

Final_Exam-3110**True/False**

Indicate whether the statement is true or false.

- _____ 1. Nonvalue-adding activity costs do not increase a product's cost because they do not add value to the product.
- _____ 2. Activity-based management is useful for both strategic planning and operational decision making.
- _____ 3. Traditional environments emphasize functional departments that tend to group similar activities together.
- _____ 4. In a just-in-time environment, a manager is interested in trends in inventory turnover.
- _____ 5. In just-in-time manufacturing, the basic cost classifications used in product costing are materials and overhead costs.
- _____ 6. In a backflush environment, costs are tracked through the various production departments as products or services move through the production process.
- _____ 7. Costs are not affected by the changes in the volume of production.
- _____ 8. Unit variable costs vary with changes in productive output, whereas total variable costs remain constant.
- _____ 9. An organization's normal capacity is the average annual level of operating capacity needed to meet its expected sales demand.
- _____ 10. Contribution margin is calculated by deducting total fixed costs from total sales.
- _____ 11. A scatter diagram helps to determine if a linear relationship exists between a cost item and its related activity measure.
- _____ 12. The engineering method of separating costs is sometimes called a regression analysis.
- _____ 13. An increase in the unit sales price will increase unit variable price.
- _____ 14. A product line's contribution margin represents its contribution to paying off variable costs and to generating a profit.
- _____ 15. The point at which the total cost line intersects with the total revenue line is the breakeven point.
- _____ 16. In breakeven analysis adjusted for a profit factor, increasing the unit sales price will decrease the number of units needed to meet the targeted profit.
- _____ 17. A sales forecast for a retail organization is based on purchases and cost of goods sold budgets.

- _____ 18. Receipt of stock dividends, depreciation, and amortization expense will not be recorded in the cash budget prepared by an organization.
- _____ 19. Participative budgeting involves only personnel at top levels of the organization.
- _____ 20. The long-term plan or budget involves every part of the enterprise and is much more detailed than the short-term plan.
- _____ 21. The standard overhead cost is the sum of the estimates of variable and fixed overhead costs in the next accounting period.
- _____ 22. Flexible budgets are also called static budgets.
- _____ 23. The direct materials price variance is the difference between the standard price and the actual price, multiplied by the actual quantity.
- _____ 24. The direct labor efficiency variance is the difference between standard hours allowed and actual hours worked for good units produced, multiplied by the standard labor rate.
- _____ 25. A performance report should contain cost or revenue items that the manager receiving the report can control.

Multiple Choice

Identify the choice that best completes the statement or answers the question.

- _____ 1. Activity-based management includes all of the following *except* identifying
 - a. the level of customer satisfaction with a product or service.
 - b. the resources that are consumed by each activity.
 - c. activities as value-adding.
 - d. how resources are consumed by each activity.
- _____ 2. Which of the following is a unit-level activity?
 - a. Redesigning the process
 - b. Setting up the production process
 - c. Purchase of raw materials
 - d. Insuring the factory
- _____ 3. The initial step in achieving the efficiency of a just-in-time system is to
 - a. redesign the plant layout.
 - b. replace laborers with machines.
 - c. stop ordering materials for inventory.
 - d. identify products that are not profitable.
- _____ 4. Which of the following costs is most likely to remain fixed within a relevant range?
 - a. Indirect labor
 - b. Property taxes
 - c. Operating supplies
 - d. Direct labor

- _____ 5. In terms of cost behavior, telephone expenses are often classified as
- sunk costs.
 - variable costs.
 - fixed costs.
 - mixed costs.
- _____ 6. Retleb Manufacturing Company noticed that, during its busiest month of 2014, maintenance costs totaled \$15,400, resulting from the production of 32,000 units. During its slowest month, \$12,600 in maintenance costs were incurred, resulting from the production of 24,000 units. Use the high-low method to estimate the maintenance cost that the company will incur if it produces 20,000 units?
- \$7,000
 - \$11,200
 - \$8,400
 - \$2,800
- _____ 7. Which of the following is true of the engineering method of separating costs?
- It is generally used to estimate the cost of activities and new products.
 - It is sometimes called a time and motion study.
 - It separates costs by performing a step-by-step analysis of various elements involved.
 - All of these choices are correct.
- _____ 8. Myrid Inc. sells each crystal goblet that it produces for \$75. The contribution margin per goblet is \$20. Total monthly fixed costs are estimated to be \$82,600. How many units should Myrid sell in a month to breakeven? (Round your answer to the nearest whole number.)
- 4,130 goblets.
 - 1,101 goblets.
 - 1,502 goblets.
 - 869 goblets.
- _____ 9. Lakeside has gathered the following data in order to calculate the weighted-average breakeven point:

	Unit Sales Price	Unit Variable Costs	Unit Sales
Product A	\$150	\$100	8,000
Product B	100	60	2,000
Fixed costs incurred is \$480,000			

- The weighted-average breakeven point is
- 11,429 units.
 - 10,000 units.
 - 5,333 units.
 - 10,667 units.
- _____ 10. Fusion Inc. sells a single product which has a contribution margin of \$125 per unit. The fixed cost of Fusion is \$195,000. If the company wants to earn \$55,000 as operating income, it should sell:
- 2,000 units.
 - 1,560 units.
 - 440 units.
 - 2,500 units.

- _____ 11. Which of the following budgets is a financial budget?
- a. Sales budget
 - b. Cash budget
 - c. Overhead budget
 - d. Cost of goods manufactured budget

J. J. Johnson has decided to supplement his income by selling beehives. He expects to sell 25,000 hives in 2014. He ended 2013 with 2,500 completed hives in inventory and would like to complete operations in 2014 with at least 2,800 completed hives in inventory. There is no ending work in process inventory. One beehive holds about 250 bees. The bees are purchased for \$4.00 per 1,000 bees. The hives sell for \$15.00 each.

- _____ 12. How many beehives would the 2014 production budget, of Johnson, identify as needing to be produced?
- a. 25,300
 - b. 25,000
 - c. 30,300
 - d. 24,700

Win Shield International manufactures trophies. Each trophy goes through two departments in the production process and requires two direct labor hours in Department A and one hour in Department B. Labor cost is \$8 per hour in Department A and \$10 per hour in Department B.

- _____ 13. If the labor capacity for a normal eight-hour shift for a month is 50,000 direct labor hours each for both Departments A and B, what would be the budgeted direct labor cost of Win Shield for the month where production is expected to be 30,000 units? The company pays overtime at time and a half.
- a. \$900,000
 - b. \$780,000
 - c. \$820,000
 - d. \$420,000

Richard Inc. expects to sell 28,000 units. Each unit requires 4 pounds of direct materials at \$15 per pound and 3 direct labor hours at \$12 per direct labor hour. The overhead rate is \$9 per direct labor hour. The beginning inventories are as follows: direct materials, 2,500 pounds; finished goods, 3,100 units. The planned ending inventories are as follows: direct materials, 4,000 pounds; finished goods, 3,200 units.

- _____ 14. What is the planned production of Richard?
- a. 21,700
 - b. 28,100
 - c. 27,900
 - d. 34,300

- _____ 15. Wean Corporation's budgeted balance sheet for the coming year shows total assets of \$5,000,000 and total liabilities of \$2,000,000. Common stock and retained earnings make up the entire stockholders' equity section of the balance sheet. Common stock remains at its beginning balance of \$1,500,000. The projected net income for the year is \$333,000. The company pays no dividends. What is the balance of retained earnings at the beginning of the budget period?
- \$1,067,000
 - \$1,167,000
 - \$1,833,000
 - \$1,500,000
- _____ 16. The cost of goods manufactured of a company is \$850,000. The beginning and ending finished goods inventory are \$360,000 and 250,000, respectively. Determine the cost of goods sold.
- \$960,000
 - \$740,000
 - \$610,000
 - \$600,000

Great Lake Corporation wishes to prepare a cash budget for November 2014. Sales, purchases, and expenses for October (actual) and November and December (estimated) are as follows:

	Sales	Purchases	Expenses
October	\$48,000	\$35,000	\$14,000
November	40,000	30,000	11,000
December	45,000	22,000	9,500

Sales: All sales are on credit, and the company's experience shows that, on an average, 80 percent of sales are collected in the month of sale and the balance in the following month. A 2 percent discount is allowed on all collections in the month of sale.

Purchases: The company pays 60 percent of purchases in the month of purchase and the balance in the following month. The company is allowed an average discount of 1 percent on payments made in the month of purchase.

Expenses: The monthly expenses for November include charges for depreciation amounting to \$1,000 and \$100 of prepaid expenses, which will expire. All other expenses are paid as incurred.

Other: On September 1, 2014, a new machine was purchased for \$5,000. A down payment of \$500 was made, and it was agreed that the balance would be paid in equal installments in the following three months.

- _____ 17. The cash payments in November for expenses of Great Lake are expected to be
- \$12,500.
 - \$9,900.
 - \$10,000.
 - \$11,000.

- _____ 18. The cash payments in November for payment for the new machine of Great Lake are expected to be
- \$500.
 - \$1,500.
 - \$4,500.
 - \$5,000.
- _____ 19. Which of the following is prepared directly after the cash budget?
- Overhead budget
 - Production budget
 - Budgeted balance sheet
 - Capital expenditures budget

James Corporation's controller has developed the cost and usage data listed below in preparation of standard unit cost information for the coming year.

Direct materials quantity standard	5 pounds per product
Direct labor time standard	3 hours per product
Direct materials price standard	\$9 per pound
Direct labor rate standard	\$8 per hour
Standard variable overhead rate	\$10 per labor hour
Standard fixed overhead rate	\$11 per labor hour

- _____ 20. Using the above information provided for James Corporation, the total standard unit cost is
- \$99.
 - \$132.
 - \$102.
 - \$46.

Candy Stores Inc. gives you the following information:

The standard material cost is \$7 per pound for a 15 pound bag of chocolate. The following is the actual cost and usage data:

Direct materials purchased and used	186,000 pounds
Price paid for direct materials	\$6.00 per pound
Number of bags produced	12,000 units

- _____ 21. Using the above information provided for Candy Stores, compute the direct materials quantity variance for Candy Stores.
- \$42,000 (F)
 - \$42,000 (U)
 - \$186,000 (F)
 - \$186,000 (U)

- _____ 22. During the current month, Thompson Company started 40,000 units of product and transferred 25,000 fully completed units to finished goods. The final work in process inventory was 50 percent complete as to labor operations. There was no initial work in process, and actual labor hours were 150,000 for the period. Each unit should have required 3 direct labor hours to be produced at standard. The total standard hours allowed for the period are
- 75,000 hours.
 - 97,500 hours.
 - 120,000 hours.
 - 150,000 hours.

Robert Inc. uses the standard costing method. The company's main product is a fine-quality headphones that normally takes 0.5 hour to produce. Normal annual capacity is 5,000 direct labor hours, and budgeted fixed overhead costs for the year were \$8,750. During the year, the company produced and sold 5,800 units. Actual fixed overhead costs were \$6,000.

- _____ 23. Using the information provided for Robert Inc, compute the fixed overhead cost variance.
- \$2,750 (F)
 - \$925 (U)
 - \$3,675 (U)
 - \$5,800 (U)
- _____ 24. Using the information provided for Robert Inc, compute the fixed overhead budget variance.
- \$925 (U)
 - \$3,675 (U)
 - \$2,750 (F)
 - \$5,800 (U)

Underfoot Products uses standard costing. The following information about overhead was generated during May:

Standard variable overhead rate	\$2 per machine hour
Standard fixed overhead rate	\$1 per machine hour
Actual variable overhead costs	\$390,000
Actual fixed overhead costs	\$175,000
Budgeted fixed overhead costs	\$190,000
Standard machine hours per unit produced	10
Good units produced	18,000
Actual machine hours	200,000

- _____ 25. Using the above information provided for Underfoot Products, compute the variable overhead variance.
- \$42,000 (F)
 - \$42,000 (U)
 - \$30,000 (U)
 - \$32,000 (F)

Short Answer

1. Distinguish between a supply chain and a value chain. How do they relate to each other?
2. Last year, Amanda Jones opened an ice cream parlor in a busy shopping center. She spent a lot on advertising and attracted many customers into the store, but a few customers made turned up and sales were declining. Amanda paid attention to questions and requests made by customers and determined that they often requested items that were within the scope of her business but that she did not carry. When she offered to order items for her customers, delivery was usually too late and, yet again, sales were lost. What measures should Amanda take to improve her business?
3. A goal of the process value analysis (PVA) is to reduce nonvalue-adding activities. Outline a procedure a company could use to accomplish this goal.
4. Why is process value analysis not part of the general ledger accounting system?
5. How can activity-based systems help managers in a global marketplace?
6. What would a company using an activity-based management approach attempt to do in regard to activities that add value to the product and those that do not?
7. Define activity-based costing. Explain why this approach to cost assignments is superior to the traditional method of using a plantwide overhead cost rate. Will activity-based costing always result in lower product costs? Justify your answer.
8. Distinguish between push-through and pull-through production methods. How does pull-through production meet the requirements of a just-in-time operating environment?
9. When using a just-in-time system, what qualities should be a supplier posses?
10. Explain how a just-in-time operating philosophy reduces the time it takes to complete the production of a product. Include in your answer the classifications of time that are affected. How does such a change help to reduce product costs?

11. Listed below are a number of common manufacturing costs. For each cost, state whether the cost would be considered a direct (D) or indirect (I) cost in a traditional manufacturing environment and in a JIT manufacturing environment.

Cost Element	Traditional Manufacturing Environment	JIT Manufacturing Environment
Insurance		
Property taxes		
Equipment depreciation		
Raw materials		
Materials handling		
Operating supplies		
Power		
Heat and light		
Labor of equipment operators		
President's salary		

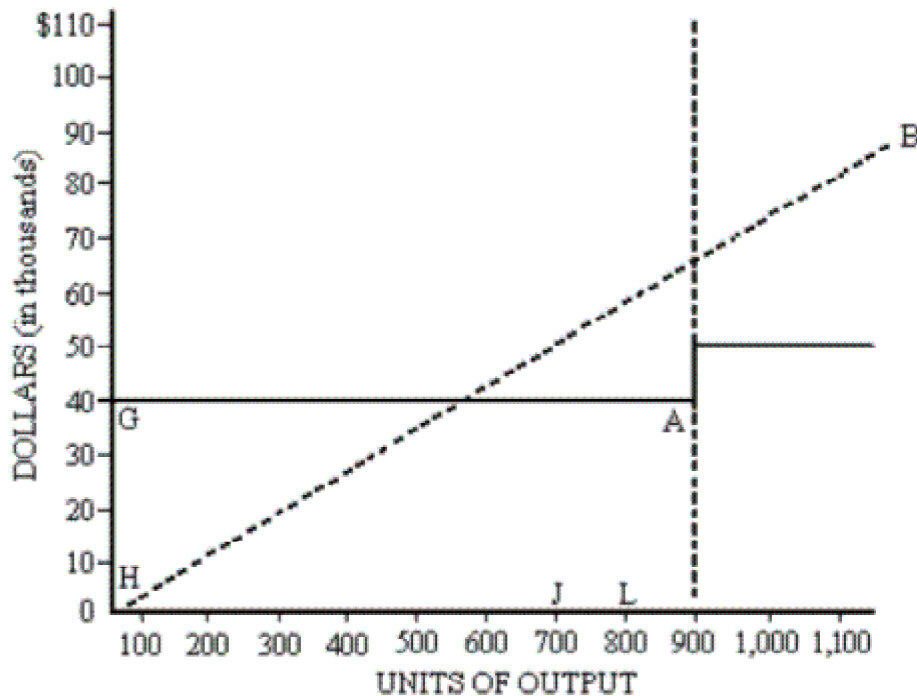
12. Resser Corporation manufactures serving trays and utensils for use by airlines for meal service. Several airlines order these products in large quantities. Resser had adopted an activity-based management philosophy. Listed below are the principal activities of the company.

Product inspection	Product marketing
Product packaging	Accounting
Materials storage	Moving work in process
Product engineering	Inventory control
Product scheduling	Production—assembly
Materials purchasing	Production area cleanup
Production—machine setup	Human resources services
Building maintenance	Product rework
New product design	Depreciation of building

a. Identify activities that are nonvalue-adding.

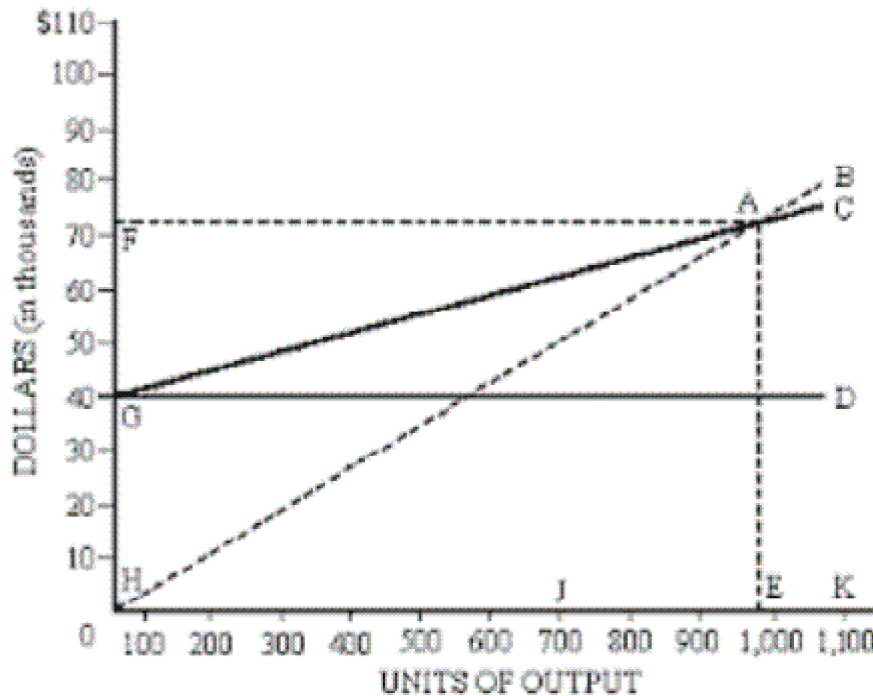
b. Analyze each of the nonvalue-adding activities and determine which are necessary. Suggest how each of the activities that you classified as unnecessary could be reduced or eliminated.

13. The graph below depicts two different types of costs. Questions related to the graph should be answered in the spaces provided.



- The line $H-B$ represents what type of cost? _____
 - Total variable costs for production at point J would be _____ than at point L.
 - Fixed costs per unit at point J would be _____ than at point L.
 - What is a possible reason that line $G-A$ increases at point A to a new horizontal line?
 - What kind of cost is depicted by the line from point G to point A?
14. Briefly explain the use of statistical methods to separate mixed cost components.
15. Explain what cost-volume-profit analysis is and how managers use it.

16. The following graphical breakeven analysis is for Nicronea's new line of desktop computers. Questions related to the graph should be answered in the spaces provided.



- Production at point *J* would be at a _____.
 - The area depicting profitable operations is _____.
 - The fixed costs line is depicted by letters _____.
 - The breakeven point for sales units is at letter _____.
 - Letter *A* represents _____.
 - The line *H-B* represents what CVP element? _____.
 - Total cost of operations is reflected in line _____.
17. List the contents of a master budget for a manufacturing organization by identifying the two major components and the budgets within each of them.
18. Fill in the blanks.
- The cash budget serves two purposes. First, it shows the ending _____, which is needed to complete the _____. Second, it highlights period's excess cash reserves or cash shortages.
 - A projection of cash receipts and cash payments for a future period of time is called a(n) _____.
 - Since the _____ is a summary of all expected transactions for a future time period, it also must be the key to all expected cash transactions.
 - The _____ oversees each stage in the preparation of the _____ budget, decides any departmental disputes that may rise in the process, and gives final approval to the budget.

19. Chad has been making skateboards for his friends and now has more orders than he can handle. He has decided to turn the business into a full-time venture and plans to develop the company into a Fortune 500 company. However, he does not have enough cash and has decided to apply for a Small Business Administration loan. The loan officer informed him that she will need to see projected financial statements with supporting schedules for the next 12 months of operations.
- a. Identify the financial statements and supporting schedules you believe are appropriate.
- b. What information will you need to include in the budgeted financial statements, and where will you get this information?
20. Describe three benefits budgeting provides to an organization's success.
21. Discuss standard costing. As part of your discussion, define a *standard cost*. In addition, compare and contrast standard costs and predetermined overhead costs. Include in your discussion at least three reasons why standard costs are introduced into a cost accounting system. How is a standard cost accounting system useful to management?
22. "A favorable direct materials price variance is always good for a company." Is this statement true? Justify your answer.
23. Mention a few reasons for an unfavorable direct labor cost variance.
24. Differentiate between the variable overhead spending variance and the variance overhead efficiency variance.
25. The effective evaluation of managers' performance depends on both human factors and company policies. Using variances from standard costs in a manager's performance report adds accuracy to the evaluation process. What actions should be taken to ensure effectiveness and fairness when setting up a performance evaluation process?

Matching

Identify the following activities, for an automobile manufacturer as

- a. Value adding
b. Nonvalue adding

- ____ 1. Moving product
- ____ 2. Storing parts
- ____ 3. Cost accounting
- ____ 4. Receiving
- ____ 5. Storing raw materials
- ____ 6. Moving materials
- ____ 7. Working on product

- _____ 8. Painting product
- _____ 9. Engineering design of product

Listed below are the activities of Kids Joy Toys Stores. Identify the level at which each activity would be classified in the cost hierarchy used with ABC.

- a. Unit level
- b. Batch level
- c. Product level
- d. Facility level

- _____ 10. Designing a new product
- _____ 11. Handling materials

Identify the following as fixed costs, variable costs, or mixed costs:

- a. Fixed costs
- b. Variables costs
- c. Mixed costs

- _____ 12. Advertising expense
- _____ 13. Telephone expense
- _____ 14. Insurance on the factory building
- _____ 15. Direct labor

Indicate whether each of the following costs of productive output is usually:

- a. Variable
- b. Fixed

- _____ 16. Machine operator's hourly wages
- _____ 17. City operating license
- _____ 18. Machine helper's wages
- _____ 19. Wiring used in radios
- _____ 20. Indirect materials
- _____ 21. Gasoline for delivery truck

Match the following terms with their meanings.

- a. Standard costs
- b. Variance analysis
- c. Standard direct materials cost
- d. Standard overhead cost
- e. Good units

- _____ 22. The total units produced less units that are scrapped

Name: _____

ID: A

- _____ 23. The price that should be paid for the materials
- _____ 24. The sum of the estimates of variable and fixed overhead costs in the next period
- _____ 25. Realistic estimates of costs based on different analyses