

Problem Set 4

1. Suppose the government announced that in 5 years marginal tax rates for everyone would go up.

- A. How would this change the tax prices people expected to face in 5 years?
- B. If giving in 5 years and giving now are substitutes, what would happen to giving now?
- C. What would happen to giving now if they are compliments?

2. Suppose that the demand for charitable giving can be expressed as follows:

$$g = m - m(1-t),$$

where g is giving, m is after-tax income, and $t > 0$ is the marginal tax rate.

- A. Is giving a normal good?
- B. What is the tax-price of giving? Does charitable giving obey the law of demand?
- C. Suppose after-tax income is \$5,000 and the tax rate is 20% (so t is 0.2). How much will this person give to charity?
- D. Using the values given in part C for m and t , figure out this individual's tax-price elasticity of demand.
- E. Again, consider the values given in part C. Suppose the government wanted to lower this person's taxes by \$500. Thus, after the government lowers tax payments after-tax income will be \$5,500. The government can lower taxes by \$500 two ways: send the person a refund check for \$500, or by lowering t . If the government decided to lower t so that taxes fell by \$500, what would the new t be? How would giving differ depending on whether the government sent a check or lowered t ?