

## Food Metrics- Finance Calculations for Food Systems 2017 2018

### Complete Individually and Show Calculations!

100 points (5 points per question)

- In budgeting terms, the patient food system in a hospital would be classified overall as:
  - Service center
  - Profit center
  - Cost center
  - Service and education center
- The cook followed the recipe to product 300 servings of mashed potatoes. Trayline staff used a #8 scoop for portioning instead of a #10 that was indicated on the spreadsheet. Number of servings needed are 292. How many more portions need to be made?
  - 52
  - 75
  - 40
  - 8
- How many servings of tuna salad using a #12 scoop will you get from 2 gallons?
  - 12
  - 24
  - 48
  - 96
- If ground beef has an 80% yield, how many pounds of beef must be used in spaghetti sauce to be sure a 2 ounce meat portion for 50 people?
  - 12 pounds
  - 125 pounds
  - 8 pounds
  - 15 pounds
- What is the cost of goods sold if inventory on April 1<sup>st</sup> was \$27, 456; inventory on April 30<sup>th</sup> was \$20,556; and purchases totaled \$23,890
  - \$31,456
  - \$23,890
  - \$24,122
  - \$30,790

6. Gross profit/loss is determined by:
- A. Net profits minus labor costs
  - B. Sales minus cost of goods sold
  - C. Revenue minus all operating expenses
  - D. Revenue minus labor costs
7. What is the net profit if sales are \$95,000, gross profit is \$46,500, labor costs are \$27,000 and other operating expenses are \$1500.
- A. \$66,500
  - B. \$18,000
  - C. \$28,000
  - D. \$8,000
8. If the break-even point remains the same, profits will increase if:
- A. Sales increase
  - B. Fixed costs increase
  - C. Selling price increases
  - D. Costs remain the same
9. What is the portion size of a #8 scoop
- A. 8 ounces or  $\frac{1}{2}$  pound
  - B. 4 ounces or  $\frac{1}{4}$  pound
  - C. 4 ounces or  $\frac{1}{2}$  cup
  - D. 8 ounces or 1 cup
10. Your current department budget is \$500,000. Labor is 50%, food costs 40%, all other expenses 10%. What will the budget be for the next year if labor expenses increase by 5%, food increases by 4%, and all other expenses are expected to remain the same?
- A. \$500,000
  - B. \$705,000
  - C. \$520,500
  - D. \$20,500

11. How many FTE's are needed to cover the following schedule:

- 2 FT cooks/day, 7 days a week
- 1 FT salad prep/day, 7 days a week
- 1 FT dessert cook/day, 5 days a week
- 2 FT dietitian assistants/day, 7 days a week
- 2 PT diet clerks, 7 days a week for 6 hours each

- A. 10
- B. 10.1
- C. 10.5
- D. 8

12. Your trayline, which has 6 stations, can produce 275 trays in 1 hour and 15 minutes. What is the productivity of your trayline?

- A. 3.6 trays per minute
- B. 250 trays per hour
- C. 36 trays per hour
- D. Not enough information provided

13. How many labor hours per day are needed to staff the above trayline if the census is 275?

- A. 22.5 hours
- B. 7.5 hours
- C. 1350 minutes
- D. 3.75 hours

14. Compute the popularity index for a chicken sandwich given the following patient ordering data: hamburger 60, chicken 20, roast beef 40.

- A. 15%
- B. 17%
- C. 20%
- D. 25%

15. Given the following information about formula usage, what is the inventory turnover: beginning formula inventory in the adult hospital \$3,287.40, closing inventory \$3,322.60, formula cost \$13,220

- A. 2
- B. 3
- C. 4
- D. 5

16. Labor productivity factor is 0.75 hours/patient day. How many labor hours can be utilized today if the census is 158?
- A. Schedule as posted must be maintained because bylaw you cannot make last minute changes.
  - B. 120 hours
  - C. 118.5 hours
  - D. 210 hours
17. The Courtyard Café sells Veggie Burgers and employs only one cook. During the peak lunch hour, he is able to produce 120 Veggie Burgers an hour. During the slack afternoon period, he produces only 30 Veggie Burgers per hour. If each Veggie Burger sells for \$3.99 and the cook is paid \$9.40 per hour, calculate the labor cost per Veggie Burger during each of the 2 time periods.
- A. \$0.07 and \$0.47
  - B. \$0.11 and \$0.36
  - C. \$0.078 and \$0.31
  - D. \$0.11 and \$1.02
18. How many meals were served per labor hour if 34 FTE's produced 3800 meals in one 40 hour week.
- A. 2.79
  - B. .05
  - C. 1.12
  - D. .025
19. What is the cost per meal if:  
Beginning inventory was \$8439.52; Ending inventory was \$7850.76; Purchases were \$20,401; and Meals served were 5963?
- A. \$2.73
  - B. \$3.52
  - C. \$3.68
  - D. \$4.09
20. In a hospital with 300 patients, it takes 14 minutes to prepare one meal. How many FTE's are needed to prepare meals for 1 week?
- A. 12.50
  - B. 36.75
  - C. 46.10
  - D. 15.75