ECO 401-002, 003
Problem Set \#7
Spring 2013
Due: Monday, April 15, 2013.

1. Why will a monopolist like Disney World never set its admission price at a level such that demand is price-inelastic? Sketch demand and total revenue curves such as those depicted in Figure 11.6 to explain your answer.
2. Levi's studies the demand for the re-release of its Original 501 button-fly jeans, and decides to set a price, $\$ 39.99$, that is twice as high as the marginal cost of supplying a pair of those jeans. What does Levi's think that own-price elasticity of demand for its 501 jeans is? (Hint: use the inverse elasticity rule.)
3. The (inverse) demand curve for a new drug is $\mathrm{P}=100-2 \mathrm{Q}$. The monopoly supplier that holds the patent for this drug has constant marginal and average costs of $\$ 20$ per dose.
a) What is the monopolist's profit-maximizing output and price? What are its profits? Illustrate in a diagram.
b) What is the deadweight loss relative to the outcome that would occur if the drug were competitively supplied? Illustrate in your diagram.
c) Can you think of a reason why society might want to grant a monopoly to someone who invents a new drug?
4. Suppose that as part of a new health-care plan the government levies a $\$ 5$ per dose on the monopolist above. What would happen to the monopolist's profit-maximizing price and output, and its profits? What would happen to the deadweight loss? Illustrate all of this in a new diagram.
