Chapter II: Concepts and Definitions

Introduction:
In this chapter, we have explained the concepts used for the analysis of our problem such as efficiency in consumption and saving behaviour. We have also examined the definitions of such terms as income, saving, education and household as interpreted in our analysis.

Efficiency and Consumer Behaviour:
In our earlier theoretical framework, we have seen that education by enabling efficiency of the non-market production affects consumer behaviour. This said behaviour affects in two ways. It is not that education has a uniform impact on efficiency in the production of all goods or in all activities. It may have greater impact on efficiency in some activities than in others altering the relative prices of commodities. According to economic theory a person will have an incentive to shift consumption toward a relatively cheaper commodity. Similarly education by improving the average efficiency of non-market production, households with more educational attainment are in a position to produce more with a given amount of time and money. So more educated households are wealthier than the less educated households. So there by holding available time and money fixed, more educated households produce more. Again "economic theory suggests that this difference in real wealth among households will affect observed behaviour systematically." This is how the concept of efficiency is used in the context of studying consumer behaviour.
The term efficiency in the context of savings and investment behaviour cannotes the ability of highly educated households to select a more efficient portfolio with the same income they can obtain a higher return.

Income:
Income in our case is composed of both earned and unearned of a household during the reference year 1983-84.

Annual gross income of a household during the reference year 1983-84 is taken as its disposable income. Out of 250 sampled households, the annual gross income of only 30 heads of the households was above the exemption limit (i.e. nil tax bracket) of Rs. 15000 in that year (1983-84). We deducted from annual gross income Rs. 15000 plus Rs. 3000 standard deduction permitted to find the taxable income. In majority of cases, i.e. 26 out of 30 such heads, we found that their taxable income was in the range of Rs. 6000 to Rs. 8000. On the assumption that these heads had taken the full advantage of Sec 80-C of the Income Tax Act 1981, none of these 26 heads would have paid income tax. Thus, in our case at least it is safe to assume that the annual gross income of a household is its disposable income.

Consumption:
Consumption is generally known as expenditure. It may be quantified either in money terms or in quantitative terms of kilograms, liters, meters etc.
In the present study, consumption of 13 commodities are quantified in monetary terms. The commodities are food at home; milk and its products; beverages and food outside home; tobacco and liquors; fuel and electricity; clothing and footwear; rent and/or repairs; entertainment; health and medicare; education; personal service (wages to servants); personal care (expenses on cosmetics); and miscellaneous items. These 13 commodities constitute consumption basket. Further, the first three commodities are food items and the rest are non-food items.

Savings:
In the Keynesian framework, excess of income over consumption is designated as saving. In simple words, it is the unspent income available for future consumption.

Broadly there are two approaches to measure savings. They are current account and balance sheet approaches. Below we discuss them at some length.

Current Account Method:
In this method, saving is called "Earned surplus" which can be obtained by deducting current year consumption from income. It may be represented in the form of an equation:

\[ ES = Yt - Ct \]

where \( ES \), \( Yt \) and \( Ct \) are Earned surplus, Current year income and consumption in that order.

Balance sheet Method:
In this method, savings is regarded "Earned network". It is
surplus of net change of assets over net change of liabilities after adjusting for capital transfers. To be sure, saving of a household is defined as change in earned networth which is computed as the difference between change in the value of assets and liabilities, after making allowance for capital transfers. It may be symbolised as:

\[ S = (\Delta \text{PA} + \Delta \text{FA}) - (\Delta \text{L} + \text{CT}) \]

Where, \( S \) = saving of a household
- \( \Delta \text{PA} \) = change in physical assets
- \( \Delta \text{FA} \) = change in financial assets
- \( \Delta \text{L} \) = change in liabilities (increase in borrowings minus increase in lendings)
- \( \text{CT} \) = Net inflow of capital transfers (inflow minus outflow).

The above definition in computation procedure is given by the National council of applied Economic Research to measure households savings in our country for the year 1975-1976.

The two methods discussed above give the same amount of saving during a given period of time. Nonetheless, it should be noted that the margin of error is greater when saving is measured using current account method, than measuring it from balance-sheet method. This is due to the fact that the data required to estimate earned surplus have to be more detailed and has greater difficulty in obtaining them than that for measuring the change in earned networth.

By estimating savings through the balance-sheet method, one can
get more qualitative information. The estimates reflect not only the volume of savings but provides components of savings as well. In other words, the method permits to know how the savings are utilised. The disposition of savings gives a glance of investment pattern as investment is additions to networth. (i.e. net change in assets). Thus the balance-sheet approach has the added advantage of linking saving with investment.

Conceptually, both the methods should give identical results provided, i) both exclude all valuation changes; ii) both make the same distinction between capital expenditures which enter the balance-sheet and current expenditures which do not; iii) both follow the same method of adjustment for actuals and transfers.

In this study, we followed balance-sheet method and defined savings as earned networth. It may be noted that national institutions in India such as Central Statistical Organisation (CSO), National Council of Applied Economic Research (NCAER) and Reserve Bank of India (RBI) follow this method to compute savings.

Full Savings:

Solomon developed a concept known as "Full Savings". The concept includes the cost of post-school investment i.e. amount forgone while undergoing training is included under savings. Since none underwent training at his or her own expenses after securing job in our sample, we could not make use of this concept.
Investment:

For the nation as a whole, only economic investment in newly produced capital goods matter, as financial assets and liabilities cancel out between sectors, and net investment in non-reproducible assets like land is nil. For an individual economic unit, however, physical investment in newly produced capital goods, second-hand goods and non-reproducible assets, as also financial investment, have to be considered. Accordingly, acquisition of all income-producing assets by the household, such as land, house property, machinery and equipment, durable and financial assets, were covered under household investment in our study. Thus, investment is composed of physical and financial assets. NCAER also follows similar method to measure household investment.

Investments in physical assets are land, buildings (houses), agricultural fields, live stock, consumer durables, plant and machinery etc. Similarly investment in financial assets are deposits with commercial banks, co-operatives and companies; shares and securities, contributions to provident fund, chit-funds; premium paid to life Insurance Corporation and other insurance premiums; instalments paid to acquire consumer durables etc. Further, we readily concede that due to difficulties in collecting data, we could not include the volume of gold, silver, other precious stones, and cash balances under the rubric of financial assets.
Treatment of consumer durables:
Economists differ with regard to the treatment of consumer durables. Unlike capital goods, consumer durables do not yield any income, and therefore they should be treated as consumption expenditure. However, the purchase of durables involve relatively larger amounts and the utility spreads over a long period. Also, as Goldsmith point out that estimates of saving including consumer durables seem generally to provide a more satisfactory explanation of changes in savings than excluding them. In our study, we considered consumer durables as component of physical assets and therefore enter into the vector of household investment.

Treatment of Expenditure on Education:
In Economics of education, expenditure incurred on education, health and medicare are considered as investment. However, we prefer to include such expenditures under consumption. In this regard, it may be pointed out that NCAER, CSO and RBI treat the aforesaid expenses under consumption rather than investment.

Computation of Wealth:
Wealth is defined, analogous to investment in physical and financial assets possessed by a household. In this study, instead of considering the exact value of assets, a crude indicator of the value of assets is used viz, wealth brackets. The head of the household has been requested to tick as per the value of assets
in the appropriate wealth brackets (the ranges of wealth brackets are given in the Appendix). This method has been used, as the households are normally reluctant to provide the exact value of assets such as gold, jewellery, cash holdings etc.

Education:

Education comprises formal and informal methods of acquiring knowledge. The concept in its broad sense embraces continuous, distance, life-long, correspondence, vocational and professional education. In our study, however, only formal schooling is considered. The narrow conception of education is considered for, it has the advantage of quantifying the number of years of schooling underwent by a person. Unless otherwise specified, throughout the study only head's (household) formal schooling is taken into account. Aside, the schooling of other members are classified into 'stock' and 'flow'. These are the recent concepts of education. Those who completed formal schooling come under the rubric of stock while those who are still in the schooling come under the flow.

Literates are defined as persons who can either read or write. To differentiate literates from illiterates, we have arbitrarily assigned one year of schooling for the literates.

Household/Family:

We have followed standard definition of household which is commonly used in such empirical studies as for example the definition of NCAER. The basic unit of our study is household
and it is defined below.

A composition of persons related by blood, marriage or adoption and living in the same dwelling unit continuously for not less than six months during the reference period, sharing a common kitchen; the only exceptions being new born babies and brides, who are treated as members of the household irrespective of the duration of their stay; domestic servants, permanent labourers and boarders are excluded, though they may stay with the household and share the kitchen.

As noted in chapter 1, we selected 250 households. They are selected from among the households whose dwellings are assigned door numbers by the Municipality of Warangal city. Further, the number of members in a household constituted the household size (family size) and the persons recognised by all members of the household as the head was regarded as the head of the household.
References:


2. NCAER: Household Income and Its Disposition, Delhi, 1980 pp. 46-49.

3. PGK Panikar: Rural Savings in India, Somiya Publishers, Bombay, 1970 p.32

4. NCAER: op. cit., p.48


6. NCAER: op. cit., pp. 53 - 57


8. NCAER op. cit., p. 50.