Backlog Arrear Examination, March 2021

CIT 3601/3421 Cost & Management Accounting Marks: 75
Time: 3 hours

## **Answer any FIVE Questions**

5 X 15 = 75

1. From the following particulars prepare a Cost sheet showing the total cost per tonne for the period ended 31<sup>st</sup> December, 2016

	Rs.		Rs.
Raw Materials	33,000	Rent and taxes (office)	500
Productive wages	16,000	Water supply (works)	1,200
Unproductive wages	10,500	Factory insurance	1,100
Factory rent and taxes	7,500	Office Insurance	500
Factory lighting	2,200	Legal expenses	400
Factory heating	1,500	Rent of warehouse	300
Motive power	4,400	Depreciation of:	
Haulage (works)	3,000	Plant and Machinery	2,000
Directors' fees (works)	1,000	Office building	1,000
Directors' fees (office)	2,000	Delivery Vans	200
Factory Cleaning	500	Bad debts	100
Sundry office expenses	200	Advertising	300
Estimating expenses (works)	800	Sales department's salaries	1,500
Factory stationery	750	Upkeep of delivery vans	700
Office stationery	900	Bank charges	50
Loose tools written off	600	Commission on sales	1,500

The total output for the period has been 14,775 tonnes.

2. The following transactions occur in the purchase and issue of a material.

Jan 19	Purchased 100 units @ Rs.5.00 per unit
Feb 4	Purchased 25 units @ Rs. 5.25 per unit
Feb 12	Purchased 50 units @ Rs. 5.50 per unit
Feb 14	Issued 80 units
March 16	Purchased 50 units @ Rs. 5.50 per unit
March 20	Issued 80 units
March 27	Purchased 50 units @ Rs. 5.75 per unit

From the above, prepare the store ledger account by adopting LIFO method of charging material issued,

3. From the following ;particulars you are required to work out the earnings of a worker for a week under a) Straight piece-rate b) Differential piece rate, c) Halsey premium scheme (50% sharing) and d) Rowan premium scheme.

Weekly workings hours
Hourly wage rate
Rs. 7.50
Piece rate per unit
Rs. 3.00
Normal time taken per piece
Normal output per week
Actual output for the week
120 pieces
150 pieces

Differential piece rate 80% piece rate when output below normal 120% of piece rate when output above normal

4. Strongman Ltd., has three production departments P<sub>1</sub>, P<sub>2</sub> and P<sub>3</sub> and two service departments S<sub>1</sub>,and S<sub>2</sub>. Following particulars are available for the month of March 2013 concerning the organisation:

Expenses	Rs.		
Rent	15000		
Municipal tax	5000		
Electricity	2400		
Indirect wages	6000		
Power	6000		
Depreciation on Machinery	40000		
Canteen Expenses	30000		
Other related cost	10000		

Following further details are also available:

Particulars	Total	P <sub>1</sub>	$P_2$	P <sub>3</sub>	$S_1$	$S_2$
Floor Space (Sq. mts)	5000	1000	1250	15000	1000	250
Light points	240	40	60	80	40	20
Direct wages	40000	12000	8000	12000	6000	2000
Horse power of Machines	150	60	30	50	10	
Cost of Machine (Rs)	200000	48000	64000	80000	4000	4000
Working hours		2335	1510	1525		

The expenses of service departments are to be allocated in the following manner:

	P <sub>1</sub>	$P_2$	P <sub>3</sub>	$S_1$	$S_2$
$S_1$	20%	30%	40%		10%
$S_2$	40%	20%	30%	10%	

You are required to calculate the overhead absorption rate per hour in respect of the three production departments.

- 5. Following information is extracted from the cost accounts of a factory producing a commodity in the manufacture of which three processes are involved. Prepare Process Accounts showing the cost of the output and the cost per unit at each stage of manufacture. You may presume that:
  - i) The operation in each separate process are completed daily; and
  - ii) The value at which units are to be charged to Process two and three is the cost per unit of Process one and one plus tow respectively.

.

Particulars	Process – 1	Process – II	Process - III
Direct Wages	2500	5000	6500
Machine Expenses	1400	1200	1200
Factory overheads	1100	1550	900
Raw materials consumed	8000	-	-
	Units	Units	Units
Production (Gross)	2750		
Wastage	150	210	200
Opening stock of Raw Materials		250	500
Closing Stock of Raw Materials		440	100

6. Vasuki Construction Ltd. has obtained a contract for the construction of a bridge. The value of the contract is Rs.12 lacs and the work commenced on 1<sup>st</sup> October, 2000. The following details are shown in their books for the year ended 30<sup>th</sup> September, 2001:

Plant purchased Rs. 60,000; wages paid Rs.3,40,000; Material issued to site Rs.3,36,000; Site expenses Rs.8000; General over head Rs.32,000; wages accrued Rs.2,800; Material at site as on 30.09.2001 Rs.4,000; Direct expenses accrued on 30.09.2001 Rs. 1,200; work not yet certified at cost Rs.14,000; Cash received being 80% of work certified Rs. 6,00,000. Life of plant purchased is 5 years and scrap value is nil.

Prepare the contract account for the year ended 30<sup>th</sup> September, 2001and show the amount of profit which you consider might be fairly taken on the contract and how you have calculated it.

7. From the following information of product No 777 calculate Material Variances.

Material	Standard	Standard Price	Actual quantity	Actual price
	quantity			
X	10	2	5	3
Y	20	3	10	6
Z	20	6	15	5
	50		30	

- a) Material Cost Variance
- b) Material Price Variance
- c) Material Usage Variance
- d) Material Sub-usage variance
- e) Material Mix Variance

\*