The Economic Journal of Nepal, Vol. 14, No.4, Issue 56, October-December 1991 © DOE-TU

A Note on Basic Economic Concepts

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BASIC ECONOMIC PROBLEM - SCARCITY, CHOICE AND OPPORTUNITY COST

The crux of economics is the fact that the resources of decision makers are always limited. This necessitates everyone to make hard decisions. One fundamental thing in this regard is not merely the scarcity of funds but also the scarcity of physical resources. For example, the supply of fuel has never been limitless and hence a real scarcity of fuel could force us to keep our home cooler in winter and warmer in summer. This reality gives us the following fundamental principle of economics:

"Virtually all resources are scarce, meaning that humanity has less of them than it would like. So choices must be made among a limited set of possibilities, in full recognition of the inescapable fact that a decision to have more of one thing means we must give up some of another thing."

Thus economics is in fact the study of how best to use limited means in the pursuit of unlimited ends. It also helps make rational decisions from among the available possibilities. Because with limited resources, a decision to have more of something is simultaneously a decision to have less of something else, the relevant cost of any decision is its opportunity cost - the value of the next best alternative that is given up. So rational decision making, be at in industry, government, or households, must be based on opportunity - cost calculations.

To sum up, a rational decision is one that best serves the objective of the decision, maker, whatever that objective may be. The term 'rational' connotes neither approval nor disapproval of the objective itself. The opportunity cost of any decision is the forgone value of the next best alternative that is not chosen.

BASIC ECONOMIC QUESTIONS

There are three basic coordination problems of any economy - what to produce, how to produce and how to distribute. In other words, in any economic system the answer must be sought to following three fundamental questions of resources allocation:

- How much of each commodity should be produced i.e. output selection ?
- What quantities of each of the available inputs should be used to produce each good i.e. product planning ?

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- How should the resulting products be divided among the consumers i.e. distribution ?

It would be interesting to find out how each of these questions is answered by a free market economy.

Output Selection

It is the price mechanism that decides what to produce in a free market system. It so happens by the law of supply and demand. For instance, where quantity demanded exceeds quantity supplied then the market mechanism pushes the price up thereby encouraging more production and less consumption of the commodity in short supply. Likewise where quantity supplied exceeds quantity demanded the same mechanism functions in reverse i.e., the price falls, which ultimately discourages production and stimulates consumption.

Product Planning

After the decision is made about the composition of output, the next task would be to determine how those goods are going to be produced. In reality, these two decisions cannot be made separately. The method chosen for production determines what combinations of, say, tea and mangos can be obtained, though it is simpler to think of these decisions as if they occurred one at a time. The production-planning problem includes, the assignment of inputs to enterprises that is, which farm or factory will get how much of which materials. Thus in a free market, inputs are assigned to the firms that can make the most productive or/most profitable use of them.

Product planning is assignment of inputs of specific industries and firms. Since the production processes of the various industries are interdependent production planning problem has to be solved by the central planners rather satisfactorily. For example, gasoline is used not only by consumers to run cars, but also by the trucking industry. Unless the planners allocate enough gasoline to the truckers, products will not get to market, and unless they allocate enough trucks to haul the gasoline to gas stations, consumers will not be able to get to the market to buy the products.

These problems have to be dealt with together. Since the output required for any industry depends on the output desired from every other industry, planners cannot be definite that the production of the various outputs will be sufficient enough to meet both consumer and industrial demands unless they take explicit account of the inter dependencies among industries. To make it more simple what we can say is if we change the output target for one industry, every other industry's output target also must be adjusted. Let's take a simple example. If the decision makers would like to provide more electricity to their consumers, it would mean that more steel will have to be produced for more electric generators. Again an increase in steel output will require more coal to be mined. More mining in turn means that still more electricity is needed to light the mines. Thus any single change in production, like the illustrative rise in electricity output, sets off a chain of adjustments throughout the economy that require still further adjustments.

Distribution

This task involves as to which consumer gets each of the goods that have been produced. The important objective is to distribute the available supplies so as to match the differing preferences of consumers as well as possible. For example, coffee lovers must not be flooded with tea while tea drinkers are showered with coffee. In this case also the price mechanism solves this sort of problem by assigning the highest prices to the goods in greatest demand and then setting individual consumers pursue their own self-interests. Thus the price system carries out the distribution process by rationing goods on the basis of preferences and relative incomes.

THE MARKET MECHANISM - HOW IT WORKS TO ANSWER THE BASIC ECONOMIC QUESTIONS

Market mechanism can be a helpful instrument for the pursuit of economic goals. Even some socialist countries have openly and deliberately organized parts of their economies along market lines.

Let us not be confused with means and ends in deciding whether to leave matters to market forces, either with or without suitable modification or constraint. Since radicals and conservatives have different goals, they may also differ in the means they advocate to pursue these goals. But means should be chosen on the basis of how effective they are in achieving the adopted goals rater than to select for their own sakes. The choice is made on the basis of its consequences, not on an ideological prejudgment that the market mechanism per se is reactionary tool. Market mechanism can do many useful things and can help both radicals and conservatives to achieve their goals. If we take it for granted that the market can be used to control pollution then let me quote William J. Baumol and Alan S. Blinder from "Economics" that "Radicals may favour very tight pollution controls even if controls cut into business profits; conservatives may wish to have things the other way around. Nevertheless, both sides may want to use the market mechanism to achieve their goals. Indeed, each side may conclude that, should it lose the political struggle and the other side's position be adopted, less damage will be done to its own goals if market methods are used."

EFFICIENCY AND EQUITY IN A PURELY MARKET SYSTEM AND THE ROLE OF GOVERNMENT IN THE ECONOMY

The assumption in the discussion of scarcity and choice was that either the single firm or the whole economy always operates on its production possibilities frontier rather than below it. In other words, whatever it decides to do, the firm or economy does so efficiently . Economists define efficiency as the absence of waste. Since the main concern is how a competitive market economy allocates resources efficiently, a precise definition of efficiency is needed. In short, when there are the possibilities of reallocating resources to make some people better off without making anyone else worse off, we say that the allocation of resources is efficient.

An economy is judged efficient if it is good at producing whatever people want. As a rule, the concept of efficiency does not permit us to tell which allocation is 'best' for society. However, if some people are made better off in their own estimation, and none are harmed, then society is certainly better off by anyone's definition.

Rare is the man who does not have some notion of what is or is not fair or just in the distribution of income, wealth, power, and opportunity. We are all prone to judge political and economic systems by the criterion of distributive justice and equity. Every 'ism' assumes some standard of social justice, and every reform or revolution, or opposition to them, is motivated primarily by distributive considerations.

There is no objective formula that will balance the ethical requirements of distributive justice against the needs of production and material well being. Each of us has to find the answer within himself. Our attitudes toward different institutions and economic systems will be shaped accordingly.

An important form of equality is the equality of opportunity - and equal chance for everyone to exercise his/her abilities in the economic sphere. In so far as individual abilities and motivations differ, and in so far as rewards are scaled according to performance, full equality of opportunity would still result in unequal distribution of benefits.

Two distinct features can be observed in the case of third world countries - one is the increasing role of the state in initiating and fostering economic growth and the other is the adoption of planned programs of development. This reality poses couple of questions; what are the circumstances that led to and justify the interference of the state in economic activities ? Why has planning for development become necessary ? And how far has government's increasing interest in economic development and planning helped in the rapid progress of contemporary underdeveloped economies ?

Government activity in economic sphere has increased both in the developed countries and underdeveloped economies. In the developed free enterprise countries, governments have taken serious action to expand the technological and material bases of their economies. United States of America which stands as an ideal example of free enterprise, nearly 7/8 of the total output is produced by private enterprise, nevertheless government's intervention in economic life has been necessitated in the interests of maintaining stability. In the past, social and economic equilibrium were sought to be reached by free market mechanism but now through the inter-working of collective public action and individual action in the market place.

The scope of government's influence in economic affairs depends on various factors like the economic ideology of the country, the scope and initiative of private sector, the administrative efficiency of the government and its ability to mobilize resources, the type of investments required, the attitude of the people and their cooperation, political security etc. Broadly speaking in the advanced free enterprise economies government's activity is mostly of a restrictive nature, in the low income countries it is more of an assertive nature.

SELECTED REFERENCES

Baumol, William J., Alan S. Blinder (1982), *Economics*, Hartcourt Brace Jovanovich, Inc., New York.

Grossman Gregory (1979), *Economic Systems*, Prentice-Hall of India Pvt. Ltd., new Delhi.

Singh, D. Bright, *Economics of Development*, Asia Publishing House, Bombay.

BOOK REVIEW

Bharadwaj, Krishan (1990), Irrigation in India Alternative Perspective, (New Delhi: Indian Council of Social Science Research) Pp. xii+73, Price: Rs. 25.00 I/C.

India is the second largest country in the world from the point of view of population and largest among the SAARC countries both in population and land area. Less than 50 percent people are engaged in agriculture and more than 30 percent of the National GDP comes from agricultural sector. The annual increment of agricultural production is only about 2.7 percent. In this context irrigation is most important to the Indian economy.

The book under review is divided into four major chapters and several sub-chapters excluding introductory chapter. The first chapter of this book deals with growth of irrigation in India and this chapter is again divided into two sub-chapters such as: irrigation development under British Rule and in the Post- Independence period. The history of irrigation in India was very long. Between 1836-66 the Uppar Ganga and the Uppar Bari Doab, Krishan and Godavari were taken up. From 1867 to 1921 development of irrigation was financed mainly through public loans because the colonial British Government diverted surplus revenues to unproductive military and other expenditures. The Select Committee of the house of commons decided to select irrigation projects on the basis of financial returns (selection of financially viable or productive irrigation projects) in 1879.

For the first time in 1980, protective irrigation as a famine relief introduced and in 1901 an Irrigation commission was appointed and some irrigation projects were launched as recommended by the Commission, but regional disparities widened interms of irrigational investment. It is only after in 1921 when the central government transfered their powers to the provincial governments to finance productive irrigation projects either from their general revenues or from loans raised on government securities.

After the independence of India, planned development of the country started. From the First Five Year Plan (1951-56) to till now irrigational development has been taken into consideration. But during this period minor irrigation projects have suffered relatively due to overall neglect in terms of priorities of the public irrigation policy. On the other hand some weaknesses are appeared on major irrigation projects handeled by the government institutions.

The author divided into several sub-chapters to the second chapter of this work (State of Research on Irrigation). She tries to explain that due to irrigation facility not only increase the impact of irrigation on productivity, but employment generation and income also affected. Discussing irrigation and productivity some micro and macro perceptions and simple exercises have been carried out in a number of studies employing regression procedure to determine the corelation between growth of irrigation and growth of agricultural production and some studies used the production function approach to investigate effects of different levels and types of irrigation on output, considering irrigation as one of the explanatory variable. Besides the micro and macro perceptions related to irrigation and productivity some additional observations were also presented here.

Discussing on production relations approach author point out that irrigation influences relative economic position of the different uses and generates a dynamics of growth through these interrelations. She has drawn this conclusion explaining different surveys done by various scholar in different time period. "The benefit-cost analysis to be used for generating simple investment criteria to choose among alternative projects is less in vague now than in the sixties or the early seventies" is the conclusion drawn by her on benefit-cost analysis and investment criteria of irrigation projects.

In the third chapter of this book the author discussed about various alternative modes of irrigation such as: multipurpose hydro projects, deep tubewels, tanks, private irrigation - shallow tubeweels etc. With their financing procedure, the technical problems connected with their maintenance and utilization, socio-economic effects etc. This book also deals the conjunctive use of irrigation modes and intra-model comparisons.

The author concludes the book saying that the previous researchs are not sufficient to finalise the important issues that have emerged in the analysis of irrigation on India. Thus, further research needs to be alongwith on the interactions between the irrigation technology and the social relations in a region.

Finally, though the survey report (book) contains only 73 pages including 10 pages selected bibliography, five pages key word index and 5 tables, it is more useful to the planners, policy makers, NGO's involved in this area and also to the general readers.

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