# Nature, Scope, and Basic Concepts of Economics



Course Teacher: Dr. Abdur Rashid Sarker Professor Department of Economics The University of Rajshahi

## learning objectives

Specific issues you will learn in this chapter:

- Definition of economics
- •Major themes of economics
- Opportunity costs and economic efficiency
- Economic systems
- Basic economic problems and their answers
- Decisions making agents
- Methods in economics

### What is economics?

- •Xenophon had invented the term 'economics' in the fourth century BCE (Before the Common Era)
- The English term 'economics' is derived from the Greek word 'Oikonomia'...meaning is managing a household with limited funds.
- •However, economists are far from unanimous about the definition of their subject.

#### What is economics?

- Life is about choices
- •Individuals, firms and governments cannot have everything they want; their desires are constrained by both time and resources
- ■Therefore they must choose from a range of possible options.
- •Economics is not just something that exists in textbooks. It's all around us. Each one of us is an economic animal.
- •Sir John Hicks, a famous Nobel Laureate, once said that a good economist should be able to communicate economic thinking in words, diagrams and algebra.
- So an economist must be multi-talented. It's not just about maths.

#### What is economics?

Economists see the world differently, through the lens of economics.

For example, when asked "What's the optimal level of pollution in your town or city?" a common response is to say "Zero, of course!", but an economist is likely to say that the level will depend on society's preferences, but the optimal level is NOT going to be zero.

What the economist recognises is that pollution is a bi-product of almost all economic activity, the benefits from which society may be willing to offset some pollution.

That's the lens of economics

- Adam Smith in this book "An Inquiry into the Nature and Causes of the Wealth of Nations" (1776) defined economics as a science of wealth.
- •He explained how a nation's wealth is created.

- Smith argued that the keys to the "wealth of nations" were production and exchange, not the artificial acquisition of gold and silver at the expense of other nations.
- The wealth of a country consists, not its gold and silver only, but in its lands, houses, and consumable goods of all different kinds.
- •Wealth should be measured according to how well people are lodged, clothed, and fed, not according to the number of bags of gold in the

Three ingredients to wealth and prosperity

- 1. Freedom: giving people economic freedom to do what they wish with little interference from the state
- 2. Competition: individuals have the right to compete in the production and exchange of goods and services.
- 3. Justice: the actions of individuals must be just and honest, according to the rules of society.

Three ingredients to wealth and prosperity These ingredients would lead to a natural harmony of interest between the participants/stakeholders. His doctrine of self-interest/the invisible hand: "By pursuing his own selfinterest, every individual is led by an invisible hand to promote the public interest.

- Alfred Marshall in his book "Principles of Economics" (1890) defines economics as follows:
- "Political Economy or Economics is a study of mankind in the ordinary business of life; it examines that part of individual and social action which is most closely connected with the attainment & with the use of material requisites of well-being"
- Economics is a study of wealth and a part of the study of man.

Lionel Robbins in his book "An Essay on the Nature and Significance of Economic Science" in 1932 defined economics as follows:

"Economics is a science which studies human behaviour as a relationship between ends and scarce means which have alternative uses."

•(Ends refer to human wants and means are resources)

The subject of economics is too broad.

According to Jacob Viner, " Economics is what economists do"

A good definition of economics:

Economics is the study of choice under the condition of scarcity.

It is a social science. It is social because it involves people and their behavior. It is a science because it uses a scientific approach in investigation of choices.

An 'imperialist' social science

### 1. Scarcity

The condition in which wants are forever greater than the available supply of time, goods, and resources.

Scarcity exists simply because it is human nature for people to want more than they can have, which forces people to make choices.

2. Choice

Choice and scarcity go together.

Individuals, businesses, and societies must choose among alternatives

## 3. Specialization

Economics studies why participants in the economy (people, business, countries) specialize in tasks to which they are particularly suited.

According to Adam Smith, specialization creates wealth. Without specialization, we could not enjoy the high living standards.

Division of labour was Adam Smith's term for specialization.

- 4. Exchange/trade
- Exchange complements specialization. Specialized producers cannot meet their own consumption needs from their own production.
- □Exchange is all around us.
- □ A country like America exchanges its wheat for TV sets made in Japan.

# Scarcity and Resources • What does Scarcity force us to do?

- It forces us to make choices/ economic decisions (where to work, what to produce, how much to sell)
- What are Resources?
  - The basic categories of inputs used to produce goods and services
- What are the three categories of Resources?
- What is Entrepreneurship?
  - Entrepreneurship organizes resources to produce goods and services

# Opportunity costs and efficiency

- Efficiency denotes the most effective use of a society's resources in satisfying people's wants and needs.
- Economic efficiency requires that an economy produces the highest combination of quantity and quality of goods and services given its technology and scarce resources.

# Opportunity costs and efficiency

## **Opportunity costs**

 In a world of scarcity, choosing one thing means giving up something else.

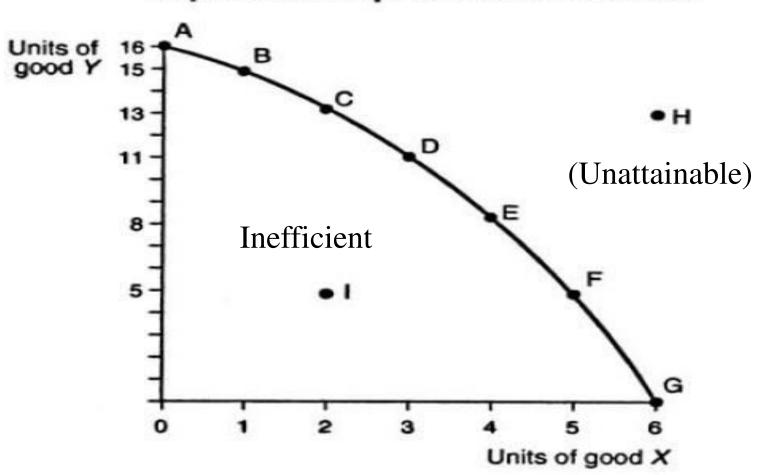
The opportunity cost of a decision or choice that one makes is the value of the highest valued alternative that could have been chosen but was instead forgone.

# The Production Possibility Curve

- What is a PPC/PPF?
- - A graphical device that is used for economic analysis of production decisions
  - A curve that shows the maximum combinations of two outputs that an economy can produce, given its available resources and technology
    - (Technology: The body of knowledge and skills applied to how goods are produced)
- Assumptions
  - Fixed resources, Fully employed resources, Technology unchanged

## The PPF





# Decision making agents

#### Individuals

- Individuals are the basic units of a society
- the individual here will be understood as making decisions for his or her family or household

#### Business firms

- Business firms are artificial units
- Every firm is ultimately owned by or operated for the benefit of one or more individuals.

# Decision making agents

- Governments
  - Governments are also economic decisionmakers
  - Governments set the legal framework
     within which the entire economy works
  - Unlike firms and individuals,
     governments have the legal right to take
     property without consent (as by taxation)

# Decision making agents

## Other agents

- Trade unions and cartels (organization of sellers)
- Voluntary associations such as clubs, foundations, and religious institutions
   (through which individuals combine for collective consumption choices)

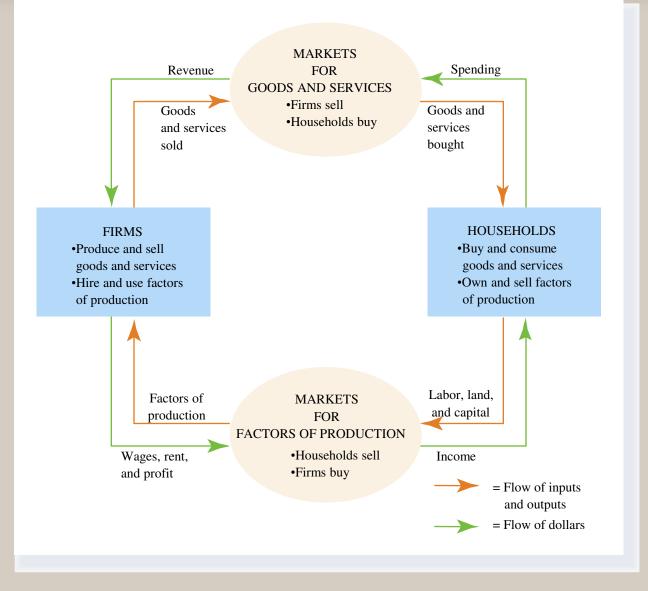
# Objects of Choice and Economic Activities

- The objects of economic choice are called commodities or goods
- Consumption is the ultimate economic activity
- Production by individuals and firms is a second economic activity
- The third main economic activity is exchange
  - Trade neither creates nor destroys goods and services,

# Inputs and Output Markets: The Circular-Flow Diagram

- The *circular-flow diagram* is a visual model of the economy that shows how dollars flow through markets among households and firms.
- Flow of economic activity

#### Figure 1 The Circular Flow



# The Circular-Flow Diagram-flow of economic actibity

#### Firms

- Produce and sell goods and services
- Hire and use factors of production

#### Households

- Buy and consume goods and services
- Own and sell factors of production

# Our First Model: The Circular-Flow Diagram

- Markets for Goods and Services
  - Firms sell
  - Households buy

- Markets for Factors of Production
  - Households sell
  - Firms buy

### What to produce?

- What commodities are produced (and in what quantities)?
- Should society devote its limited resources to producing civilian or military goods; luxuries or necessities?
- Should more agricultural or more industrial goods be produced?

## How to produce?

- ➤ Once the decision is made on what to produce, society must determine what combinations of the factors of production will used.
- ➤ How are goods produced?
- A trade-off between using more workers and using more machines
- ➤ Will coal, petroleum, or nuclear power be used to produce electricity?
- ➤ Will bulldozers or workers with shovels dig dams?

### For whom to produce?

- For whom are goods produced?
- Who gets to eat the fruit of economic activity?
- Will society's output be divided fairly equally?
- Will differences in wealth be allowed to pass from one generation to the next?
- What role will government play in determining for whom?
- Should government intercede to change the way the economy is distributing its output?

For whom to produce?

- Who will receive goods and services produces?
- It depends mostly on how income is distributed
- Individuals with the highest income have ability to buy the most goods and services.

# Answering the problems

• Answers depend on the type of the **economic system**:

The set of organizational arrangements and institutions that are established to solve the economic problems is called an economic system.

[ Forms of ownership, state interference in the economy, pricing and competition etc. ]

The way in which the means of production and distribution of goods are organized

# Answering the problems

- Types of economic system: *socialist*, *capitalist*, *and mixed*
- Centrally planned economy/centralized economy/socialist/communist
  - An economy in which government decides how economic resources will be allocated
  - Government decides what to produce, how to produce them and who would receive them
  - Examples: Former Soviet Union, Cuba, North Korea

# Answering the problems

- Market economy/ free-enterprise economy
  - An economy in which government does not control economic activity (ME relies primarily on firms)
  - An economy in which the decisions of households and firms interacting in markets allocate resources
  - Markets, rather than the government, is the determining factor

1 TIO O 1 T

All problems are solved by the price mechanism

T 1 A / 1\*

- Mixed economy
  - An economy in which most economic decisions result from the interaction of buyers and sellers in markets, but in which the government plays a significant role in the allocation of resources
  - Social security system/ safety nets
  - Public goods: roads, street lighting, and national defense, education and health services
     , protection of the environment

- Answers to what to produce
  - In a solved by the price mechanism
    It through taxes, subsidies, etc.) modifies and, in some instances (through direct controls), replaces the operation of the price mechanism in its function of determining what to produce
  - In a completely the dictator, or more likely a planning committee appointed by the dictator or the party, determines what to produce

- Answers to how to produce
  - In a free-caterprise contour, the "how to produce" problem is solved by the price
  - In a mixed price way, the operation of the price mechanism in solving the "how to produce" problem is modified and sometimes replaced by a government action
  - In a contract way, this problem is solved by a planning committee.

- Answers to "for whom to produce"?
  - In market economy, the problem of "for whom to produce" is also solved by the price mechanism
  - In the name of equity and fairness, governments usually modify the workings of the price mechanism by taking from the rich (through taxation) and redistributing to the poor (through subsidies and welfare payments)
  - They also raise taxes in order to provide for certain "public" goods, such as education, law and other, and defense.

#### The Scope of Economics-Branches

Microeconomics—*mikros* -"small"

The microeconomics is concerned with the behaviour of individual actors/agents/units of the economy: households, business firms, and governments.

#### **Microeconomic Questions**

How many jobs will open up in the ICT industry? What will happen to the cigarette price over next five years?

How would phone companies be affected by a tax on imported cell phones?

#### The Scope of Economics-branches

#### Macroeconomics-makros "large"

- -It studies economy as a whole.
- -The economic behavior of aggregates—income, employment, output, and so on—on a national scale GDP, GNP, CPI, the unemployment rate, and the government surplus and deficit.

#### **Questions**

What are the determinants of inflation?

What is the relationship between the money supply and inflation?

## Methodology in Economics

Economists rely heavily on economic theories to explain how the economy works.

Logical theories explain how the economy works by showing how the facts fit together in a coherent manner.

To predict and explain the economic behaviour of individual consumers, business firms and the operation of individual markets economists use theories or models.

#### **MACROECONOMIC CONCERNS**

Major concerns of macroeconomics are:

- Inflation
- Output growth
- Unemployment

#### **GOVERNMENT IN THE MACROECONOMY**

There are three kinds of policy that the government has used to influence the macroeconomy:

- 1. Fiscal policy
- 2. Monetary policy
- 3. Growth or supply-side policies

## Methodology in Economics

#### **Theories**

A theory is simply a plausible and coherent explanation of how certain facts are related.

A theory is a partially verified statement concerning the relationship among variables

A theory is a conceptualization or description, of a phenomenon that attempts to integrate all that we know about the phenomenon into a concise statement or question.

# Methodology in Economics

#### **Hypothesis**

A prediction about the variables being studied An educated and testable guess about the answer to research questions

An hypothesis can either be supported or refuted on the basis of data

Example: If people exercise for 30 minutes per day at least three days per week, then their cholesterol levels will be reduced

# Positive Versus Normative Analysis

- *Positive statements* are statements that attempt to describe the world as it is.
  - Called descriptive analysis
- *Normative statements* are statements about how the world should be.
  - Called prescriptive analysis
  - Also called policy economics

## Why do we study economics?

- •There are four main reasons to study economics:
  - to learn a way of thinking,
  - to understand society,
  - to understand global affairs, and
  - to be an informed voter.