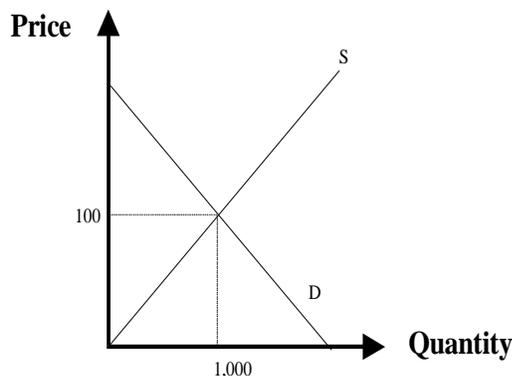


Econ_101_Spring 2007_IVY Tech College
Chapter 02: Solutions to Sample questions

2. The following table shows the quantities of corn supplied and demanded at different prices.

Price per Ton	Quantity Supplied	Quantity Demanded	Surplus (+) or Shortage (-)
\$ 80	600	1,200	shortage
\$ 90	800	1,100	shortage
\$100	1,000	1,000	neither
\$110	1,200	800	surplus

- a. Complete the table. **(bold entries above)**
 b. Draw the demand curve and the supply curve. **(see below)**
 c. What is the equilibrium price of corn? **\$100**



6. Suppose the government imposes a tax of \$1 per pound of fish and collects the tax from fish producers. Draw a supply-demand diagram to illustrate the effects of the tax.

Supply decreases; price rises and quantity falls.

8. Suppose that the initial price of a pocket phone is \$100 and the initial quantity demanded is 500 phones per day. Depict graphically the effects of a technological innovation that decreases the cost of producing pocket phones. Label the starting point with an \bar{i} and the new equilibrium with an \bar{n} .

The supply curve shifts to the right (increases), so the innovation decreases the equilibrium price from and increases the equilibrium quantity.

9. You've been hired as an economic consultant to evaluate the nation's airport security systems (metal detectors and machines that allow security people to see what's inside carry-on luggage). Suppose these security systems add \$5 to the typical airplane ticket and require 10 minutes of extra time for each passenger. List the questions you will answer in your evaluation.

There are many possible answers. Overall, the price of airline tickets has increased, due to the explicit cost of the machines and the implicit cost of passenger time. An increase in price will cause a decrease in the quantity demanded of airline tickets. There may also be effects on other markets; if consumers purchase fewer airline tickets, they may demand more train tickets, travel more by car, etc., and there may

be additional effects of these shifts in related markets. The economic consultant must also evaluate the level of optimal safety according to the marginal rule. In other words, does the marginal benefit of an increase in safety equal the marginal cost?

11. The Multifiber Agreement sets import quotas for various apparel products—including shirts—coming into the United States. Use a supply-demand graph to show the effects of the shirt quota on the equilibrium price of shirts in the United States.

A quota means that the supply of shirts will decrease. A decrease in supply will cause an increase in price of shirts and a decrease in quantity.