Microeconomics, Module 9, "Welfare Economics and the Gains from Trade"

Micro module 9: Reading for eighth edition

(The attached PDF file has better formatting.)

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{The Landsburg textbook is excellent. We say to read certain sections and to skip others. This does not mean that certain sections are better; it means that the homework assignments and exam problems are based on the sections that you must read for this course. Some of the skipped sections are fascinating, but they are not tested.}

This module covers consumers' surplus and producers' surplus. Chapter 8 of Landsburg's text has other items as well, not all of which are not tested on the final exam. We specify what you must know in this posting.

Read the introduction on page 223. This introduction is excellent. One continually hears that a certain political policy is good or bad. That statement usually is incomplete: almost every policy is good for some people and bad for others. Landsburg shows how to analyze policies.

Read section 8.1 on pages 224-232. Know the difference between value and surplus; see the definitions of value on the side of page 224 and the definitions of consumers' surplus and producers' surplus on the side of pages 228 and top of page 230.

Landsburg calculates consumers' surplus and producers' surplus from discrete supply and demand *schedules*. The homework assignments and final exam problems also use linear supply and demand *curves*. The areas representing consumers' surplus and producers' surplus are right triangles, whose area is $\frac{1}{2} \times$ height \times width. The concepts and overview postings for Modules 11 and 12 show the procedure to calculate the surplus for various scenarios. Both the discrete schedules and the areas of triangles are shown in the practice problems, and the same procedures are used on the final exam.

On page 227, Landsburg shows the value as an area on a graph. He avoids calculus, so he works out the figures by summing schedules. This topic is simple for actuarial candidates: we integrate under a curve (actually, under a curve and above a straight line). Most final exam questions use linear demand curves and marginal cost curves and simple geometry to find the area of a right triangle. The final exam does not test your mathematical abilities, so it does not use more complex cost curves and demand curves.

Know the definitions of consumers' surplus (side of page 228) and producers' surplus (top of page 230) and the statements in the text:

• The *consumers' surplus* is the area under the demand curve down to the price paid and out to the quantity demanded (page 228).

• The *producers' surplus* is the area above the supply curve up to the price paid and out to the quantity supplied (page 229).

From Section 8.2 ("The efficiency criterion," starting on page 233), skip the first sub-section on pages 233-234. You will use the efficiency criterion, but you need not evaluate it. This is a course on economics, not on politics. This sub-section is excellent, but no final exam problems are asked on it. You learn much from these pages, and they are well worth reading, but they are not required for this course.

Read "consumers' surplus and the efficiency criterion," on pages 234-235 and "the effect of a sales tax" on pages 235-237. The concepts and overview posting shows the core diagram for this section. The final exam tests the effect of a sales tax or an excise tax on consumers' surplus and producers' surplus. You may skip the section on Hidden Assumptions on pages 237-238. It is worth reading to understand the efficiency criterion, but the hidden assumptions are not tested on the final exam.

Read the material on dead weight loss: pages 238-241, but skip the sub-section on "other normative criteria" on page 241. Understand the section on subsidies on pages 242-244. The final exam problems may test sales taxes, excise taxes, and subsidies. In each case, you must determine the change in consumers' surplus, producers' surplus, and the dead weight loss.

Price ceilings and tariffs on pages 244-250 are not tested on the final exam. Landsburg's discussion of robbery is interesting and worth reading, but it is not tested on the final exam.

Graphics for price subsidies and price ceilings are in the concepts and overview posting on the discussion forum, but the final exam does not test this material and there are no homework assignments from it. Price ceilings were used in the United States during the oil crisis of 1972, but even politicians now acknowledge that they harm the economy.

The material on tariffs is worth reading to understand the economic perspective on outsourcing and international trade, but it is not tested on the final exam. So much Congressional energy is wasted on blaming China for U.S. economic ills. Economists say: "If China wants to sell us goods below cost, why should we complain?" If someone offered to sell you running shoes for half the price they sell in stores, should you complain that this person is unfairly subsidizing the sale?

Read the section on the "diamond-water paradox" on pages 252-253; this is the only half page required from section 8.3. Skip the "labor theory of value" on pages 253-254; unless you are a Marxist economist, you don't need Landsburg to tell you this is wrong.

Skip section 8.4 on pages 254-265. This is all theoretical; Landsburg says that economists have proved the results, but they too complex to be reviewed here. This section says that capitalism works well; it might be the best economic system around. Western economists believe this, and we also agree.

Western thinkers have often wondered how we can know if we are prejudiced; after all, Marxist economists said that communism was the best economic system around. Max Weber conjectured that scientists and scholars in an open university are relatively free of prejudice. This sounds good, but most academicians have views that are at odds with those of simple economics. We believe in the invisible hand theory, but the final exam doesn't test this section.

Jacob: Communism has collapsed; are there still politicians and intellectuals who don't believe in free markets and the invisible hand theory?

Rachel: Look at the European Union. In the twenty years since Communism has collapsed, leaders of various European countries (France, Germany, Belgium) has built up a system that is the opposite of Landsburg's textbook. Even now, with the poverty of the European Union compared to the vitality of India, China, Singapore, and other Asian nations, the leaders of France and some other European countries continue to espouse its ideas. Even Britain has succumbed to the European social welfare ideal, and it is only now trying to rescue itself. Over the past two years, the U.S. has reversed its support of individualism and private business, and it is moving toward the European system.

Jacob: Are you saying that the goals of the European Union are not good?

Rachel: We say nothing about the goals. The goal of a peaceful continent is wonderful; but the attempt to suppress free markets will cause that continent to sink. The ideal would be free markets along with political freedom and peace.

Pages 254-265 are covered better by Barro's macroeconomics textbook. Many candidates are taking both micro and macro on-line courses; we cover this material in macro, where it is more relevant, not in micro. Landsburg and Barro have the same perspective, and we avoid duplicating material in these courses.

Jacob: Brealey and Myers, Landsburg, and Barro all have the same perspective. Did they read each others' textbooks, or is this convergence expected?

Rachel: Until twenty five years ago, Western intellectuals argued about the best economic and financial systems. The Communist world seemed stronger and getting ever stronger; the Europeans (France, Germany) and Asians (Japan, South Korea, Singapore, Taiwan, Hong Kong) seemed to be rapidly over-taking the United States. The free market perspective in these three textbooks seemed a poor match for the central planning of Communist countries, the social model of the Europeans, or the directed economies of the Asians. But few now believe that the alternative out-perform free markets. Even those countries who oppose free markets speak of other objectives (justice, equity, equality), not pure economic or financial reasons for alternative systems. Economic and financial theory has converged in many parts of the world; Brealey and Myers, Landsburg, and Barro reflect the current consensus.

But politics trumps economics. High taxes on labor ruin economies (see the modules on labor economics in microeconomics and macroeconomics courses), but western countries

continue raising taxes. In 2009-10, the U.S. Congress extended unemployment benefits. Was there no economist to tell them unemployment would rise and ruin political careers?

The summary on pages 265-266 covers the whole chapter; read the parts covered here. Skip the Appendix to Chapter 8 on pages 275-281. We summarize the appendix in the Concepts and Overview posting, but we don't test this material on the final exam.

Review question 11 on page 268. This question is not easy; work through Landsburg's graphs to see the dead weight loss.

Review questions 13, 14, and 16 on page 268. These questions are similar, but slight differences in the ration tickets affect who bears the losses.

Review question 21 on page 269. Landsburg has several similar problems on these pages; this question is one of the clearest.

Review question 23 on page 269-270 and question 25 on page 270. The final exam problems are similar: the exam problem gives supply and demand curves and the amount of a tax or subsidy. You work out consumers' surplus and producers' surplus with and without the tax or subsidy and the resulting dead weight loss.