Collaborative Learning Problem Set 3

1. Explain why each of the following statements is false:
   a. An increase in price causes a decrease in demand.
   b. An increase in demand leads to an increase in supply.
   c. An increase in supply of oranges would cause an increase in demand for oranges.
   d. If beer and wine are substitutes, an increase in the price of beer will increase both the demand and supply of wine.
   e. An increase in the price of Pepsi would increase the quantity demanded of Coke but not the demand for Coke.
   f. An increase in income causes an increase in demand for all goods.

2. An article in the New York Times (Oct. 18, 1990) described a successful marketing campaign by the French champagne industry. The article noted that “many executives felt giddy about the stratospheric champagne prices. But they also feared that such sharp price increases would cause demand to decline, which would then cause prices to plunge.” What mistake did the executives make in their analysis of the situation? Illustrate your answer with a graph.

3. Use a well-labeled graph for each of the following cases. Show the effects of each change on the price and quantity exchanged in the market for soda pop. Be sure to state the shift variable and any other assumptions you make in doing your analysis.
   a. An increase in the price of sugar.
   b. A large increase in teenage population.
   c. A declaration by the Surgeon General that soda pop causes tooth decay, gum disease, and sexual dysfunction.
   d. A decrease in the price of bottled water.

4. Immediately after Iraqi forces invaded Kuwait in 1991, the spot price of oil on the world market rose dramatically. Since the price increased before there was any change in the physical availability of oil in the world, your roommate argues that this was an example of collusion among oil producers. Use supply and demand analysis, graph included, to explain this occurrence.

5. Use a graph to explain the effects of each of the following on price and quantity exchanged in the market for gasoline:
   a. A reduction in oil output.
   b. Increased environmental awareness leads more people to buy fuel efficient cars.
   c. A new oil site is discovered in the North Sea.
   d. Scientists develop a new solar powered car.
   e. A new and cheaper production process for gasoline is discovered.
6. Using a graph, explain the effects of each of the following on price and quantity exchanged in the market for economics textbooks:
   a. An increase in the price of paper.
   b. A decline in college enrollments.
   c. A study is released demonstrating the positive impact of success in E201 on lifetime earnings.

7. Read the article, The Case Against the Bailout,” at the CL3 Article link and answer the following questions:
   a. Kling says the housing market is “out of balance” (see his point 4). Use a graph of the housing market to show what he means. Label the problem.
   b. What is the market solution to the problem?
   c. What is the “bailout” solution to the problem? (Hint: think about the government entering the market for mortgage-backed securities with $700 billion to spend.)