**JAIPURIA INSTITUTE OF MANAGEMENT, INDORE**

**PGDM**

**SECOND TRIMESTER (Batch 2019-21)**

**END TERM IMPROVEMENT EXAMINATION, FEBRUARY -2020**

|  |  |  |  |
| --- | --- | --- | --- |
| Course Name | **Management Accounting** | Course Code | **FIN202** |
| Max. Time | **2 hours** | Max. Marks | **60** |

**INSTRUCTIONS:**

Attempt all questions.

**Q.1**. ABC ltd manufactures televisions that are designed for use in sports bars. The Company has budgeted manufacturing overhead costs for the year as follows:

|  |  |
| --- | --- |
| Type of Cost | Cost Pools |
| Electric Power | Rs.12,50,00,000 |
| Inspection | Rs.7,50,00,000 |
| Total MOH | Rs.20,00,00,000 |

Under a traditional cost system, the company estimated the budgeted capacity for machine hours to be 40,000 hours. The company is considering changing to an activity based cost system. As a part of its consideration of the new costing system, the company developed the following estimates:

|  |  |
| --- | --- |
| Type of Cost | Activity- Based Cost Drivers |
| Electric Power | 50,000 kilowatt hours (KWH) |
| Inspection | 10,000 inspections (INSP) |

The following information related to the production of 2000 units of Model #1003 was accumulated

|  |  |
| --- | --- |
| Direct Materials Cost | Rs.25,00,000 |
| Direct Labour Costs | Rs.37,50,000 |
| Machine hours | 10000 |
| Direct Labour Hour | 5000 |
| Electric Power- Kilowatt hours | 20000 |
| No. of Inspections | 1000 |

Based on the above data, you are required to,

1. Calculate the total cost for the Model #1003 using traditional method of absorbing all manufacturing overheads on the basis of machine hours.
2. Calculate the total cost for the Model #1003 using activity based costing principles.
3. If ABC were setting a selling price based on 20 percent markup, how would profit be affected if the company did not change to an ABC system?

**[Marks-15]**

**Q.2**. ABC Manufacturing Company began operations on January 1. During the year, it started and

completed 1,800 units of product. The company incurred the following costs.

* + Raw materials purchased and used—Rs. 3,14,000
  + Wages of production workers—Rs. 3,61,000
  + Salaries of administrative and sales personnel—Rs.1,94,500
  + Depreciation on manufacturing equipment—Rs.5,67,000
  + Depreciation on administrative equipment—Rs.1,83,000

ABC sold 1,020 units of product.

Required:

1. Determine the total product cost for the year.
2. Determine the total cost of the ending inventory.
3. Determine the total of cost of goods sold.
4. Determine the total period cost for the year.
5. Based on the information provided, explain the statement “cost can be assets or expenses”? **[Marks-10]**

**Q.3.** In the fourth quarter of 2015, Bhasin Wheels had the following net income:

Sales                                                          Rs.400,000

Less cost of sales                              150,000

Gross margin                                     250,000

Selling and administration costs       110,000

Income before taxes                           140,000

Income taxes                                        42,000

Net income                                             Rs. 98,000

Purchases in the fourth quarter of 2015 amounted to Rs.170,000. Estimated data for 2016 is as follows:

**First               Second            Third Fourth**

                                    Quarter            Quarter          Quarter               Quarter

Sales                    Rs. 300,000      Rs. 350,000    Rs. 400,000       Rs. 450,000

Cost of sales                  170,000           200,000           230,000 150,000

Purchases                   200,000           230,000           250,000 280,000

Selling and admin.       110,000           110,000           110,000 110,000

·   Taxes are 30% of pretax income and are paid in the month of accrual.

·   All sales are on credit and 30% are collected in the quarter of sale and 70% are collected in

the next quarter.

·   40% of purchases are paid in the quarter of purchase and 60% in the next quarter.

·   Selling and administrative expenses are paid in the quarter incurred.

·   There is Rs. 11,000 of depreciation included in selling and administrative expense.

·   A capital expenditure for Rs. 40,000 is planned for the fourth quarter of 2015.

Prepare a cash disbursements budget for the second quarter of 2015.

**[Marks-15]**

**Q4**. Ellis Quilting Company makes blankets that it markets through a variety of department stores. It makes the blankets in batches of 1,000 units. Ellis made 20,000 blankets during the prior accounting period. Its manufacturing plant has the capacity to produce 30000 blankets. The cost of producing the blankets is summarized here.

|  |  |  |
| --- | --- | --- |
|  |  | |
| Variable Costs (that vary with units produced) |  |  |  |
| Materials cost (Rs.250 per unit × 20,000) | Rs. | 5,000,000 |  |
| Labor cost (Rs.220 per unit × 20,000) |  | 4,400,000 |  |
| Manufacturing supplies (Rs.20 × 20,000) |  | 400,000 |  |
| Variable Cost ( that vary with the number of batches) |  |  |  |
| Batch-level costs (20 batches at Rs.4,000 per batch) |  | 80,000 |  |
| Product-level costs (Fixed) |  | 160,000 |  |
| Facility-level costs (Fixed) |  | 290,000 |  |
|  |  |  |  |
| Total costs | Rs. | 10,330,000 |  |
|  |  |  |  |
| Cost per unit = Rs.10,330,000 ÷ 20,000 = Rs.516.5 | | |

|  |
| --- |
| **Required:** |

A. Kent Motels has offered to buy a batch of 500 blankets for Rs.496 each. Ellis normal selling price is Rs.550 per unit, calculate the relevant cost per unit for the special order. Should Ellis accept the special order? Why? Explain briefly.

B. Kent offered to buy a batch of 1,000 blankets for Rs.496 per unit, calculate the relevant cost per unit for the special order. Should Ellis accept the special order? Why? Explain briefly.

**[Marks-10]**

**Q.5.** Sinarest Ltd has the following cost structure for manufacture and sale of 6,000 units:

|  |  |
| --- | --- |
| Selling Price  per unit | Rs 1,000 |
| Direct Material per unit | Rs 300 |
| Direct Wages per unit | Rs 100 |
| Fixed Cost | Rs 27 lac |

  Calculate :

a)     the BEP in units.

b)    If variable cost increases by 20% what will be the revised BEP in units?

c)     How much is the margin of safety enjoyed by the company?

d)    If selling price is reduced by 10% by how much should the sales be increased to earn the same amount of profit?                                                    **[2.5 Marks \*4= 10 Marks]**