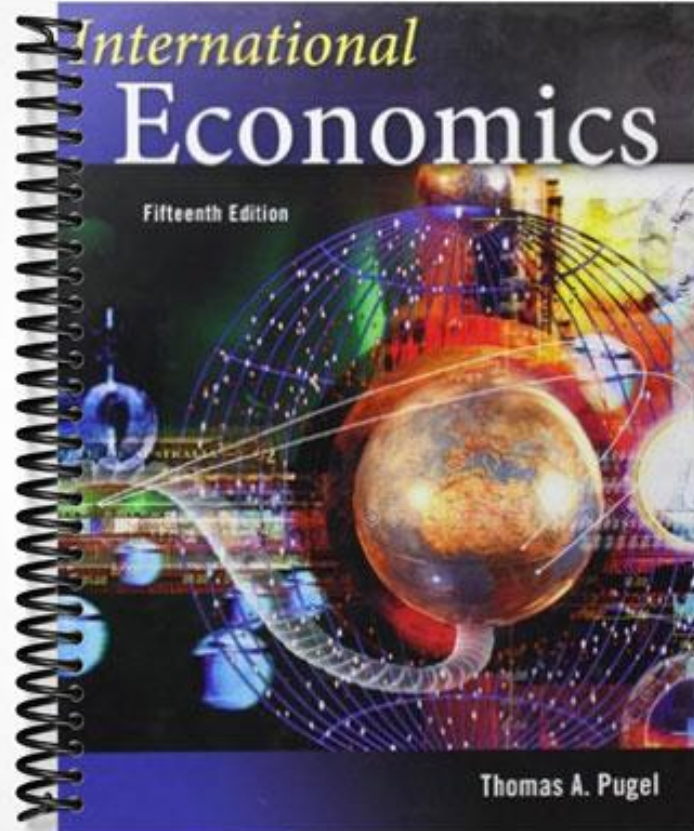


TEST BANK



Chapter 2: The Basic Theory Using Demand and Supply

Multiple Choice Questions

1. If an individual consumes more of good X when his/her income doubles, we can infer that
 - a. the individual is highly sensitive to changes in the price of good X.
 - b. good X is a normal good.
 - c. good X is an inferior good.
 - d. the demand for good X is perfectly inelastic.

ANSWER: B

DIFFICULTY LEVEL: 2

2. Which of the following factors can lead to an increase in demand for coffee at Starbucks?
 - a. An increase in household income
 - b. An increase in the price of sugar
 - c. An increase in the price of coffee beans
 - d. A 10 percent decline in local population

ANSWER: A

DIFFICULTY LEVEL: 1

3. If the price of a normal good is measured along the vertical axis and its quantity along the horizontal axis, an increase in the price of the good will lead to:
 - a. a downward movement along the demand curve.
 - b. an upward movement along the demand curve.
 - c. a rightward shift of the demand curve.
 - d. a leftward shift of the demand curve.

ANSWER: B

DIFFICULTY LEVEL: 1

4. Everything else remaining unchanged, when the price of a normal good increases, consumers:
 - a. purchase more of the good.
 - b. purchase less of the good.
 - c. purchase the same amount of the good.
 - d. do not purchase any amount of the good.

ANSWER: B

DIFFICULTY LEVEL: 1

5. Suppose good X is a substitute of good Y. Everything else remaining unchanged, an increase in price of good Y will lead to:
 - a. an increase in demand for good Y.
 - b. a decrease in demand for good X.
 - c. an increase in demand for good X.
 - d. a decrease in price of good X.

ANSWER: C

DIFFICULTY LEVEL: 2

6. Which of the following events would lead to a decrease in demand for air travel?
- A decrease in the number of people who are afraid to fly
 - A decrease in oil prices
 - A decrease in rail fares
 - An increase in income levels

ANSWER: C

DIFFICULTY LEVEL: 1

7. Harry used work in a launderette and earned \$30 a day. After work, he normally had a chicken burger worth \$5 at McDonalds. However, his pay was lowered to \$20 some days later. Then after work he used to have a vegetable burger worth \$3. Here the vegetable burger is an example of a(n):
- inferior good.
 - normal good.
 - complement good.
 - luxury good.

ANSWER: A

DIFFICULTY LEVEL: 3

8. The value of price elasticity of demand for a normal commodity is negative because it indicates:
- the inverse relationship between the price and the quantity demanded for the commodity.
 - that the value of the consumer surplus is negative for a normal good.
 - that the changes in quantity demanded are much less compared to the changes in price for a normal good.
 - the direct relationship between price and consumer surplus from the commodity.

ANSWER: C

DIFFICULTY LEVEL: 1

9. Which of the following will cause a rightward shift of the market supply curve?
- An increase in the product price
 - A decrease in input prices
 - Change in consumers' tastes
 - An increase in national income

ANSWER: B

DIFFICULTY LEVEL: 2

10. Which of the following is a "unit-free" measure?
- Consumer surplus when the demand curve is horizontal
 - Producer surplus when the supply curve is vertical
 - Market supply
 - Price elasticity of demand

ANSWER: D

DIFFICULTY LEVEL: 1

11. If a 1% increase in the price of DVD players leads to a 3% reduction in its sales, we can conclude that:
- the supply of DVD players is perfectly inelastic.
 - DVD players are inferior goods.
 - the demand for DVD players is relatively elastic.
 - the demand for DVD's is relatively inelastic.

ANSWER: C

DIFFICULTY LEVEL: 2

12. Suppose the price of a good is measured along the vertical axis and its quantity demanded is measured along the horizontal axis. A steep sloped demand curve would indicate that the price elasticity of demand for the commodity:
- equals unity.
 - is greater than one.
 - equals zero.
 - is less than unity.

ANSWER: D

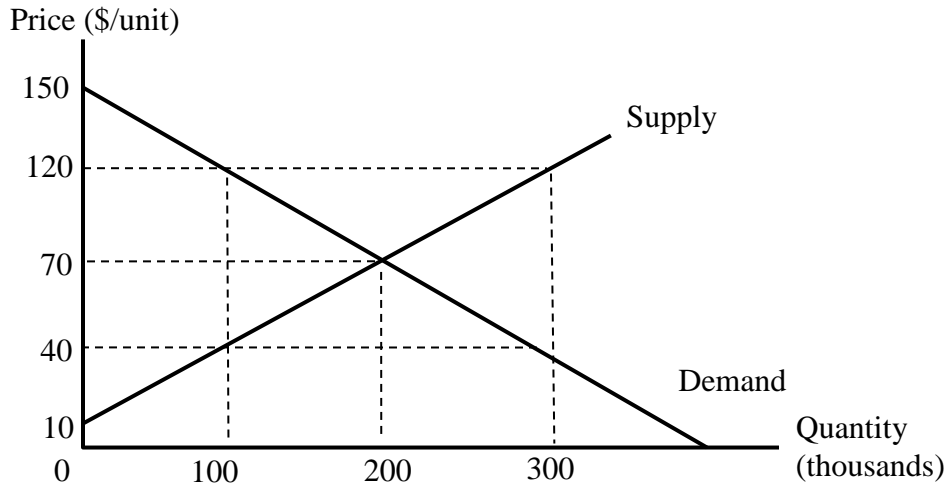
DIFFICULTY LEVEL: 2

13. Which of the following is true of consumer surplus?
- It is graphically represented as the area under the equilibrium price and above the supply curve of a good.
 - It is the net gain in economic well-being associated with producing and selling the equilibrium quantity of a good.
 - It is used to measure the impact of a change in price on the economic well-being of the producers.
 - It is the difference between the value that one places on a good and the price paid for the good.

ANSWER: D

DIFFICULTY LEVEL: 1

Figure 2.1



The figure given above shows the demand and supply curves of a commodity.

14. Refer to Figure 2.1. At a price of \$70, the consumer surplus equals:
- \$6,000,000.
 - \$8,000,000.
 - \$5,000,000.
 - \$10,000,000.

ANSWER: B

DIFFICULTY LEVEL: 3

15. Refer to Figure 2.1. At a price of \$70, the producer surplus equals:
- \$6,000,000.
 - \$8,000,000.
 - \$15,000,000.
 - \$30,000,000.

ANSWER: A

DIFFICULTY LEVEL: 3

16. To maximize profit a perfectly competitive firm supplies a good up to the point at which:
- the marginal revenue is higher than the marginal cost.
 - the marginal cost of producing the good is zero.
 - the price of the good equals marginal cost.
 - the average revenue equals average cost.

ANSWER: C

DIFFICULTY LEVEL: 1

17. Which of the following groups is most likely to be benefitted when a country engages in free trade?
- All the domestic producers of the country
 - The manufacturers of exportable goods
 - The producers in the import-competing industries
 - The workers employed in the import-competing industries

ANSWER: B

DIFFICULTY LEVEL: 1

18. Which of the following is an example of arbitrage?
- A firm sells a box of cereal at \$10 when the average cost of producing it is \$6.
 - Thomas buys a new stock issued by a firm on the stock exchange.
 - A local salon charges 5 percent more for all its services than a competing salon in the same locality.
 - Romi buys a DVD from Wal-Mart at \$10 and sells it on eBay for \$20.

ANSWER: B

DIFFICULTY LEVEL: 1

19. An increase in the imports of clothing into the United States from India will benefit the _____ and hurt the _____.
- U.S. clothing producers; Indian clothing producers
 - Indian consumers; Indian clothing producers
 - the U.S. consumers; Indian clothing producers
 - the U.S. consumers; the U.S. clothing producers

ANSWER: D

DIFFICULTY LEVEL: 2

20. Suppose country A and country B are the only two countries in the world. Country A imports good X from country B and exports good Y. In the absence of any transportation cost, at the world price of good X:
- country B's export supply curve is perfectly inelastic.
 - both country A's import demand curve and country B's export supply curve are positively sloped.
 - country A's import demand curve will be perfectly inelastic.
 - country A's import demand curve will intersect country B's export supply curve.

ANSWER: D

DIFFICULTY LEVEL: 1

Scenario 2.1

Suppose the domestic supply (Q^S) and demand (Q^D) for skateboards in the United States are given by the following set of equations:

$$Q^S = -60 + 3P$$

$$Q^D = 390 - 2P$$

21. Refer to Scenario 2.1. In the absence of international trade in skateboards, what will be the equilibrium price of skateboards in the United States?

- a. \$66
- b. \$90
- c. \$45
- d. \$150

ANSWER: B

DIFFICULTY LEVEL: 3

22. Refer to Scenario 2.1. In the absence of international trade in skateboards how many skateboards will be sold in the United States?

- a. 138
- b. 258
- c. 210
- d. 930

ANSWER: C

DIFFICULTY LEVEL: 3

23. Refer to Scenario 2.1. If the United States can imports skateboards from the rest of the world at a per unit price of \$75, how many skateboards will be produced in the United States?

- a. 165
- b. 240
- c. 285
- d. 215

ANSWER: A

DIFFICULTY LEVEL: 3

24. Refer to Scenario 2.1. If the United States can import skateboards from the rest of the world at a per unit price of \$75, what will be the total demand for skateboards in the United States?

- a. 165
- b. 240
- c. 285
- d. 245

ANSWER: B

DIFFICULTY LEVEL: 3

25. Refer to Scenario 2.1. If the U.S. engages in free trade and the international price of skateboards is \$75, it would import _____ skateboards from the rest of the world.
- a. 65
 - b. 85
 - c. 75
 - d. 95

ANSWER: C

DIFFICULTY LEVEL: 3

26. Refer to Scenario 2.1. In the absence of trade with the rest of the world, the consumer surplus in the United States skateboard market equals _____ and the producer surplus equals_____.
- a. \$7,050; \$11,525
 - b. \$31,500; \$9,450
 - c. \$20,474; \$7,350
 - d. \$11,025; \$7,350

ANSWER: D

DIFFICULTY LEVEL: 3

27. Refer to Scenario 2.1. Calculate the change in consumer surplus when the United States engages in free trade and imports skateboards from the rest of the world at a per unit price of \$75.
- a. +\$2,850
 - b. -\$2,850
 - c. -\$6,300
 - d. +\$3,375

ANSWER: D

DIFFICULTY LEVEL: 3

28. Refer to Scenario 2.1. Calculate the change in producer surplus when the United States engages in free trade and imports skateboards from the rest of the world at a per unit price of \$75.
- a. +\$2,812.50.
 - b. -\$2,812.50.
 - c. +\$3,375.
 - d. -\$3,375.

ANSWER: B

DIFFICULTY LEVEL: 3

Scenario 2.2

Suppose the domestic supply (Q^S) and demand (Q^D) for MP3 players in the United States are given by the following set of equations:

$$Q^S = -25 + 10P$$

$$Q^D = 875 - 5P$$

29. Refer to Scenario 2.2. In the absence of international trade in MP3 players, what will be the price of MP3 players in the United States?

- a. \$60
- b. \$65
- c. \$90
- d. \$70

ANSWER: A

DIFFICULTY LEVEL: 2

30. Refer to Scenario 2.2. In the absence of international trade in MP3 players, how many MP3 players will be sold in the United States?

- a. 825
- b. 575
- c. 608
- d. 925

ANSWER: B

DIFFICULTY LEVEL: 2

31. Refer to Scenario 2.2. If the United States can import MP3 players from the rest of the world at a per unit price of \$50, how many MP3 players will be produced in the United States?

- a. 625
- b. 475
- c. 925
- d. 525

ANSWER: B

DIFFICULTY LEVEL: 3

32. Refer to Scenario 2.2. If the United States can import MP3 players from the rest of the world at a per unit price of \$50, what will be the total demand for MP3 players in the United States?

- a. 625
- b. 475
- c. 925
- d. 550

ANSWER: A

DIFFICULTY LEVEL: 3

33. Refer to Scenario 2.2. If the U.S. engages in free trade and the international price of MP3 players is \$50, it would import _____ MP3 players from the rest of the world.
- 150
 - 250
 - 475
 - 225

ANSWER: A

DIFFICULTY LEVEL: 3

34. Refer to Scenario 2.2. In the absence of trade with the rest of the world, the consumer surplus in the United States' MP3 player market is _____.
- \$22,562.50
 - \$30,062.50
 - \$33,062.50
 - \$19,500.00

ANSWER: C

DIFFICULTY LEVEL: 2

35. Refer to Scenario 2.2. The consumer surplus will _____ by _____ when the United States engages in international trade and the an international price for MP3 players settles at \$50.
- increase; \$2,625
 - increase; \$6,000
 - decrease; \$7,150
 - decrease; \$13,500

ANSWER: B

DIFFICULTY LEVEL: 3

Scenario 2.3

Suppose the domestic supply ($Q^S_{U.S.}$) and demand ($Q^D_{U.S.}$) for bicycles in the United States are given by the following set of equations:

$$Q^S_{U.S.} = 2P$$

$$Q^D_{U.S.} = 200 - 2P.$$

Demand (Q^D) and supply (Q^S) in the Rest of the World are given by the equations:

$$Q^S = P$$

$$Q^D = 160 - P.$$

Quantities are measured in thousands and price in U.S. dollars.

36. Refer to Scenario 2.3. In the absence of international trade, _____ thousand bicycles will be sold in the United States at a per unit price of _____.
- 50; \$50
 - 100; \$100
 - 150; \$50
 - 100; \$50

ANSWER: D

DIFFICULTY LEVEL: 2

37. Refer to Scenario 2.3. In the absence of international trade, _____ thousand bicycles will be sold in the Rest of the World at a per unit price of _____.
- a. 80; \$80
 - b. 100; \$100
 - c. 50; \$100
 - d. 100; \$50

ANSWER: A

DIFFICULTY LEVEL: 2

38. Refer to Scenario 2.3. After the opening of free trade with the Rest of the World, if the world price of the bicycles settles at \$60, the U.S. will:
- a. export 40,000 bicycles.
 - b. export 60,000 bicycles.
 - c. import 60,000 bicycles.
 - d. import 40,000 bicycles.

ANSWER: A

DIFFICULTY LEVEL: 2

39. Refer to Scenario 2.3. After the opening of free trade with the United States, if the world price of the bicycles settles at \$60, the Rest of the World will:
- a. export 40,000 bicycles.
 - b. export 60,000 bicycles.
 - c. import 60,000 bicycles.
 - d. import 40,000 bicycles.

ANSWER: D

DIFFICULTY LEVEL: 2

40. Refer to Scenario 2.3. After the opening of free trade between the U.S. and the Rest of the World:
- a. neither the U.S. nor the Rest of the World gain from trade.
 - b. both countries gain from trade, but the U.S. gains more than the Rest of the World.
 - c. both countries gain from trade, but the Rest of the World gains more than the U.S.
 - d. the net change in total surplus in the U.S. is zero but the Rest of the World gains.

ANSWER: C

DIFFICULTY LEVEL: 3

True/False Questions

41. An increase in demand for a good will lead to a larger increase in price if the supply is relatively elastic.

ANSWER: FALSE

DIFFICULTY LEVEL: 3

42. A decrease in income will lead to an increase in the demand for an inferior good.

ANSWER: TRUE

DIFFICULTY LEVEL: 1

43. An increase in individual income will lead to an inward shift of the demand curve for a commodity.

ANSWER: FALSE

DIFFICULTY LEVEL: 2

44. If a 1% increase in an individual's income leads to a 0.5% increase in the demand for a good, the good is considered to be a normal good.

ANSWER: TRUE

DIFFICULTY LEVEL: 1

45. Consumer surplus is the net economic benefit to consumers who are able to buy a good at a price lower than the highest price that they are willing to pay.

ANSWER: TRUE

DIFFICULTY LEVEL: 1

46. The net economic gains from free trade are usually negative.

ANSWER: FALSE

DIFFICULTY LEVEL: 1

47. The elasticity of demand measures the responsiveness of consumers to changes in the price of a product.

ANSWER: TRUE

DIFFICULTY LEVEL: 1

48. The net national gain from trade can be measured by the change in consumer and producer surplus that results from trade.

ANSWER: TRUE

DIFFICULTY LEVEL: 1

49. The free-trade price of a good in an importing country is expected to be lower than the pre-trade price of the good in that country.

ANSWER: TRUE

DIFFICULTY LEVEL: 1

50. When free trade begins, producers in the importing nation gain while producers in the exporting nation are left worse off.

ANSWER: FALSE

DIFFICULTY LEVEL: 1

51. Free trade is a zero-sum activity because a country always gains at the expense of its trading partner.

ANSWER: FALSE

DIFFICULTY LEVEL: 1

52. The gains from trade are divided in proportion to the price changes that trade brings to the trading countries.

ANSWER: TRUE

DIFFICULTY LEVEL: 1

53. If the world price is higher than the no-trade domestic price, then domestic producers gain and domestic consumers lose as a result of free trade.

ANSWER: TRUE

DIFFICULTY LEVEL: 2

54. While international trade will benefit both the importing and exporting country in a two-country world, the gains from trade in the exporting country must be greater than the gains from trade in the importing country.

ANSWER: FALSE

DIFFICULTY LEVEL: 2

55. After a country engages in free trade, the change in consumer surplus is usually negative if the country imports goods from abroad.

ANSWER: FALSE

DIFFICULTY LEVEL: 2

Essay Questions

56. What is the measure of responsiveness of quantity demanded of a commodity to a change in its price? Why is it a negative number for a normal good? With the help of suitable diagrams, explain the difference between elastic and inelastic demand.

POSSIBLE RESPONSE: The price elasticity of demand is the measure of responsiveness of quantity demanded of a commodity to a change in its price. The price elasticity of demand measures the percentage change in quantity demanded of a good resulting from a 1 percent change in its price. It is a unit-free measure. Since an increase in price of a normal good results in a decrease in its quantity demanded and vice versa, the price elasticity of demand is a negative number.

The difference between elastic and inelastic demand can be explained with the help of the following two figures.

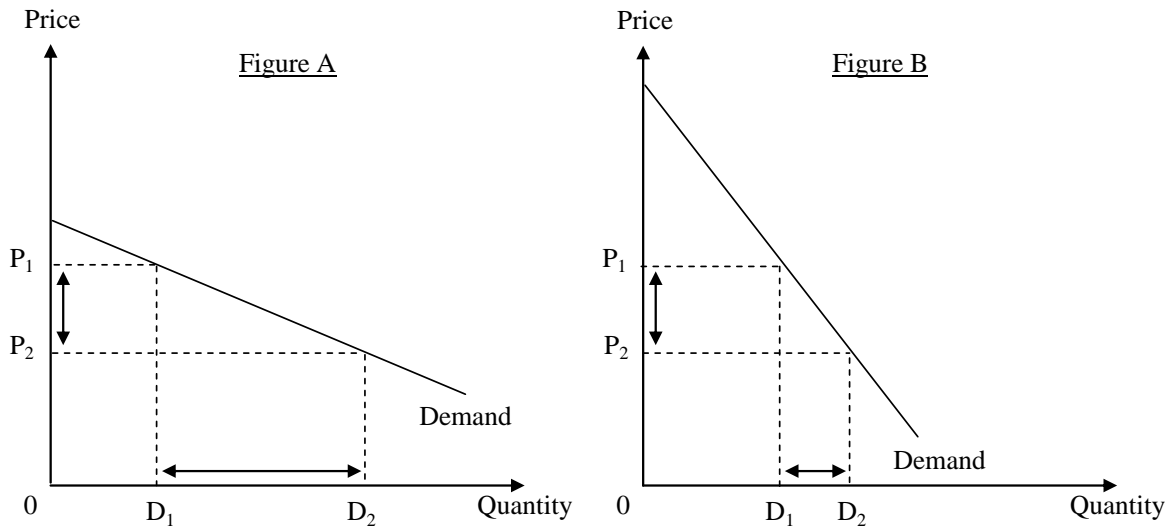


Figure A shows an “elastic” demand curve where the price elasticity for the good is greater than one. This implies that a unit change in the price of a good will result in a greater change in the quantity demanded. Figure A shows that a change in price from P_1 to P_2 has led to a much greater change in quantity demanded. From the figure it is evident that D_1D_2 is much greater than P_1P_2 . Figure B on the other hand shows an “inelastic” demand curve where the price elasticity of demand for the good is less than one. This implies that a unit change in the price of a good will cause a change in the quantity demanded by less than one unit. Figure B shows that a change in price from P_1 to P_2 has led to a lesser change in quantity demanded. From the figure it is evident that D_1D_2 is less than P_1P_2 . Therefore, an elastic demand curve is relatively flatter than an inelastic demand curve, when price and quantity demanded are measured along the vertical and the horizontal axes respectively.

DIFFICULTY LEVEL: 2

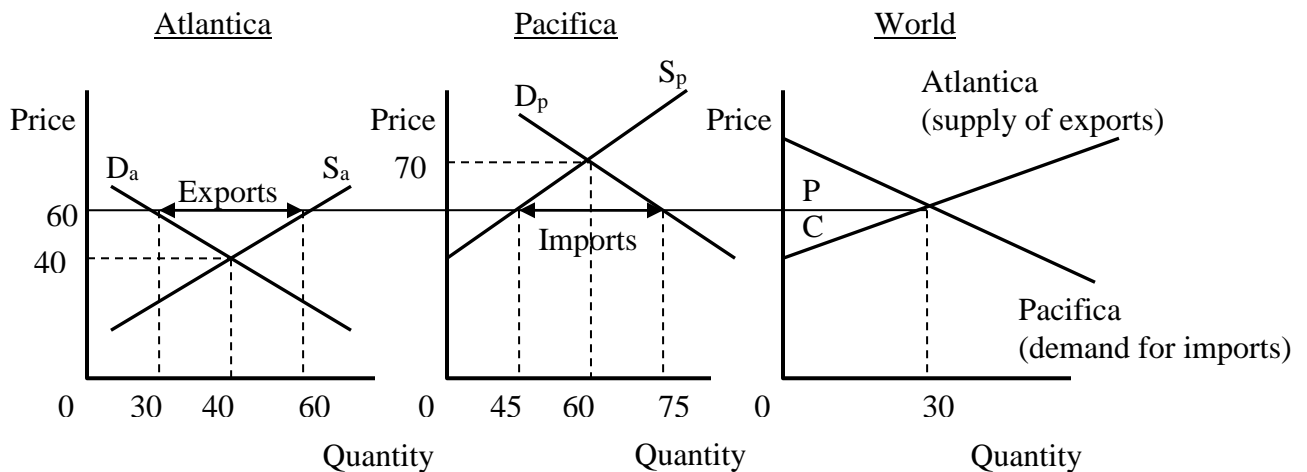
57. In a two-country world, the opening of free trade does not make everyone in the two countries better off. What assumption(s) must be made in order to make the claim that both countries do in fact benefit from the free trade?

POSSIBLE RESPONSE: It is true that free trade does not benefit everyone within a country. However, if we accept the one-dollar-one-vote metric, and measure the national well-being of a country, we will find that there are net national gains from trade. That means that the gainers are gaining more than the losers are losing. Among the gainers are the consumers in the importing country, who enjoy lower prices, and possibly a wider variety of the product, and the producers in the exporting country, who are expanding their production as they are receiving a higher price in the international market. Among the losers are the consumers of the export-oriented industry and the import-competing producers.

DIFFICULTY LEVEL: 1

58. Assume that there are only two countries in the world, Pacifica and Atlantica. Both countries produce and consume surfboards. The pre-trade price of surfboards in Atlantica is lower than the pre-trade price of surfboards in Pacifica. Draw a three-graph diagram to depict the Pacifica, Atlantica, and international markets for surfboards illustrating the pre-trade price difference. Now assume that free trade opens up between Pacifica and Atlantica. Depict a plausible world price in the graphs. Using what you have learned about consumer and producer surplus, describe what happens to consumers and producers in each country as a result of the move to free trade. What happens to overall economic welfare in the two countries? Be sure to label and refer to the graphs in your answer.

POSSIBLE RESPONSE:



The above graph illustrates a possible international price. The graph to the left represents demand and supply in Atlantica, the graph in the middle the market in Pacifica, and the graph to the right the World market. D_a and S_a are the demand and supply curves for Atlantica respectively. D_p and S_p are the demand and supply curves for Pacifica respectively. The international price of 60 is between the no-trade prices of 40 and 70. The international price is such a price that the excess supply in Atlantica matches the excess demand in Pacifica. As a result Atlantica exports 30 units to Pacifica at a price of 60. Both countries gain from international trade. Atlantica gains area C in the right graph, and Pacifica gains area P.

DIFFICULTY LEVEL: 2

59. Carefully explain why nations gain from engaging in international trade. Do nations gain equally from trade? If not, what determines which country gains more? (In your answer you can assume a two-country world.)

POSSIBLE RESPONSE: Assuming a two-country world, demand and supply differ in the two countries and so prices also differ if there is no international trade. With the opening of international trade arbitrage opportunities arise: opportunities to make profit by buying the good cheaper in one country and selling it in another. Due to these opportunities the prices in the two countries equalize. The gain from trade in the importing country arises because consumers in this country gain more than producers lose as a result of the reduced price. Conversely, the gain from

trade in the exporting country exists because producers gain more than local consumers lose. In general, nations do not gain equally from trade. The country which experiences a larger change in its price stands to gain more. The country with the less elastic (steeper) trade curve (import demand curve or export supply curve) gains more. More precisely, the national gain from trade is proportional to the change in the price that occurs due to the shift from no trade to free trade.

DIFFICULTY LEVEL: 2

60. Why would winter clothing be produced in countries whose residents have very little demand for such clothing?

POSSIBLE RESPONSE: A country might be interested in the production of winter clothing if this country can export this good in exchange for other goods that cannot be produced at a low cost domestically in this country. This might be due to the specificity of the technology in this country; this country might have an abundance of resources that make the production of winter clothing efficient (low cost), whereas this country might be unable to produce other goods at such a low cost.

DIFFICULTY LEVEL: 2

61. Country A produces shoes at a lower cost than the country B. As a result, most of the shoes purchased in the country B are made in country A. Explain how trading with country A results in a net gain for country B?

POSSIBLE RESPONSE: As a result of the free trade between country A and the country B, the price of shoes in the country B will be equal to the international price. So the prices of shoes in the country B will fall (compared to the situation of no trade). Consumers will gain due to the lower price and the increased purchases of shoes (consumers' total surplus is measured by the area below the demand curve for shoes and above the international price). Facing a lower price (the international price), the domestic producers of shoes in the country B will react by decreasing their production of shoes. Hence, there is loss of surplus to producers associated with the opening of trade. Some of the shoe producers might go out of business, which might create temporary unemployment in this industry which will last until the workers producing shoes find employment in another sector of the economy. In general, consumers gain more than producers lose, so trade results in a net gain for country B

DIFFICULTY LEVEL: 1

62. The difference in the prices of a good in two countries creates opportunities for arbitrage: traders buy the good at a low price in one country and sell it at a higher price in the other. When the difference in the prices vanishes, and the world price is established in both countries, there is no scope for trade anymore because no trader will be willing to buy the good in one country and sell it in another. Discuss the validity of this statement.

POSSIBLE RESPONSE: This is not a valid statement. Consider the countries A and B, and assume that without trade the price of the good is P_A in country A and P_B in country B, where $P_A < P_B$. With the opening of free trade, the arbitrage possibilities will eliminate the difference in the prices in the two countries. So, the world price, W , will establish itself between the two local prices: $P_A < W < P_B$. There will be a surplus at the price W in country A, and a shortage in country B. Country A will be exporting the good to country B. It is the ongoing trade that keeps the price the same in the two countries.

DIFFICULTY LEVEL: 3