

Student name: \_\_\_\_\_

**1)** It is commonly believed that the best ways to motivate an employee are (1) to improve the quality of the workplace and (2) to make the employee feel like he/she is part of the company. How would an economist analyze these statements?

**2)** Stella Ann Freeman is having a difficult time deciding whether or not to purchase a new car. How would understanding the concept of opportunity cost help her make a decision?

**3)** Jim Range has to choose between buying more soda or more pasta for the week. He has a fixed income and he knows the prices of both products. Using indifference curves and budget constraints, illustrate the amount of soda and pasta that Jim will purchase. When he gets to the store, he finds that the price of soda has fallen dramatically. How does this change

his optimal purchase? Can a general rule of human behavior be developed from this graphical example?

4) Patrick consumes only two goods: Celtic Music concerts and Celtic Springs Water. Patrick earns \$100 per month at his part-time job in the library. The price of Celtic concerts is \$10. The price of Celtic Springs Water is \$2. Patrick currently goes to 5 Celtic concerts and consumes 25 bottles of Celtic Spring Water in a month.

(a) Draw Patrick's budget constraint and optimal consumption bundle such that Celtic concerts are measured on the horizontal axis.

(b) In April, Patrick receives a 5 percent pay increase. Inflation raises the price of concerts to \$10.50 and the price of Celtic Springs Water to \$2.10. Draw Patrick's new budget constraint and optimal consumption bundle, considering that the number of Celtic concerts is measured along the horizontal axis. How many Celtic concerts does he attend in April? How many bottles of water does he drink in April?

5) Ali inherits \$10,000 from his great-great aunt in 2018. His great-great aunt's will requires that Ali spend the money before December 31, 2019. He has two spending options: He can either spend the amount in 2018 or in 2019. Suppose this is Ali's only source of income and the interest

rate on loans or savings is 10 percent.

(a) How much could Ali spend in 2018 if he only consumes in 2018? How much could Ali spend in 2019 if he only consumes in 2019?

(b) What is the opportunity cost of consuming \$1.00 in 2018 in terms of forgone consumption in 2019? Draw Ali's budget constraint and optimal consumption bundle, considering that the spending in 2018 is measured along the horizontal axis.

(c) Ali decides to spend \$6,000 in 2018 and \$4,400 in 2019. Show this optimal consumption bundle using a budget constraint and indifference curve diagram.

6) What is the relationship between the slope of the budget line and the notion of opportunity cost?

7) What does the tangency between an indifference curve and the budget line determine?

8) Contrast the good-citizen model with the economic model to explain the reason why people engage in honest behavior.

9) Wanda Weeks has decided to stay in a lower-paying position with a local electric company rather than accept a much higher-paying job with a new information technology

company. Use a risk model to explain her decision.

10) You have \$64 to spend on fish (F) and chips (C). Suppose the price per unit of fish ( $P_f$ ) is \$8 and the price of chips ( $P_c$ ) is \$2. Your utility function for fish and chips is given as  $\sqrt{FC}$

such that  $MU_C = \frac{\sqrt{F}}{2\sqrt{C}}$

and  $MU_F = \frac{\sqrt{C}}{2\sqrt{F}}$

are the marginal utilities of F and C. How many units of C and F should you buy to exhaust all income and to maximize utility?

11) Assume Kathy likes to shop and knows how to get the best deal for her money, which is not always the cheapest

option. She has a weekly budget of \$1,000 and

needs to purchase a laptop or a desktop computer. Which of the following is the most optimal choice for Kathy?

- A) She does nothing and continues to save.
- B) She chooses the goods and services that will maximize her personal happiness.
- C) She selects the cheapest option so there will be

money left for other items.

- D) She purchases the high end model, putting the overage on credit, to pay-off later.

**12) Marginal costs**

- A) are the incremental costs associated with making a decision.
- B) are the expenditures already made that can't be recovered.
- C) are not relevant when making an economic

decision.

- D) are costs that are usually classified under "miscellaneous."

**13) If Larry starts a new pizza parlor and hires a manager for \$30,000 per year, this implies that**

- A) pizza parlor managers are inexpensive to hire.
- B) Larry values his labor at less than \$30,000 per year.
- C) Larry values his labor at more than \$30,000 per

year.

- D) the price of pizza will increase if Larry works in the parlor himself.

**14) Marginal analysis refers to the**

- A) relationship between the cause and effect of an economic event.
- B) study of trade relations based on absolute cost differences.
- C) comparison of benefits and costs of choosing a

little more or a little less of a good.

- D) calculation of opportunity costs of an economic activity.

15) Sunk costs refer to

A) costs that were incurred in the past and cannot be recovered and thus should not affect current decisions.

B) all the costs that a firm must incur in the process of production.

C) the costs that change proportionately with a

change in the output.

D) the quantities of a good that are given up to obtain one unit of another good.

16) Robinson pays \$100 for tickets to see his favorite sports team play. With 10 minutes left in the game, his team is losing heavily and has no chance of winning the game. Robinson chooses to stay until the end of the game because he

A) stay until the end of the game as his intuition is correct.

B) stay until the end of the game as he might be heckled on the way out.

C) leave the game if his marginal benefit of leaving

wants to get the full value for his admission price. As an economist, you should advise Robinson to

is greater than marginal cost, as the admission price is a sunk cost.

D) leave the game now as the line to exit the stadium is shorter now.

17) Assume that the quantity of CDs is measured on the horizontal axis, while the quantity of movie tickets is measured on the vertical axis. If available income decreases, then

A) the horizontal intercept of the budget line decreases, while the vertical intercept remains unchanged.

B) the vertical intercept of the budget line decreases, while the horizontal intercept remains unchanged.

C) the budget line will shift inward.

D) the budget line will shift outward.

- A) he prefers (3, 9) over (6, 6).
- B) he prefers (9, 3) over (6, 6).
- C) he prefers (6, 6) over both (3, 9) and (9, 3).

D) he prefers (6, 6) over (3, 9) but not over (9, 3).

**19)** Assume that the quantity of X is measured on the horizontal axis, and the quantity of Y is measured on the vertical axis. Assume that the price of X is \$3 and the price of

Y is \$6. If Amanda has \$90 to spend on X and Y, then

- A) she can buy, at most, 30 units of good X.
- B) her budget line has a slope of  $-2$ .
- C) her budget line has a slope of  $-3$ .

D) she can buy, at most, 15 units of good X.

**20)** George likes skiing and needs one pair of bindings for each pair of skis he owns. George's indifference curves for skis and bindings

- A) are approximately L-shaped.
- B) are straight lines.

C) slope downward.  
D) slope upward.

**21)** Assume Joseph spends his entire income on X and Y, and his indifference curves have the usual convex shape. If

Joseph maximizes his utility, then

- A) he spends his entire available income.
- B) there are other bundles that are preferred at the current price ratio.
- C) the slope of his indifference curve is greater than the slope of his budget line.

D) the slope of his indifference curve is smaller than the slope of his budget line.

**22)** A budget line

- A) shows all the combinations of goods that yield the

same utility.  
B) shows all the

combinations of goods that require the same total expenditure.

C) has a slope that depends on consumers' income.

D) usually slopes upward.

**23)** Assume that the quantity of apples is measured on the horizontal axis and the quantity of oranges is measured on the vertical axis. If the budget line rotates upward while keeping

the same horizontal intercept, it implies that

A) the price of apples has decreased.

B) the price of oranges has decreased.

C) the available income has increased.

D) the price of oranges has increased.

**24)** Johnny consumes only bread and milk. Suppose the quantity of milk is measured along the horizontal axis. If the

price of milk rises, his budget constraint will

A) shift outward.

B) shift inward.

C) rotate inward along the horizontal axis.

D) rotate inward along the vertical axis.

**25)** Suppose a family's budget line is such that the horizontal axis shows the amount of food consumed, while the vertical axis measures the consumption of all other goods. Suppose this family receives food stamps. This will cause the budget line to

A) rotate leftward along the vertical axis.

B) pivot along the horizontal axis.

C) shift rightward along the horizontal axis.

D) shift leftward.

**26)** Smith is given a



voucher that can be spent only on textbooks. Smith has a budget constraint with textbooks measured along the horizontal axis and everything else on the vertical axis.

- A) the voucher causes Smith to increase his spending on textbooks by more than the amount of the voucher.
- B) Smith will most likely end up spending some more money on everything else after receiving the voucher.
- C) Smith will not buy any textbooks because he can

**27)** Susan Chen is a retail banker. She values two goods: money (income) and her integrity. Her bonus is based on the number of investments she recommends to the company.

- A) the more she is willing to trade off her integrity for money.
- B) the less she is willing to trade off her integrity for money.

**28)** Using the economists' view of behavior, managers will be most effective if they can

- A) motivate desired actions by establishing appropriate incentives.
- B) improve employee satisfaction with the job.
- C) communicate goals and objectives effectively to

**29)** Which of the following is a primary role of a manager according to the good-citizen model?

- A) to communicate the goals and objectives of the organization to employees
- B) to discourage innovation at work

Suppose everything else is comprised only of normal goods. Then

use the voucher for all other goods.

- D) the voucher does not have any impact on Smith's consumption.

Generally speaking, the higher the bonus she receives,

- C) the smaller is the shift in her budget line.

- D) the more she is indifferent to changes in the level of bonus.

their employees.

- D) fire inefficient employees.

- C) to allow the employees to work independently, without any help from the managers

D) to recognize and reward an employee who is honest, punctual, and obedient

30) The \_\_\_\_\_ model suggests that the productivity of employees in a firm will increase if the firm offers lifetime

- A) only-money-matters
- B) happy-is-productive

employment and a high salary.

- C) product-of-the-environment
- D) good-citizen

31) Which of the following is a possible criticism of the happy-is-productive model?

- A) The roles attributed to managers under this model represented a new brand of elitism.
- B) The economic interests of employees were inappropriately emphasized under this model.
- C) The model is based on the assumption that firms

operate in a market where there is fierce competition among firms.

- D) The model proves to be expensive for a firm to execute.

32) Which of the following is a feature of a behavioral economic model?

- A) It focuses on cognitive, emotional, and social factors that affect individual decisions.
- B) It considers incentives an unimportant tool to study human behavior.
- C) It suggests that individuals always behave

rationally.

- D) It is based on marginal analysis in decision making.

33) The \_\_\_\_\_ of an uncertain payoff is defined as the weighted average of all possible outcomes, where the probability of each outcome is used as the weights.

- A) expected value
- B) standard deviation

- C) variance
- D) skewness

**34)** ABC Corp. has a bonus plan in place for its CEO, linking her pay to annual earnings. ABC will pay her \$180,000 if earnings are high, \$90,000 if they are normal, and \$0 if they are low. Each event is estimated to have equal probability. Assume the CEO is indifferent between this bonus plan and receiving \$75,000 with certainty. Which of the following is true?

- A) The CEO's expected bonus is \$90,000.
- B) The CEO is not willing to give up \$15,000 in expected bonuses in order to avoid the risky scheme.
- C) \$85,000 is the CEO's certainty equivalent for the

current bonus plan.

- D) The CEO has no clue about risk management.

**35)** A risk-averse agent

- A) only cares about expected payoff.
- B) cares about expected payoff as well as the variability of a payoff.
- C) only cares about the variability of a payoff.

- D) does not care about expected payoff.

**36)** Assume that Janet is risk-averse. Which of the following bets is she more likely to accept, depending on the degree of risk aversion?

- A) win \$40 one-fourth of the time, win \$10 one-half of the time, and lose \$40 one-fourth of the time
- B) win \$40 one-fourth of the time, break even one-half of the time, and lose \$40 one-fourth of the time
- C) win \$20 one-fourth of the time, win \$10 one-half of the time, and lose \$20 one-fourth of the time

- D) win \$20 one-fourth of the time, win \$10 one-fourth of the time, and lose \$20 one-fourth of the time

**37)** Assume MACROSOFT is planning to develop and sell a new word processor. It estimates that R&D expenses will amount to \$300,000 for this new software, and it will have to invest an additional \$150,000 to advertise and distribute the new product. If MACROSOFT's managers are

- A) at least \$150,000.
- B) at least \$100,000.
- C) at least \$300,000.

risk-neutral, they will undertake this project if the expected revenues from the sales of the new software are

- D) at least \$450,000.

**38)** Assume that the quantity of apples is measured on the horizontal axis and the quantity of oranges is measured on the vertical axis. If Andy likes both apples and oranges, then his Marginal Rate of Substitution along the indifference curve indicates

- A) how many oranges he is willing to give up in order to obtain one more apple.
- B) how many additional oranges he wants in order to give up two apples.
- C) how many oranges he is willing to give up in

order to get rid of one apple.

- D) how many apples he is willing to give up in order to get rid of one orange.

**39)** The substitution effect

- A) reduces the quantity demanded of a good when its price increases.
- B) is equal to the income effect for a normal good.
- C) is always greater than the income effect.

- D) is always smaller than the income effect.

**40)** The quantity demanded of a good is impacted by

- A) the substitution effect only.
- B) the income effect only.

- C) risk-aversion by consumers.
- D) both the substitution and income effects.

**41)** The absolute value of the marginal rate of substitution is a measure of

- A) the slope of a budget constraint.
- B) the slope of an indifference curve.
- C) the relative price of two goods.

D) income effect of a price change.

**42)** Marginal utility is the

- A) total happiness obtained from a consumption bundle.
- B) additional utility obtained by a fall in the price of a good.
- C) additional utility obtained by consuming one

additional unit of a good.

D) total amount spent to purchase one additional unit of a good.

**43)** You purchase both potatoes and gasoline regularly. Your income increases and you purchase more gasoline and

- A) gasoline has a negative substitution effect.
- B) potatoes are normal goods.
- C) gasoline is an inferior good.

less potatoes. This implies that

D) gasoline is a normal good.

**44)** Suppose canned soup is an inferior good. This means that

- A) when income rises, more cans of soup will be bought.
- B) when income rises, fewer cans of soup will be bought.

C) when income

falls, fewer cans of soup will be bought.

D) you will never consume canned soup because of its low quality.

**45)** The income effect means that when the price of a good rises

- A) the buying power of your income falls.
- B) consumers have an incentive to consume less of the good with a relatively higher price and more of the good with a relatively lower price.

C) your preferences also change.

D) you buy more normal goods and fewer inferior goods.

**46)** O'Roberts receives a cash prize of \$3,000 and is trying to decide how much money to invest at an interest rate of 5 percent and how much to spend now. Consider his inter-temporal budget constraint where future interest income is

measured on the vertical axis. If the interest rate were 7 percent instead, his budget constraint would

- A) rotate inward along the vertical axis.
- B) rotate inward along the horizontal axis.
- C) rotate outward along the vertical axis.

D) rotate outward along the horizontal axis.

## **Answer Key**

Bank

Test name: Managerial Economics and  
Organizational Architecture Chapter 02 Test

11) B

12) A

13) C

14) C

15) A

16) C

17) C

18) C

19) A

20) A

21) A

22) B

23) B

24) C

25) C

26) B

27) A

28) A



29) A

30) B

31) A

32) A

33) A

34) A

35) B

36) C

37) D

38) A

39) A

40) D

41) B

42) C

43) D

44) B

45) A

46) C