Review Sheet for Examination III

You will be asked to answer three questions. Here are the general topic areas.

1. Chapter 12 (Consumer Choice under Uncertainty). The question will require you to demonstrate an understanding of Arrow’s proof concerning insurance demand by risk averse consumers when the insurance contract is actuarially fair.

2. Chapter 14 (Consumer Surplus). You will have to use either equivalent or compensating variations and surpluses to analyze the welfare effects of a change in the price of a good (in a two-good world). You should be able to handle both normal and inferior goods. You should know the consequences of using the ordinary demand curve—rather than the compensated demand curve—to measure the above-mentioned welfare effects.

3. Chapter 15. (Market Demand). This will be a grab-bag question on market demand and price elasticity of demand. You should understand how elasticity is related to revenue and slope. You should be able to apply this for either linear or nonlinear demand functions.

4. Chapters 18, 19, 20 and 21. Theory of cost. You should understand the constrained cost minimization problem underlying the firm’s cost (i.e., minimize cost subject to a given iso-quant). You should understand how the shapes of the short run total and unit cost curves are related to the short run production function. You should be able to explain the geometric relationships that exist between the total and unit cost curves. You should be able to explain how the long run ATC and long run MC are derived from the short run unit cost curves. You should know the meaning of “returns to scale” and how this concept affects the shape of the long run ATC. I will write one question that does not require the use of calculus and one that has you use calculus (i.e., the method of Lagrange) to solve a problem involving cost either minimization or output maximization for a Cobb-Douglas production function.