Lecture 2.
Economic Thinking (cont’d)
What is Economics?

Session ID: DDEE

Clicker Question
Announcements

- Please read announcements on the course website every Monday, Wednesday and Friday.
  
  http://sites.bu.edu/manove-ec101/

- Check your assignments on MyEconLab frequently.

- Discussion sections start next week.

- Purchase your clickers or ResponseWare apps when you are sure you will stay in the course.


Thinking Like an Economist (Continued)

- So far, we’ve covered three useful principles of economic thinking.

  1. Think about the goods (not the money).
  2. Everything has a cost.
  3. People respond to incentives—sometimes in unexpected ways.

- Now we will add three more principles.
4. When deciding “how many,” think at the margin.

- The marginal unit is a unit you might add to units that you already have.

  - **Example:** If I already have four apples, should I buy the fifth apple? The fifth apple is the marginal unit.

  - **Example:** If I already have one copy of my chemistry textbook, should I buy another copy? The second copy is the marginal unit.

- **Marginal benefit** is the benefit provided by the marginal unit.

- **Marginal cost** is the opportunity cost of the marginal unit.

- When deciding how many units to buy, sell or use, **marginal benefits** and **marginal costs** should be compared.

- The **marginal benefit** of the last unit that you buy should be at least as great as the marginal cost...

  - ...but they do **NOT** have to be equal.
Example: How Many Pizza Slices should I buy?

- You are eating pizza slices.
- Each slice costs $1
- Should you eat 4 slices?

Your analysis of the problem:

- 4 slices costs me $4 (the cost)
- I get $5 worth of pleasure (the benefit) from 4 slices.
- So I'll eat 4 slices.

Economic Thinker’s Analysis

- The 4th slice is “the marginal unit.”
  - The 4th pizza slice would cost me $1 (the marginal cost).
  - But if I’ve already eaten 3 slices, I won’t be very hungry.
  - …
  - …

- Here, we are thinking “at the margin.”
5. Prices that reflect ALL opportunity costs provide the best incentives.

- Should drivers have to pay tolls for using highways?

- Should universities be free?
  - We will discuss the cost of attending university later in the course.
Clicker Question

Example: Highway Tolls

Are highway tolls necessary for good highway management? Why?

Who is willing to pay high tolls? Who isn’t?
6. Statistical findings are often misleading.

**Example:** What should you conclude from the following statement?

“In my experience, . . . .”

—Psychiatrist, Harvard Student Health Service
What is Economics?

My Own Definition of Economics

Economics is the *scientific study* of *human behavior* associated with the *production and distribution* of the "*necessities and conveniences of life.*"

I’ll explain each of the *italicized* terms in reverse order in the next few slides.
“necessities and conveniences of life.”

- refers to the goods and services that people need or want (for example: bread, clothes, music).


---

**Production**

- What is production?

- It is the *transformation* of some goods and services (inputs) to other goods and services (outputs).

- **Example:** Pizza Production
**Distribution**

- In primitive economies, people produce for themselves and consume most of their own production.

- In more complex economies, efficient *specialist producers* use *large quantities of inputs* to produce *large quantities of outputs*.

- Outputs must be distributed to consumers.

- Inputs must be distributed to producers.

**Human Behavior**

- Economics is *not* about production technology—that’s engineering.

- It’s *not* a study of the things people buy.

- It *is* about *how people organize themselves* for the production and distribution of goods and services.

- It *is* about *what people do* in order to create necessities and conveniences.

- It *is* about an aspect of human behavior.
Scientific Study

- Economics is *not* about how to run a business—that’s Management.

- It’s *not* about how to make money.

- It *is* an observational science like astronomy and meteorology (the science of weather).

- Experiments are less common in economics than in biology, physics and chemistry.

- But like other sciences, economics uses **models** as a basic tool.

Scientific Models:

- Models are similar to real-world objects in details that are important to the intended analysis…

- but simpler in details unimportant to the analysis.
  - model airplanes vs. real airplanes
  - mice vs. human beings

- *Economists prefer mathematical models:*
  
  \[ Q = f(p) \], etc.
Wealth

Wealth refers to the *capacity* to create valued goods and services.

Wealth takes many forms:

- **Physical capital:** buildings, roads, machines, ships, cars, stores and warehouses filled with goods;
- **Human capital:** education and training, which makes people more productive;
- **Social capital:** productive social networks or relationships. *Trust in other people* and *good government* are important types of social capital.

Economists want to understand why some societies have far more wealth than others.
Economic Agents

- The word “agent” is economic jargon for a person or group that plays an active role in the economy.

- We describe three important types of agents.

- Households
  - individuals living alone, or
  - small groups living together (often related) and making joint economic decisions.

- Firms
  - individuals producing alone, or
  - groups of people producing together.
Governments

- Groups of people who jointly regulate households and firms.
- Governments may be viewed as specialized firms with regulatory functions.
- Governments also provide *public goods*, [to be discussed later].

Households, firms and governments are

- composed of many of the same people,…
- playing different roles.

---

**Absolute Advantage**

- Suppose there are two firms, *Firm A* and *Firm B*.
- *Firm A* has an *absolute advantage* in producing a good…
- …if *A* can produce the good using a smaller amount of resources than *B* has to use.

**Example:** If *A* and *B* both produce shirts, and *A* can produce its shirts with less labor and other inputs than *B* can, then *A* has an *absolute advantage* in shirt production.
Comparative Advantage

- Suppose each firm uses its resources to produce two goods, shirts and pants.

- If a firm wants to produce another shirt with the same resources, then there’s an opportunity cost: it has to produce fewer pants.

- The firm with the smaller opportunity cost of producing shirts has a comparative advantage in shirt production.

Specialization

- Total production can be increased if firms specialize in producing goods in which they have a comparative advantage.

- Example: If A has a comparative advantage in shirts, A should specialize in producing shirts.

- Absolute advantage is NOT a good guide to specialization.

- Comparative advantage is explained in detail in the CFO textbook, pp. 24-29.

- I’ll discuss it thoroughly in a later lecture.