

ECON 251
Final Exam
Fall 2012

1. Emily is thinking of going shopping on Black Friday for a Nook Tablet. Emily values the Nook Tablet at \$200. She sees in an advertisement that the Nook Tablet is on sale at Target for \$150, but Emily realizes she will have to wait in line for 2 hours to checkout if she goes to Target on Black Friday. If Emily wasn't at Target waiting in line to check out she could continue sleeping for 2 hours which she values at \$60. Which of the following best explains what Emily should do?
 - a. Emily should wait in line to purchase the Nook Tablet since she values the Nook Tablet at \$200 and the economic cost of the Nook is only \$150.
 - b. Emily should wait in line to purchase the Nook Tablet because it is on sale.
 - c. Emily should purchase the Nook Tablet because the economic cost of the Nook Tablet is only \$60, which is well below the purchase price of \$150.
 - d. Emily should not purchase the Nook Tablet because the economic cost of the Nook Tablet is greater than the amount she values the Nook Tablet.

Use the following information to answer the next four questions. Kayla and Bradley just recently got married. They are considering ways in which they can efficiently share household chores. In an hour Kayla can either wash 10 dishes or make 4 beds. On the other hand, in an hour, Bradley can wash 8 dishes or make 2 beds.

2. Based on the information given above, Kayla's marginal cost of making a bed is _____.
 - a. 0.40 washed dishes.
 - b. 2.50 washed dishes
 - c. 0.25 washed dishes
 - d. 4.00 washed dishes
3. If Kayla and Bradley agree to allocate chores based on who has comparative advantage then, _____ would wash dishes, and _____ would make beds.
 - a. Bradley ; Kayla
 - b. Bradley ; Bradley
 - c. Kayla ; Kayla
 - d. Kayla ; Bradley
4. If Kayla and Bradley were to work together, which of the following points would NOT be on their joint PPF?
 - a. 6 made beds and 18 washed dishes
 - b. 6 made beds and 0 washed dishes
 - c. 0 made beds and 18 washed dishes
 - d. 4 made beds and 8 washed dishes

5. The slope of an economy-wide production possibility frontier
 - a. Is always negative
 - b. Is always linear
 - c. Reflects the marginal cost of producing the good measured on the y axis
 - d. All of the above

6. Suppose the supply of apartments in Lafayette increases. This increase in supply would be graphed as
 - a. A shift to the left of the supply curve
 - b. A shift to the right of the supply curve
 - c. A movement down and to the left along the supply curve
 - d. A movement up and to the right along the supply curve

7. How would an increase in the supply of apartments in Lafayette affect the equilibrium price and quantity of apartments?
 - a. The equilibrium price of apartments would increase and the equilibrium quantity of apartments would increase.
 - b. The equilibrium price of apartments would increase and the equilibrium quantity of apartments would decrease.
 - c. The equilibrium price of apartments would decrease and the equilibrium quantity of apartments would increase.
 - d. The equilibrium price of apartments would decrease and the equilibrium quantity of apartments would decrease.

8. Which of the following would increase the demand for Christmas trees?
 - a. A summer drought causes many Christmas trees to die
 - b. A decrease in the price of artificial trees (a substitute in consumption)
 - c. A decrease in the price of Christmas trees
 - d. A decrease in the price of Christmas tree lights (a complement in consumption)

9. If supply of Christmas trees falls at the same time that demand for Christmas trees increases, how will equilibrium in the market for Christmas trees be affected?
 - a. Price will rise, and quantity will fall.
 - b. Price will rise, but quantity will be indeterminate.
 - c. Price will be indeterminate, but quantity will rise.
 - d. Price will be indeterminate, but quantity will fall.

Use the following information to answer the next four questions. The demand and supply curves for a rare bottle of Wine are described by the following equations.

10. What is the marginal benefit of consuming the 10th bottle of wine?
 - a. \$98
 - b. \$92
 - c. \$100
 - d. \$90

11. The market equilibrium price is _____ and the equilibrium quantity is _____.
 - a. \$8 ; 92
 - b. \$92 ; 8
 - c. \$100 ; 10
 - d. \$10; 100

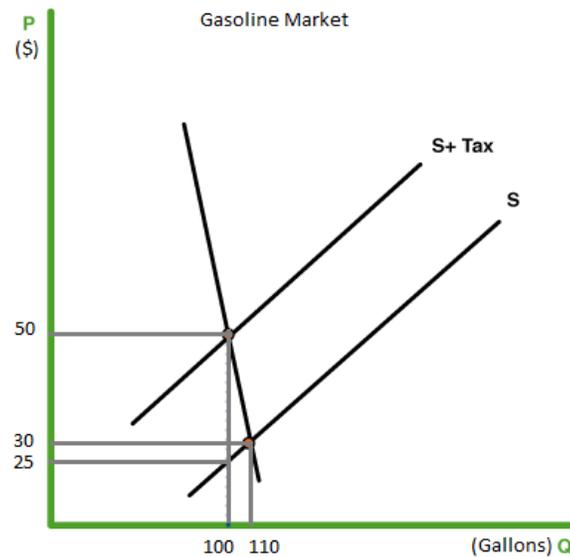
12. What is consumer surplus in the market for wine when the market reaches equilibrium?
 - a. \$32
 - b. \$64
 - c. \$120
 - d. \$736

13. In an effort to make wine more affordable to the public, the government imposes a price ceiling of \$88 in the market for wine. Which of the following is a result of that policy?
 - a. There is a shortage of 1 bottle of wine
 - b. There is a surplus of 5 bottles of wine
 - c. Deadweight loss is equal to \$2.50
 - d. The policy has no effect because the price ceiling is not set below the equilibrium price.

14. Pier 1 Imports was selling 50 picture frames a day at \$20 each. Recently, they changed the price to \$30 each, and they are now selling 40 picture frames per day. Based on this information, what is the price elasticity of demand?
 - a. $1.80 = 9/5$
 - b. $0.56 = 5/9$
 - c. $2.16 = 54/25$
 - d. 1

15. Consider the information in the question above. As a result of the decrease in price, Pier 1's revenues _____, indicating that demand for picture frames was _____.
 - a. Rose; elastic
 - b. Fell; elastic
 - c. Rose; inelastic
 - d. Fell; inelastic

The graph below represents the market for gasoline. An excise tax is imposed on sellers in the market for gasoline. Use this graph to answer the following three questions.



16. The excise tax (per-unit tax) placed on gasoline in this case is
 - a. \$30 per gallon
 - b. \$25 per gallon
 - c. \$20 per gallon
 - d. \$10 per gallon

17. What level of gasoline production would satisfy allocation efficiency?
 - a. 100
 - b. 110
 - c. Any level of output greater than 100
 - d. Any level of output greater than 110

18. Based on the graph of the gasoline market above, _____ bear more of the burden of the tax on gasoline, indicating that supply is _____ elastic than demand.
 - a. Consumers; more
 - b. Suppliers; more
 - c. Consumers; less
 - d. Both b and c

19. John is going out shopping for Christmas decorations. His marginal utility from purchasing a wreath is 100, his marginal utility from purchasing a Christmas tree is 200 and his marginal utility from purchasing a snowman is 75. The price of a wreath is \$20; the price of a Christmas tree is \$50 and the price of a snowman is \$25. To maximize his utility, what should John buy first and why?
- John should buy the wreath because it has the highest marginal utility per dollar.
 - John should buy the wreath because it has the highest marginal utility.
 - John should buy the wreath because it has the lowest price.
 - John should buy the snowman because its marginal utility per dollar is closest to 1

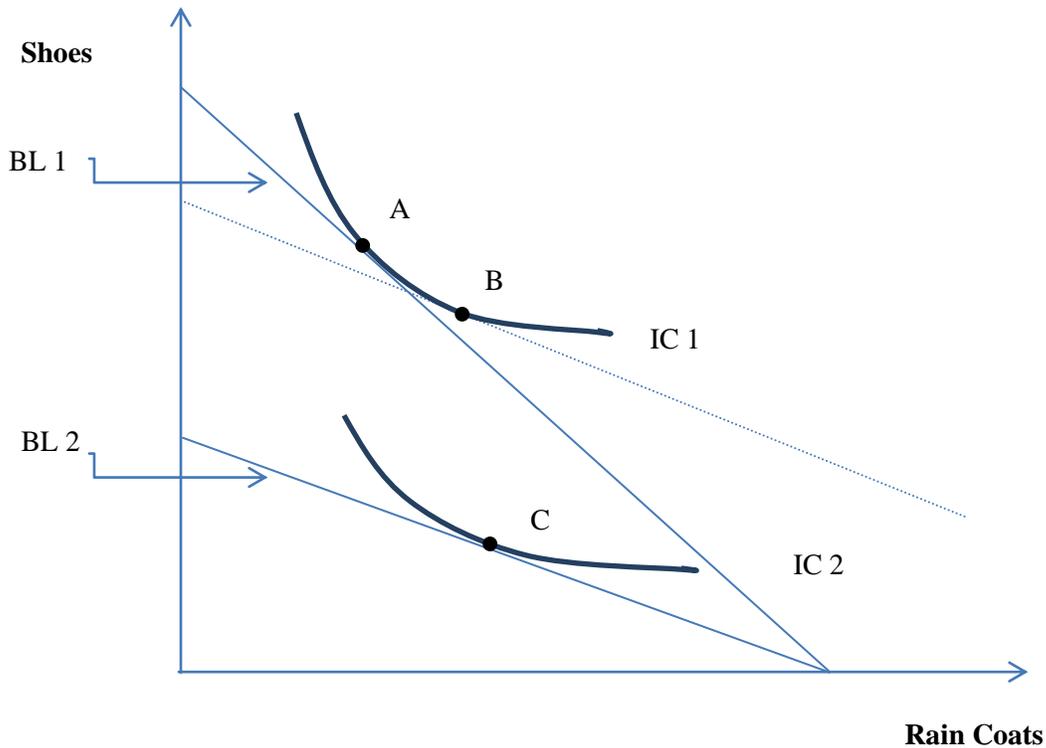
Quantity in gallons	Total Utility of Cranberry Juice	Total Utility of Apple Cider
1	80	80
2	150	125
3	210	149
4	260	169
5	270	179
6	275	185

A consumer has a choice between two types of beverages, cranberry juice and apple cider. The table above shows the total utility derived from consumption of each. The price of cranberry juice is \$3 per gallon, and the price of apple cider is \$4 per gallon. The consumer has \$24 of income. Given this information answer the following 3 questions:

20. What is the marginal utility of the 5th gallon of apple cider?
- 5
 - 7
 - 9
 - 10
21. What is the slope of indifference curve at the utility maximizing point if the quantity of apple cider is measured on the X axis.
- 3/4
 - 4/3
 - 2/3
 - 1
22. What combination of cranberry juice and apple cider will maximize utility given the limited budget?

- a. 2 gallons of cranberry juice; 3 gallons of apple cider
- b. 4 gallons of cranberry juice; 3 gallons of apple cider
- c. 0 gallons of cranberry juice; 6 gallons of apple cider
- d. 5 gallons of cranberry juice; 2 gallons of apple cider

Use the following information to answer the next three questions. Marissa's preferences for Raincoats and Shoes are given below. Marissa's original budget is given by BL1, whereas her new budget is given by BL2.



23. What could have caused Marissa's budget to rotate from BL1 to BL2?

- a. The price of Rain Coats has increased, while Marissa's income and the price of Shoes remain unchanged.
- b. The price of Shoes has increased, while Marissa's income and the price of Rain coats remain unchanged
- c. Marissa's income has fallen. However, prices of both Rain coats and Shoes remain unchanged.
- d. The price of Shoes and the price of Rain coats have both increased; whereas, Marissa's income remains the same.

24. As a result of the change above, Marissa's utility-maximizing consumption point changes from point _____ to point _____.
- A; C
 - A; B
 - C; B
 - C; A
25. Based on Marissa's indifference curve and budget line graph above, which of the following is true?
- Shoes and rain coats are complements in consumption
 - The demand curve for shoes is upward sloping
 - Shoes are normal goods
 - None of the above
26. A firm in a perfectly competitive industry
- Maximizes profit where price equals marginal cost
 - Will shut down in the short run whenever profit is negative
 - Faces a demand curve that is inelastic at all levels of output
 - All of the above

Consider the table of costs below for a firm operating in a perfectly competitive market. Use this table for the following four questions.

Quantity (q)	AVC	AFC	ATC	TC	MC
5	\$140.00		\$310.00	\$1,550.00	---
10			\$220.00		
15			\$200.00		
20	\$152.50		\$195.00	\$3,900.00	
25	\$166.00		\$200.00	\$5,000.00	
30	\$200.00			\$7,000.00	

27. Fixed costs for this firm are equal to _____, indicating this firm is operating in the _____.
- \$0; long run
 - \$170; short run
 - \$850; short run
 - \$1,550.00; short run

28. The marginal cost of producing the 25th unit of output is equal to _____, and the average total cost of producing 30 units of output is equal to _____.
- \$200; \$200
 - \$220; \$200
 - \$200; \$233.33
 - \$220; \$233.33
29. If the market price in the market above is \$175, the firm will maximize profit by producing _____ units of output and will earn profit of _____.
- 10; *negative* \$450
 - 15; *negative* \$375
 - 20; *negative* \$400
 - 0; *negative* \$310
30. Given the profit the firm above will earn, in the long run, we expect profit to
- Rise to \$0 as firms enter the industry.
 - Fall to \$0 as firms exit the industry.
 - Rise to \$0 as firms exit the industry.
 - Fall to \$0 as firms enter the industry.
31. In comparing a perfectly competitive industry with monopoly, a monopoly produces a _____ level of output and charges a _____ price.
- Higher ; higher
 - Lower; lower
 - Lower; higher
 - Higher ; lower

A monopolist faces a demand curve represented by equation $P = -2Q^d + 50$. . The marginal cost for this monopolist is $MC = 2Q^s$. Answer the following four questions based on those equations.

32. What is the marginal revenue from the 9th unit?
- \$14
 - \$32
 - \$18
 - \$50
33. The profit maximizing level of output the monopolist above will produce is _____, and the price charged will be _____.
- 8.33; \$8.33
 - 8.33; \$33.33
 - 16.66; \$8.33
 - 33.33; \$10

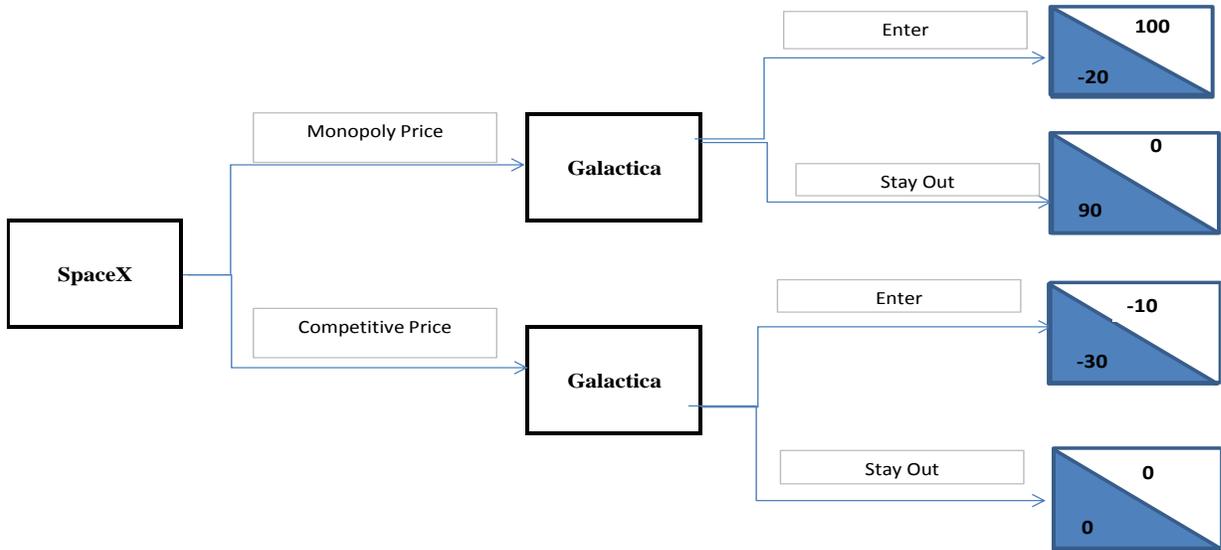
34. What level of output would satisfy allocative efficiency in the market where this monopoly is operating?
- 50
 - 25
 - 15
 - 12.5
35. Suppose this is a perfectly price discriminating monopolist. Given this information, the deadweight loss associated with monopoly is equal to which of the following?
- \$0
 - \$70
 - \$25
 - \$139
36. A natural monopoly exists when the monopoly
- Faces a demand curve that is perfectly inelastic
 - Experiences significant economies of scale
 - Produces the efficient level of output
 - Exists because there are legal barriers to entry
37. A monopolistically competitive industry is similar to a perfectly competitive industry because
- Firms in both types of industries face perfectly elastic demand curves
 - There are significant barriers to entry in both industries
 - Products in both kinds of industries are slightly differentiated
 - Economic profit is zero in the long run
38. If a monopolistically competitive firm is currently producing where price equals marginal cost and is earning a profit of \$5,000 at that level of output, what should the firm do to maximize profit?
- The firm is already maximizing profit, so it should not change its level of output.
 - The firm should reduce the price it is charging for output.
 - The firm should increase the level of output it is producing.
 - The firm should decrease the level of output it is producing.

Use the following payoff matrix to answer the next two questions. Kellogg's and Nabisco face a market in which two new variations of cereal can be successfully produced and introduced, but each firm has the resources to produce only one type of variation. Consider the following payoff matrix

		Nabisco	
		Crispy	Sweet
Kellogg's	Crispy	\$10 / \$10	\$1000 / \$1000
	Sweet	\$1000 / \$1000	\$20 / \$20

39. What is Nabisco's dominant strategy?
- Producing Crispy Cereal
 - Producing Sweet Cereal
 - Both producing Crispy Cereal and Producing Sweet Cereal are Dominant Strategies
 - Nabisco does not have a dominant strategy.
40. What is the Nash Equilibrium of the game between Kellogg's and Nabisco above?
- Both produce sweet cereal
 - Both produce crispy cereal
 - There are two Nash equilibria: one where Kellogg's produces crispy cereal and Nabisco produces sweet cereal, and one where Kellogg's produces sweet cereal and Nabisco produces crispy cereal.
 - Neither produces Crispy nor Sweet cereal.

Use the following figure to answer the next two questions. SpaceX is currently a monopolist in the production of rockets. However, it is facing threat from Galactica, which is a company that is currently considering entering the rocket industry. The following figure lays out the sequential entry game that these firms would face. Note that entry in bottom half triangle (also shaded) correspond to SpaceX's payoffs and the entry in the upper half triangle (not shaded) corresponds to Galactica's payoffs.



41. The equilibrium strategies are for SpaceX to charge the _____ and Galactica to _____.
- Competitive Price; Enter
 - Monopoly Price ; Enter
 - Competitive Price; Stay Out
 - Monopoly Price; Stay Out
42. SpaceX is following a _____ strategy if it charges a price that is higher than the competitive price but still deters Galactica's entry into the rocket industry.
- Marginal cost pricing
 - Average cost pricing
 - Limit pricing
 - Two Part Tariff Pricing
43. A local manufacturing plant is polluting the river during the production process. The manufacturing plant is creating a
- Negative consumption externality
 - A positive consumption externality
 - A negative production externality
 - A positive production externality

44. If a local manufacturing plant is polluting the river during the production process, which of the following could you suggest as a possible solution?
- Assignment of property rights
 - A Pigovian tax on the producer
 - Create a market for pollution permits
 - All of the above
45. When a positive consumption externality exists,
- The marginal social benefit exceeds the marginal private benefit
 - The marginal social cost exceeds the marginal private cost
 - The marginal private cost exceeds the marginal social cost
 - The marginal private benefit exceeds the marginal social benefit

Assume parks are a public good. The table below shows the private marginal benefit of parks for all 3 people living in Golf World.

Quantity	Rory's MB	Tiger's MB	Phil's MB
1	200	350	100
2	150	275	80
3	100	200	60
4	50	125	40
5	0	50	20

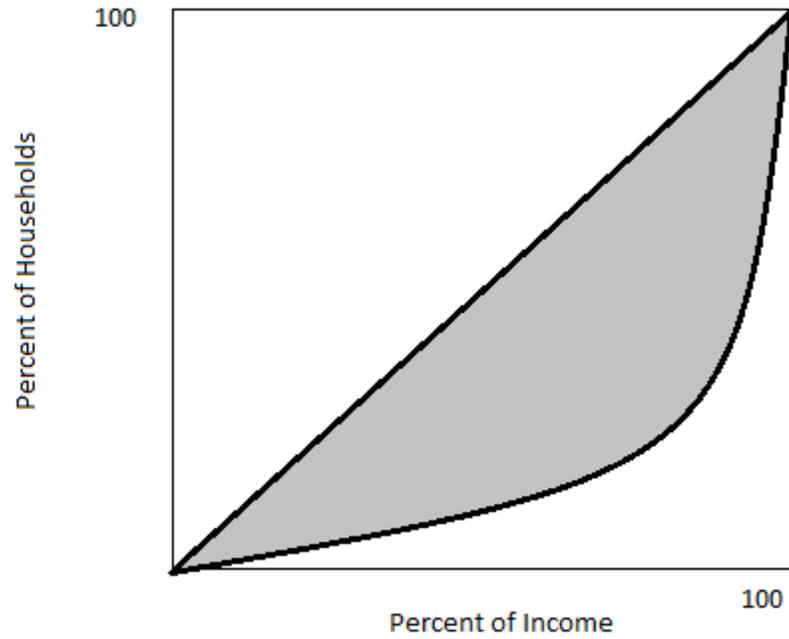
46. If the marginal cost of a park is \$200, what is the efficient quantity of parks in Golf World?
- 1
 - 2
 - 3
 - 4
47. A common resource is both
- Nonrival and nonexcludable
 - Rival and excludable
 - Rival and nonexcludable
 - Nonrival and excludable

Consider the 10 person economy Modernville. The table below provides the income for each person in Modernville. Use the information in the table to answer the following 2 questions.

Person	Income
Jay	145,000
Gloria	30,000
Manny	10,000
Phil	80,000
Claire	15,000
Mitch	120,000
Cam	20,000
Haley	5,000
Alex	35,000
Luke	40,000

48. Based on these numbers, who will be in the top quintile of household income?
- a. Alex and Luke
 - b. Jay and Mitch
 - c. Phil and Claire
 - d. Cam and Claire
49. Which of the following points would be on the Lorenz curve for the Modernville economy?
- a. (20, 5)
 - b. (40,10)
 - c. (60,30)
 - d. (80,70)

50. The figure below shows the Lorenz curve for an economy. If the area that is shaded gray is equal to 0.3, what is the Gini coefficient for this economy?



- a. 0.3
- b. 0.5
- c. 0.6
- d. 1.67