INSTITUTE OF COST AND MANAGEMENT ACCOUNTANTS OF PAKISTAN

March 2011 Extra Attempt Examinations

Tuesday, the 22nd March 2011

COST AND MANAGEMENT ACCOUNTING-PERFORMANCE APPRAISAL – (S-303)
STAGE-3

Extra Reading Time: 15 Minutes
Writing Time: 02 Hours 45 Minutes
Maximum Marks: 90
Roll No.:

(i) Attempt all questions.
(ii) Answers must be neat, relevant and brief.
(iii) In marking the question paper, the examiners take into account clarity of exposition, logic of arguments, effective presentation, language and use of clear diagram/ chart, where appropriate.
(iv) Read the instructions printed inside the top cover of answer script CAREFULLY before attempting the paper.
(v) Use of non-programmable scientific calculators of any model is allowed.
(vi) DO NOT write your Name, Reg. No. or Roll No. anywhere inside the answer script.
(vii) Question No.1 – "Multiple Choice Question" printed separately, is an integral part of this question paper.
(viii) **Question Paper must be returned to invigilator after finishing/ writing the exam.**

Answer Script will be provided after lapse of 15 minutes Extra Reading Time (9:30 a.m or 2:30 p.m [PST] as the case may be).

Marks

Q.2 (a) Delux Company's income statements under absorption costing for the last two years are presented below:

Rupees

	Year 1	Year 2
Sales	350,000	450,000
Cost of goods sold:		
Beginning inventory	–	30,000
Cost of goods manufactured	240,000	240,000
Goods available for sale	240,000	270,000
Ending inventory	30,000	–
Cost of goods sold	210,000	270,000
Gross profit	140,000	180,000
Selling & admin. expenses	125,000	155,000
Net operating income	15,000	25,000

Units produced and sold in each of these years are given below:

	Year 1	Year 2
Unit in beginning inventory	–	1,000
Units produced	8,000	8,000
Units sold	7,000	9,000

Fixed factory overhead totaled Rs.80,000 in each year. This overhead was applied to products at a rate of Rs.10 per unit. Variable selling and administrative expenses were Rs.15 per unit sold.

Required:

(i) Calculate per unit production cost in each year under marginal costing. 02

(ii) Prepare income statements for each year using marginal costing. 06

(iii) Reconcile net operating income for each year under absorption costing and marginal costing. 03

PTO

Marks

(b) The following data are related to the operations of M/s Superior Limited of a processing department for the last month.

	Units	Rupees
Work in process, beginning:	800	
Stage of completion with respect to:		
Materials	60%	
Conversion	10%	
Costs in the beginning inventory:		
Materials cost		1,296
Conversion cost		2,416
Units started into production during the month	16,000	
Units completed and transferred out	16,500	
Costs added to production during the month:		
Materials cost		47,076
Conversion cost		497,213
Work in process, ending:	300	
Stage of completion with respect to:		
Materials	60%	
Conversion	70%	

Required:

Prepare cost of production report for the department using the weighted average process costing method. 13

Q.3 **(a)** The following standards have been established for a raw material used in the manufacturing of product Geme:

Standard quantity of the material per unit of output		2.30	liters
Standard price of the material	Rs.	38.00	per liter

The following data pertain to a recent month's operations:

Actual material purchased		5,100	liters
Actual cost of material purchased	Rs.	201,450	
Actual material used in production		4,700	liters
Actual output of product Geme		2,040	units

Required:

(i) Calculate materials price variance for the month. 02

(ii) Calculate materials quantity variance for the month. 03

(iii) Prepare journal entries to record the purchase and use of the raw material during the month. (All raw materials are purchased on credit). 06

(b) The standards for product 'Q' specify 8.4 direct labour hours per unit at Rs.70 per direct labour hour. Last month 400 units of product 'Q' were produced using 2,800 direct labour hours at a total direct labour cost of Rs.205,100.

Required:

(i) Calculate the labour rate variance for the month. 02

(ii) Calculate the labour efficiency variance for the month. 03

(iii) Prepare a journal entry to record direct labour cost during the month, including the direct labour variances. 04

Marks

Q.4 **(a)** A single product manufacturing company established the following standards for variable manufacturing overhead:

Standard hour per unit of output		0.6	hour
Standard variable overhead rate	Rs.	17.55	per hour

The following data pertain to operations for the last month:

Actual hours		6,200	hours
Actual total variable overhead cost	Rs.	110,670	
Actual output		10,200	units

Required:

(i) Calculate the variable overhead spending variance for the month. 02

(ii) Calculate the variable overhead efficiency variance for the month. 03

(b) The following overhead data are for a department in a company.

	Actual Costs Incurred	Static Budget
Activity level (in units)	100	110
Variable costs:	Rupees	
Supplies	4,050	4,906
Power	1,690	1,892
Fixed costs:		
Administration	6,240	6,200
Depreciation	6,280	6,200

Required:

Prepare a report assessing how well the costs were controlled in this department. 09

Q.5 The management of a company decided to prepare a flexible factory overhead budget from 80% to 100% capacity levels with 50,000 hours at 100% capacity. Following data are available for factory overhead:

Annual Fixed Overhead	Rs. '000'
Salaries, allowances & benefits	3,600
Maintenance cost	2,400
Insurance & taxes	300
Depreciation	900

Variable Overhead		
Supplies	Rs. 10	per direct labour hour
Indirect labour (excluding inspection)	Rs. 45	per direct labour hour
Direct labour	Rs. 750	per hour
Bonus & other benefits	20%	of total direct and indirect labour cost

For determining the fixed amount and variable rate on the basis of high and low point method, data of semi variable expenses for last five years is given below:

Rs.'000'

Year	Direct labour hours	Heat light & power	Inspection	Others
2006	44,000	150	960	770
2007	40,000	140	900	750
2008	46,000	160	940	860
2009	48,000	165	1,010	830
2010	50,000	170	1,020	890

Required:

(i) Prepare a flexible factory overhead budget for the year at 80%, 90% and 100% capacity levels. 17

(ii) Compute variable, fixed and total factory overhead rates for each capacity level. 03

PTO

Marks

Q.6 (a) The following data are for the latest year of operations of a company's division:

	Rs.
Sales	10,890,000
Net operating income	609,840
Average operating assets	3,000,000
The company's minimum required rate of return	16%

Required:

Calculate the division's:

(i) Margin 01

(ii) Turnover ratio 01

(iii) Return on investment (ROI) 01

(iv) Residual income 02

(b) Division-B has asked Division-A of the same company to supply it with 6,000 units of a part this year to use in one of its products. Division-B has received a bid from an outside supplier for the parts at a price of Rs.17 per unit. Division-A has the capacity to produce 30,000 units of this part per year. Division-A expects to sell 27,000 units of the part to outside customers this year at a price of Rs.18 per unit. To fill the order from Division-B, Division-A would have to cut back its sales to outside customers. Division-A produces part at a variable cost of Rs.9 per unit. The cost of packing and shipping the parts for outside customers is Rs.1 per unit. These packing and shipping costs would not be incurred on sales of the parts to Division-B.

Required:

Calculate the range of transfer prices within which both the Divisions' profits would increase as a result of agreeing to transfer 6,000 parts this year from Division-A to Division-B. 07

THE END