Wilfrid W. Csaplar Jr., Ph.D.   Economics 280   Exam #1   2006/02/08

Write your name on the cover of the test booklet and nowhere else. Failure to follow these directions will cost you 1 point. The test has 100 points (to be scaled up to 170 points) and is scheduled to take 50 minutes. Therefore, expect to spend 1 minute for every 2 points. For example, a 14-point question should take 7 minutes. I cannot give extra time because of the class which follows yours.

1) (10 points) Answer EITHER Part A OR Part B.
A) If the total cost function is TC = $5Q^3 - Q^2 + 5Q + 80$, then calculate marginal costs and average total costs.
B) What is *Benchmarking*? Briefly explain a problem with doing it.

2) (10 points each) For TWO of the following elasticities, calculate it using the table to the right. Briefly explain how you chose the two data points you used and show all work. What does that information tell us about the product(s)?
A) Income elasticity using arc elasticity.
B) Own-price elasticity using point elasticity.
C) Cross-price elasticity using point elasticity.

Data point	Px	Py	Income	Qx
A	$2.00/x	$4.00/y	$10,000	10
B	$3.00/x	$5.00/y	$20,000	12
C	$2.00/x	$5.00/y	$10,000	8
D	$5.00/x	$5.00/y	$20,000	8
E	$2.00/x	$4.00/y	$20,000	14

3) (18 points) Answer EITHER Part A OR Part B.
A) President Buck Smith feels that the *snob effect* is relevant to the demand for a Bethany education. Assuming he is correct, what does this mean about the demand curve for a Bethany education? Explain your logic using a supply and demand diagram for a Bethany education.
B) What value would you expect the income elasticity of demand for a trip to Egypt is? Explain why you chose that value. What value would you expect the price elasticity of demand for a hamburger is? Explain why you chose that value. (You will be judged not on the numbers, but on whether your numbers agree with your logic and if your logic is correct.)

4) (20 points) Illustrate EITHER the event in Part A OR the event in Part B on the supply and demand for telephone books. Explain why the curve(s) moved as drawn and state the changes in quantity and price.
A) The price of economics textbooks increases.
B) There is an increase in the price of yellow dye for paper.

5) (32 points) Copy the table into your booklet and fill it in. <u>Show all work</u>.

Q	P	TR	MR	TC	ATC	MC
0	10			2		
2	8				6	
4			4	20		
		20		25		5