Eastern University, Sri Lanka

Faculty of Commerce & Management

Third Year First Semester Examination in BBA/ B.Com

2012/2013 (Proper/Repeat/ Re-repeat) (February/March)

MGT 3013 - Managerial Accounting

Calculator is permitted

Answer all questions

Time: 03 Hours

Q1 a) A Product manufacturer by the Standard Chemicals Ltd. passes through three processes I, II and III. The Following costs have been incurred for the month of September 2014.

	Process I	Process II	Process III
	(Rs.)	(Rs.)	(Rs.)
1. Materials Consumed	40,000	7,500	5,000
2. Direct Wages	22,500	10,000	10,000
3. Direct Expenses	20,500	2,250	2,505
Total Rs.	83,000	19,750	17,550
	Units	*Units*	*Units*
4. Output	3,900	3,850	3,200
5. Finished Process Stock:			
01/09/2014	600	550	800
31/09/2014	500	800	Nil
6. Stock Valuation on			
01/09/2014 (Rs. Per unit)	24.5	31.00	37.00
7. Percentage of wastage	2	5	10
8. Net Realizable Value of			
Wastage per unit (Rs.)	13.50	16.25	21.00

4000 units of raw materials were introduced in process No.1 at a cost of Rs. 40,000

Stocks are valued and transferred to subsequent processes at weighted average cost. The percentage of wastage is computed on the number of units entering the process concerned.

Prepare,

i. Process A/Cs

ii. Process Stock A/Cs

iii. Normal Wastage A/C

iv. Abnormal wastage /Effective A/C

(16 Marks)

b) A Transport Service Company is running five buses between two towns which are 50 km apart. Seating capacity of each bus is 30 passengers. The following particulars were obtained from their books for the month of April 2014.

	Rs.
Wages of Drivers, conductors and cleaners	24,000
Salaries of office staff	10,000
Diesel oil and other oil	35,000
Repairs and maintenance	8,000
Taxation, insurance etc	16,000
Depreciation	26,000
Interest and other expenses	20,000

Actually, passengers carried were 75 per cent of seating capacity. All buses ran on all days of the month. Each bus made one round trip per day.

Find out the cost per passenger km.

(04 Marks)

c) State the special features of contract costing.

(02 Marks)

(Total 22 Marks)

Q2 a) From the following forecasts of income and expenditure, you are required to prepare a cash budget of three months ending 30th November. The bank balance on 1st September was Rs. 10,000.

Month	Sales	Purchases	Wages	Factory Expenses	Office Expenses
	Rs.	Rs.	Rs.	Rs.	Rs.
July	80,000	40,000	5,600	3,900	10,000
August	76,500	42,000	5,800	4,100	12,000
September	78,000	38,500	5,800	4,200	14,000
October	90,000	37,500	5,900	5,100	16,000
November	95,000	43,000	5,900	6,000	13,000

A sales commission of 4% on sales, due in the month following the month in which the sales dues are collected, is payable in addition to office expenses.

Fixed assets worth Rs. 65,000 will be purchased in September to be paid for in the following month.

Rs. 20,000 in respect of debenture interest will be paid in October.

The period of credit allowed to customers is two months and one month credit is obtained from suppliers of goods.

Wages are paid on an average fortnightly on 1 and 16 of each month in respect of dues for period ending on the date preceding such days.

Expenses are paid in the month in which they are due.

Income tax payable in October Rs. 4000 was paid in November.

Rs. 1,000 was allowed as bad-debts in the month of November.

(15 Marks)

b) Differentiate between 'Rolling Budget' and 'Flexible Budget'.

(03 Marks)

c) Briefly state the importance of ratio analysis.

(02 Marks)

(Total 20 Marks)

Q3 a) The standard cost on 'Material' and 'Labour' for the making of the unit of a certain product are estimated as under:

Material 160kg at Rs. 150 per kg

Labour 09 hours at Rs. 125 per hr.

On completion of the production of a unit, it was found that 150kg of material costing Rs. 175 per kg has been consumed and that the time taken was 8hours, the wage rate being Rs. 150 per hour.

You are required to analyze the following variances:

1. Material cost variance
2. Material Price variance
3. Material Usage variance
4. Labour Cost Variance
5. Labour Rate Variance
6. Labour Efficiency Variance

(12 Marks)

b) Contrast between 'Job costing' and 'Batch Costing' with examples.

(04 Marks)

c) Describe the differences between differential cost analysis and marginal cost analysis.

(04 Marks)

(Total 20 Marks)

04) a) A company producing products PI and SI using a single production process has the following cost data:

	PI	SI
Selling Price per unit (Rs.)	20	30
Variable cost per unit (Rs.)	11	16
Machine hours required per unit of production (hrs.)	1	2
Market Limitation (units)	1,00,000	2,50,000
Total machine hours available –	4,00,000	
Fixed cost per annum Rs. 26,00,000		

Considering the limiting factors of machine hours and market limitations you are required to:

i. indicate the best combination of products to give optimum contribution;

(03 Marks)

ii. show the additional machinery requirement to be augmented on rental basis at an annual rent of Rs. 150,000/= per machine to provide additional capacity of 30,000 hours per machine;

(03 Marks)

iii. change in number of machines to be rented if the annual rental charges reduce to R. 1,25,000 per machine.

(04 Marks)

b) MRF Ltd. are the manufacturers of tubes for vehicle. The following are the details of their operation during 2014.

Average monthly market demand	2,000 Tubes
Ordering cost	Rs. 100 per order

Inventory carrying cost	20% per annum
cost of tubes	Rs. 500 per tube
Normal usage	100 tubes per week
Minimum usage	50 tubes per week
Maximum usage	200 tubes per week
Lead time to supply	6-8 weeks

Compute from the above

i. Economic Order Quantity. If the supplier is willing to supply 1500 units quarterly at a discount of 5%, is it worth accepting? **(05 Marks)**

ii. Maximum level of stock **(01 Marks)**

iii. Minimum level of stock **(01 Marks)**

iv. Re-order level **(01 Marks)**

(Total 18 Marks)

05) a) A company processes a raw material in its department I to produce three products, viz A, B, and P at the same spilt – off stage. During a period 1,80,000 kgs of raw materials were processed in department I at a total cost of Rs. 12,88,000 and the resultant output of A, B, and P were 18,000 kgs, 10,000 kgs and 54,000 kgs. respectively. A and B were further processed in department 2 at a cost of Rs. 1,80,000 and Rs. 1,50,000 respectively. P was further processed in department 3 at a cost of Rs. 1,08,000. There is no waste in further processing. The details of sales effected during the period were as under:

Particulars		**A**	**B**	**C**
Quantity sold	(Kgs)	17,000	5,000	44,000
Sales value	(Rs)	12,24,000	2,50,000	7,92,000

There were no opening stocks. If these products were sold at split-off stage the selling prices of A, B, and P would have been Rs. 50, Rs. 40 and Rs. 10 per kg. respectively.

You are required to :

i. Prepare a statement showing the apportionment of joint costs to A, B and P.

ii. Present a statement showing the cost per kg of each product indicating joint cost, further processing cost total cost separately.

iii. Prepare a statement showing the product wise total profit for the period.

iv. State with supporting calculations as to whether any or all the products should be further processed or not.

(16 Marks)

b) (i) An investment project is planned at a cost of Rs. 100,000. Expected inflows of cash are: Year 1 Rs 50,000; Year 2 Rs 40,000; Year 3 Rs 40,000; and Year 4 Rs 10,000 , What is the payback period?

(02 Marks)

(ii) In a calculation of the internal rate of return (IRR) of a project, it is found that the net present value is + 140million at 20% discount rate and - 84million at 22% discount rate. What is the IRR?

(02 Marks)
(Total 20 Marks