

## Chapter 4

# CONSUMPTION AND DECISION MAKING

*Essentials of Economics in Context* (Goodwin, et al.), 2nd Edition

### Chapter Overview

This chapter focuses on what goes into the making of economic decisions and presents the traditional utility-theoretic model of consumer behavior. The first part briefly introduces the classical view of human rationality – which goes back to Adam Smith. We then present the neoclassical model and explain the notion of consumer sovereignty, budget line, and explain the rule for utility maximization derived from marginal thinking. It is important to get the students to understand the way in which rationality and self-interest are related, according to traditional economic thought.

The next section is on behavioral economics, and it presents some examples of how humans often do not behave “rationally” as defined by the neoclassical model. This part allows for exploration of what rationality truly means, and discussion of the extent to which neoclassical economics has it correct. Experimental examples such as framing and anchoring are presented. The section also discusses the importance of time discounting and emotions in the making of economic decisions, factors not previously considered in neoclassical theory.

We set this standard material in context by then moving on to different perspectives on consumer behavior. We consider the social and environmental contexts of modern consumer society. Finally, we explore public policy options to limit excessive consumerism.

### Objectives

After reading and reviewing this chapter, you should be able to:

1. Explain the neoclassical economic model of human behavior.
2. Draw a budget line and a utility function.
3. Discuss how marginal thinking can be used to maximize consumer utility.
4. Describe in what key ways behavioral economic is a departure from neoclassical theory.
5. Explain the roles that time and emotions play in economic decisions.
6. Discuss economic behavior “in context”—that is, from a substantially more complex “real world” perspective.
7. Explain the implications of the social context for consumer behavior.
8. Describe the link between consumption and the environment.
9. Discuss policy options for influencing consumer behavior.

## Key Term Review

neoclassical model	satisfice
consumer sovereignty	meliorating
budget line	bounded rationality
utility	consumerism
utility function (total utility curve)	absolute deprivation
marginal utility	reference group
diminishing marginal utility	aspirational group
behavioral economics	relative deprivation
framing	voluntary simplicity
anchoring effect	ecological footprint
time discount rate	green consumerism
altruism	ecolabeling
common good	libertarian paternalism
neuroeconomics	

## Active Review

*Fill in the blank*

1. The idea of consumer sovereignty holds that \_\_\_\_\_ is the ultimate economic goal.
2. A group to which a consumer wishes he or she could belong to is a(n) \_\_\_\_\_ group.
3. A \_\_\_\_\_ line shows all the combinations of two goods that a consumer can purchase, given his or her monetary resources and the prices of the two goods.
4. The idea that a consumer's additional utility from successive units of a good tends to decrease is known as \_\_\_\_\_.
5. The feeling of lack that comes from comparing oneself with someone who has more is known as \_\_\_\_\_.
6. The practice of reducing one's overall level of consumption in order to reduce their environmental impacts is referred to as \_\_\_\_\_.
7. A conscious decision to live with a limited or reduced level of consumption is known as \_\_\_\_\_.

8. \_\_\_\_\_ economics is a subfield of microeconomics concerned with how economic decisions are made.
9. The deliberate changing of the presentation of choices in order to influence the final economic decision is known as \_\_\_\_\_.
10. We say that people with a low \_\_\_\_\_ place relatively high value on possible outcomes in the distant future.
11. The idea that people consider some, but not all, relevant information when making a decision is included in a broad concept of \_\_\_\_\_ rationality.
12. We are being \_\_\_\_\_ if our actions are focused on the well-being of others instead of our own well-being.

*True or False*

13. Renee allocates her income between soup and nuts. If the price of soup increases while the price of nuts remains constant, Renee's budget line will shift inward to a new, parallel budget line.
14. John allocates his income between bows and arrows. Suppose that a graph of his budget line shows quantity of bows on the horizontal axis and quantity of arrows on the vertical axis. If the price of bows decreases, John's budget line pivots outward to a new line with a shallower slope.
15. The neoclassical model of human behavior is consistent with the behavioral economics approach.
16. The deliberate change in the way in which available information is presented is known as satisficing.
17. When we place less economic importance on the future than on the present, we are engaging in discounting.
18. Satisficing is a better strategy than optimizing when the decision to be made is highly complex.
19. Meliorating refers to the act of engaging in bounded rationality.
20. Having aspirational groups tends to reduce people's level of consumerism.

*Short Answer*

21. Explain why a utility curve becomes flatter as consumption levels increase.

---

---

---

---

---

22. What is the difference between absolute and relative deprivation?

---

---

---

---

---

23. Briefly explain how neoclassical and behavioral economics differ from each other.

---

---

---

---

---

24. Discuss in what way rationality is related to self-interest. Are the two concepts synonymous?

---

---

---

---

25. Give a few examples of how we sometimes behave in a seemingly irrational manner. Is such behavior uncommon? Discuss.

---

---

---

---

26. Is our time discount rate typically the same for all types of choices or decisions? Should it be? Explain.

---

---

---

---

## Problems

1. Joel has \$10 to spend on some combination of roses and daisies. Roses cost \$1 each, and daisies cost \$2 each.
  - a. Draw Joel's budget line, putting daisies on the vertical axis.
  - b. If Joel buys four daisies, how many roses can he buy?
2. Continuing the example from above, now suppose that Joel's income increases from \$10 to \$12. Sketch the budget line from Problem #1 and then show the change to the new budget line.
3. Continuing with the same example, suppose that Joel takes his \$12 to the flower shop and discovers that someone else just bought almost all the roses and daisies in the shop. Only 4 roses and 2 daisies remain in the shop, so that's all Joel can buy.
  - a. Show this consumption combination on the graph. Does it fall to the left or right of the budget line?

- b. The next day, Joel goes back to the store with his \$12 and this time there are plenty of roses and daisies available for purchase. However, the price of roses has increased to \$2. Show the budget line before the price change, and then the resulting change in Joel's budget line.
  
- 4. Jenny divides her income between corn and beans. She has a total of \$100. Beans cost \$10 per sack, and corn costs \$20 per sack.
  - a. Draw Jenny's budget line, with beans on the vertical axis.
  
  
  
  
  
  
  
  
  
  
  - b. The price of both beans and corn decreases by 50%, to \$5 and \$10 respectively. Draw the change in Jenny's budget line on the graph in part (a).
  
  
  
  
  
  
  
  
  
  
  - c. What other event could have produced the change you diagrammed in your answer to part b?

## Self Test

1. Which of the following statements about Adam Smith is false?

- a. Smith is the author of *The Theory of Moral Sentiments*.
- b. Smith is the author of *The Wealth of Nations*.
- c. Smith believed that there is no need for altruistic behavior.
- d. Smith's work has been used to justify views that are not necessarily supported by his writing.
- e. Smith wrote about both economic and ethical issues.

Questions # 2 and # 3 refer to the budget line graph below.



2. Dorothea has to allocate her budget between groceries and rent. Which of the following combinations can Dorothea afford?

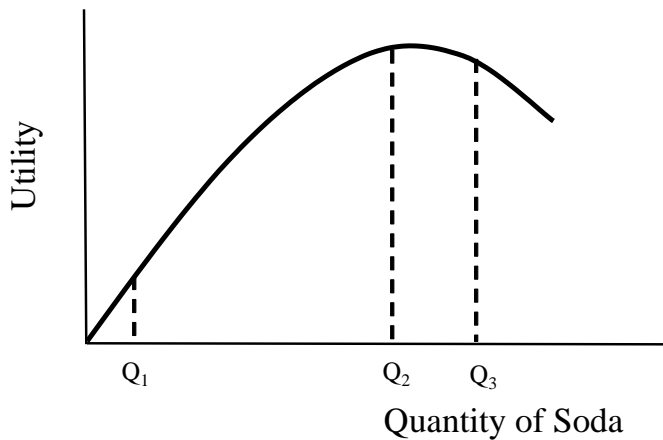
- a. 6 weeks of rent and 20 bags of groceries
- b. 6 weeks of rent and 10 bags of groceries
- c. 1 week of rent and 25 bags of groceries
- d. 5 weeks of rent and 18 bags of groceries
- e. 6 weeks of rent and no groceries

3. Dorothea has to pay for a trip to the emergency room when her niece has an asthma attack. Now she has less money for groceries and rent. What happens to her budget line?

- a. The slope increases.
- b. The slope decreases.
- c. The budget line does not change.
- d. The budget line shifts toward the origin while the slope does not change.
- e. The budget line pivots to the right.

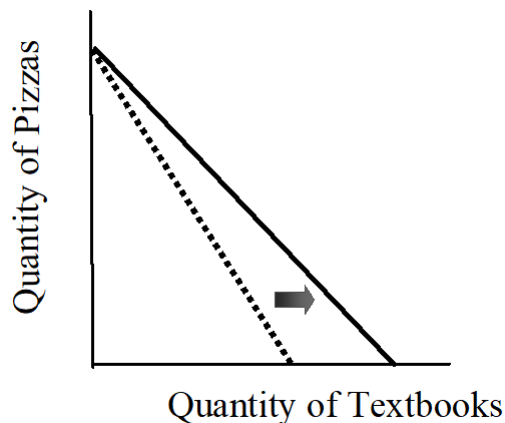
4. Consumer sovereignty is the idea that
- Businesses should be consumer-oriented.
  - Consumers should be independent of the government.
  - Consumer satisfaction is the ultimate economic goal.
  - It's important to the economy for consumers to be employed independently.
  - Both a and c.

**Question #5 refers to the following graph.**



5. The graph above shows the utility function of a student consuming bottles of soda. Which of the following statements is *false*, based on the information in this graph?
- The marginal utility of an additional can of soda in the region from  $Q_1$  to  $Q_2$  is positive.
  - Diminishing marginal utility first occurs at  $Q_3$ .
  - Soda consumption is characterized by diminishing marginal utility.
  - Marginal utility is greater at  $Q_1$  than at  $Q_2$ .
  - At  $Q_3$ , an additional bottle of soda makes the student feel worse, not better.

**Question #6 refers to the following graph.**





6. Marnie allocates her income between pizzas and textbooks. Which of the following events could shift her budget line from the dotted to the solid line in the graph above?
- A decrease in the price of textbooks
  - An increase in the price of textbooks
  - An increase in the price of pizzas
  - A decrease in the price of pizzas
  - Marnie signing up for a class that requires her to buy more textbooks
7. A consumer society is best described as one in which ...
- people have enough money to buy consumer goods and services.
  - people form reference and aspirational groups.
  - people derive their sense of identity largely through consumer goods and services.
  - consumer institutions such as credit, advertising, and regulations are fully developed.
  - consumer impacts are environmentally unsustainable.
8. Suppose someone from a middle-class neighborhood feels poor driving through an upscale neighborhood. This is an example of ...
- shallow green consumerism
  - deep green consumerism
  - absolute deprivation
  - relative deprivation
  - subjective well-being
9. Some people have argued that if everyone simply follows his or her own self-interest, societal well-being will automatically result. This view overlooks ...
- the fact that people may not have all the information they need to make good decisions.
  - the fact that people almost always work to advance the common good.
  - the fact that people optimize.
  - the fact that people have high discount rates.
  - the role of markets.
10. The term "rational behavior" is used in neoclassical economic models to describe behavior that *best* moves a person toward his or her goals. This behavior is known as
- bounded rationality
  - satisficing
  - meliorating
  - organizational savvy
  - maximizing

11. When people alter their choices based on how the relevant information is presented to them, this is an example of ...
- a. behavioral economics
  - b. satisficing
  - c. framing
  - d. anchoring
  - e. optimizing
12. When people over-rely on information that may or may not be relevant to the decision at hand, it is called ...
- a. neoclassical economics
  - b. satisficing
  - c. framing
  - d. anchoring
  - e. optimizing
13. The concept that describes the relative weighting of present versus future benefits and costs is known as the ...
- a. time value factor.
  - b. time discount rate.
  - c. analysis of variance.
  - d. quotient of quotidian time.
  - e. None of the above are correct.
14. Emotions ...
- a. have no relevance in economics.
  - b. are always rational.
  - c. are at the foundation of optimization behavior.
  - d. sometimes provide wisdom in decision making.
  - e. must be balanced with reasoning when conducting neoclassical analysis.
15. Which of the following do *not* play any role in decision-making?
- a. Time
  - b. Money
  - c. Media influence
  - d. Advertising
  - e. All of the above play a role.

16. The neoclassical economic model assumes perfect rationality and perfect information. Which of the following situations is most consistent with this model?

- a. You need to buy a pair of shoes. You find out what store sells the best shoes for the lowest prices, and you go shopping there.
- b. You need to buy a pair of shoes, so you buy them at the nearest store.
- c. You get drunk at a fraternity party because you want to impress your friends.
- d. You don't study the night before your economics exam because your roommate is sick and needs your help.
- e. You buy a used car without doing research beforehand, and end up paying more than the car is worth.

17. Suppose a consumer decides not to purchase an automobile to reduce her environmental impacts. This is an example of ...

- a. shallow green consumerism
- b. deep green consumerism
- c. absolute deprivation
- d. relative deprivation
- e. subjective well-being

18. Bounded rationality ...

- a. is a euphemism for highly irrational behavior.
- b. is always path dependent.
- c. usually does not lead to the “optimal” choice.
- d. was discussed extensively in *The Theory of Moral Sentiments*.
- e. None of the above are true.

19. Which of the following exemplifies a high time discount rate?

- a. Making sure to save money for your child's college education, even though your child is still young.
- b. Deciding to take an expensive vacation now, even if it means not taking a vacation next year.
- c. Taking steps to avoid water pollution, because the pollution could decrease fish yields next year.
- d. Planting an acorn with the intention that your grandchildren will enjoy the full-grown oak tree.
- e. Putting money away for a rainy day.

20. Which of the following situations best illustrates the concept of satisficing?
- a. Claudillo looks for a job that will pay better than his last job.
  - b. Johanna researches every possible option before she chooses what model of car she will buy.
  - c. Albert eats a peanut butter sandwich for lunch every day because that's all he can afford.
  - d. Juan wants an affordable three-bedroom apartment. He rents the first one he finds.
  - e. Carla saves her money carefully so she can take a year off from work and write a novel.

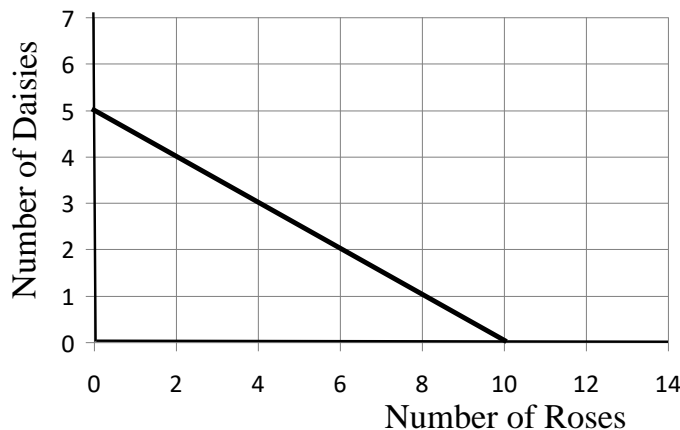
### Answers to Active Review Questions

- 1. consumer satisfaction
- 2. aspirational
- 3. budget
- 4. diminishing marginal utility
- 5. relative deprivation
- 6. deep green consumerism
- 7. voluntary simplicity
- 8. behavioral
- 9. framing
- 10. time discount rate
- 11. bounded
- 12. altruistic
- 13. False. Her budget line will rotate, not shift.
- 14. True.
- 15. False. These are very different; in fact, weaknesses in neoclassical economics with regard to how people make decisions are what have given rise to behavioral economics.
- 16. False. It is known as framing.
- 17. True.
- 18. True.
- 19. False. Meliorating is continuously attempting to improve upon one's situation.
- 20. False.
- 21. A utility curve becomes flatter as consumption levels increase because of diminishing marginal utility. Each successive unit of consumption provides a smaller increase in utility. Thus the utility curve rises by a smaller amount with each additional unit of consumption.
- 22. Absolute deprivation is an inability to meet basic needs. One-third of humanity suffers from absolute deprivation, most of them in developing countries. Relative deprivation is a feeling of lack that comes from comparing oneself to others who have more, and can occur even among those with relatively high incomes.

23. Neoclassical economics narrowly holds that all economic decisions are dictated by rationality, which is the pursuit of self-interest. Behavioral economics offers a more nuanced approach to economic decision making, which maintains that rationality in a neoclassical sense is practically impossible (given existing real-world constraints) and that people are sometimes altruistic instead of self-interested.
24. According to the neoclassical model, the two are indistinguishable, since rationality is defined as the incessant pursuit of self-interest. The broader behavioral model, however, believes that rationality neither requires nor is required by self-interest. It allows for bounded rationality or satisficing (which it deems rational), as for altruistic behavior. Moreover, according to this model, self-interest can also be pursued irrationally.
25. One example is where we allow ourselves to be confused by the framing of a problem requiring a decision. “Lives saved” and “deaths averted” mean the same thing, but which is used often influences the choices people make. Another example is where we allow, say, one video clip influence our thinking to a greater extent than a summary of many responses that contradicts the video. Such behavior is “irrational” according to the neoclassical model, but it is actually quite common and *not* irrational according to the behavioral model.
26. No, it generally is not, nor should it be. For example, we tend to value the future to a significant degree when it comes to our finances, meaning that many save a fair share of their income for future use. On the other hand, many of us tend to be more shortsighted when it comes to making decisions (often related to consumption of products, energy, or materials) that have an adverse impact on the natural environment. For a variety of reasons, we tend to prefer pushing these “costs” on to future generations.

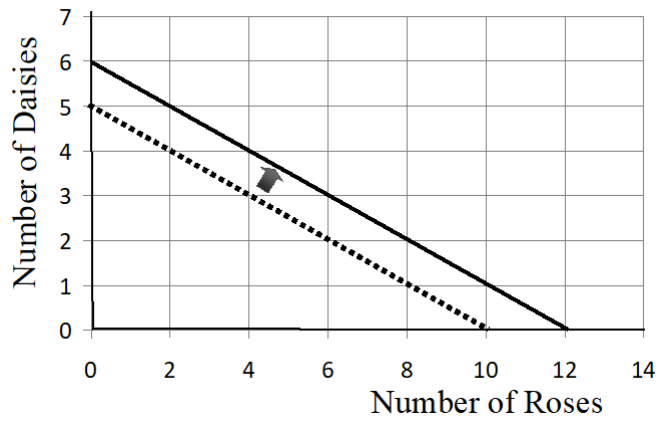
## Answers to Problems

1. a.

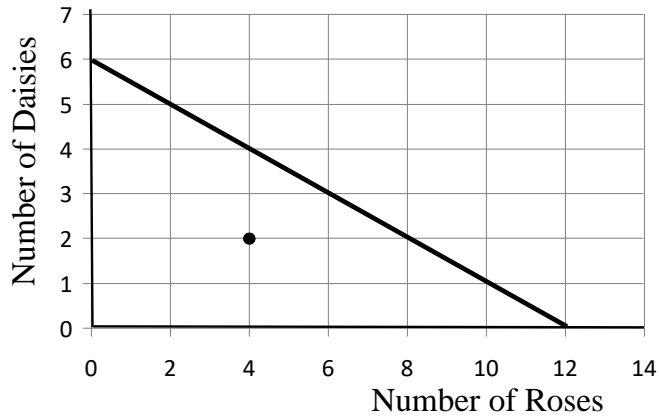


1. b. After spending \$8 ( $= 4 \times \$2$ ) on daisies, Joel has enough left to buy 2 roses.

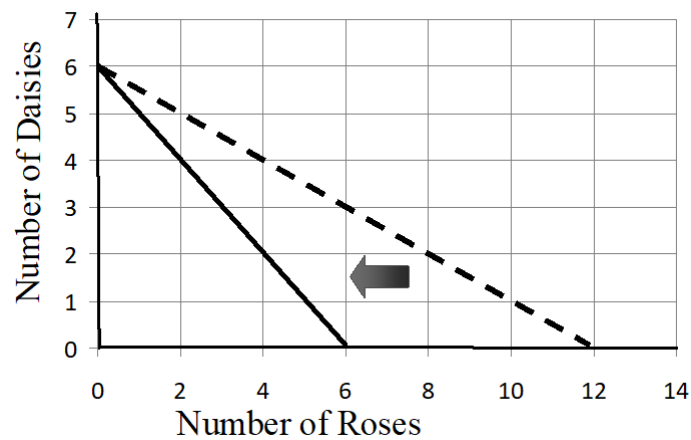
2.



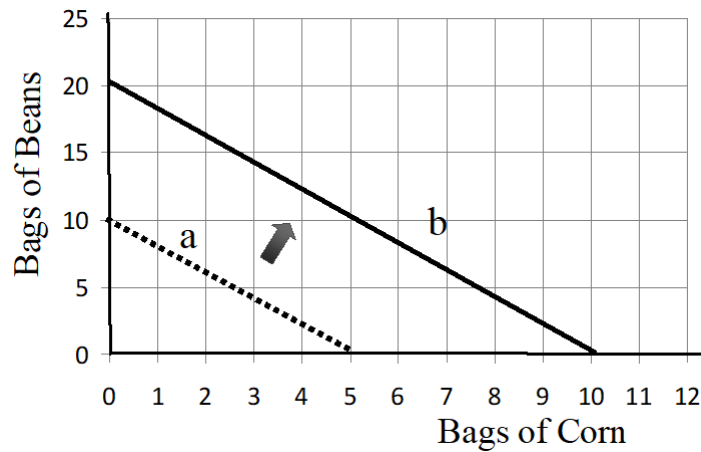
3. a. This consumption combination, shown as a point, falls well to the left of the budget line.



3. b.



4. a and b



4. c. An increase in Jenny's income from \$100 to \$200 would have produced the same change.

### Answers to Self Test Questions

1. c
2. e
3. d
4. c
5. b
6. a
7. c
8. d
9. a
10. e

11. c
12. d
13. b
14. d
15. e
16. a
17. b
18. c
19. b
20. d