

QUANTITY THEORY OF MONEY : CASH BALANCE APPROACH

1. What is Cash Balance approach?

Cash-balance approach states that the value of money depends upon the demand for money and the demand for money arises on account of its being a store of value.

2. Define the Co-efficient 'K'.

K represents that fraction of total national income (R) for which people wish to keep cash.

3. What is meant by unitary elasticity of money demand function ?

K, R, c and H are taken as constant in Pigou's equation and the equation gives a unitary elastic demand function for money. It states that halving of purchasing power of money leads to the doubling of the demand for money and vice-versa.

4. Why is Cambridge Approach psychological ?

The Cambridge Approach is considered as Psychological because it studies the psychological factors which influence 'k'.

5. What does 'K' mean in Marshall's equation of Cambridge cash balance approach ?

The portion of money income that the people intend to hold in the form of cash.

6. State and Explain the Cash Balance Approach to money and price.

Some Cambridge economists led by Dr. Marshall, popularized and adhered to a slightly different version of the quantity theory of money, known as the cash balance approach, on account of its emphasis on cash balance.

According to cash-balance approach, the value of money depends upon the demand for money. But the demand for money arises not on account of transactions but on account of its being a store of value. It is, thus, the demand for 'money sitting' rather than money 'on wings' that matters.

It may, however, be made clear that in determining the amount of these cash balances the individuals and institutions are guided only by their real value. Thus, an individual is concerned with the extent of his liquid command over real resources. The community's total demand of money balances constitutes a certain proportion of its annual real national income which the community seeks to hold in the form of money.

The community's demand for real cash balances in this sense varies from time to time. Thus, given the state of trade (T) and the volume of planned transactions over a period of time, the community's total demand for real money balances can be represented as a certain fraction (K) of the annual real national income (R). The following lines from Marshall explain clearly the substance of the cash-balance version of the quantity theory, "In every state of society there is some fraction of their income which people find it worthwhile to keep in the form of currency; it may be a fifth or a tenth or a twentieth."

Holding of money involves a sacrifice because when we hold, we spend less. To have too little holding of money may mean inconvenience, to have too much may mean unnecessary stinting. Somewhere between the two extremes every person, every family, every community fixes the amount of money it will keep. "It is convenient to think of this amount as given proportion of the person's or the family's or the community's annual income."

Whatever this proportion may be, it is always the result of a deliberate decision; none of us has the money holding, we have, quite by accident. This is, in the most real sense, the demand for money. Suppose at one time people want to possess cash balances worth one-tenth of the annual income. Now, they want to have cash balances representing one-seventh of the national income. This means they want to have more cash with them, which is possible only by curtailing expenditure on goods and services, which, in turn, means less demand for them and hence a fall in their prices. Similarly, if they want to have less cash balances, they will spend more and the prices will be pushed up.

Thus, according to cash balance approach, the value of money depends upon the demand for money to be kept as cash. If one puts the problem as one of the amount of money an individual will choose to hold, the framework of this approach that suggests itself is one in which constraints and opportunity costs are the central factors, interacting with individual's tastes.

As far as the Cambridge approach is concerned, the principal determinant of people's taste for money holding is the fact that it is a convenient asset to have, being universally acceptable in exchange for goods and services. The more transactions an individual has to undertake the more cash will be he want to hold.

To this extent the approach is similar to Fisher's, but the emphasis is on want to hold, rather than on have to hold. This is the basic difference between the Cambridge monetary theory and Fisher's framework. The essence of this theory is that the demand for money, in addition to depending on the volume of transactions that an individual might be planning to undertake, will also vary with the level of his wealth, and with the opportunity cost of holding money, the income foregone by not holding other assets.

7. Compare Cash Transaction approach with Cash Balance approach of quantity theory of Money.

Cash Balance approach is regarded as superior to the cash transaction approach on the following grounds:

(i) The cash balances version lays stress on the subjective valuations and human motives which are the basis of all economic activities in sharp contrast to the highly mechanical nature of the concept of velocity in Fisher's equation.

(ii) The Cambridge version of the theory brings to light a new element, namely, the level of income, changes therein and in its velocity. Instead of being concerned with the total transactions it is concerned with the level of income, which, in turn, determines the level of economic development, employment and price level. As a matter of fact, the problem of price level cannot be studied without a reference to changes in income and output. Moreover, it is not the velocity of money which matters but the velocity of circulation of money due to changes in income that matters.

(iii) The cash balances equation brings to light the demand for money to hold. This emphasis on the demand side is in sharp contrast with traditional emphasis on the supply side. Actually, the Cambridge equation was put forward to validate the classical quantity theory of money according to which the supply of money is the sole determinant of the price level.

(iv) The cash balances approach links itself with the general theory of value, since it explains the value to money in terms of the demand for and supply of money. The equation $P = M/KT$ is a more useful device than the transaction equation $P = MV/T$, because it is easier to know how large cash-balance individuals hold than to know how much they spent on various types of transactions.

(v) The cash balances approach has given rise to the famous liquidity preference theory, which has become an integral part of the theory of income, output and employment.

(vi) Cash balances approach brings out the importance of k . An analysis of the factors responsible for fluctuations in k offered scope for the study of many important problems like uncertainty, expectations, rate of interest etc. which are not considered in the transactions approach. The symbol k reflects the desire for liquidity. A shift in k in the direction of an increased desire for liquidity shows a fall in demand for goods, i.e., a movement away from goods to money resulting in the revision of production plans, curtailment of output and fall of income.

8. Point out the similarities and dissimilarities between cash transaction approach cash balance approach.

There are similarities and dissimilarities between the two approaches of the quantity theory of money, i.e., the Fisherian transaction approach and the Cambridge cash-balance approach.

The two approaches have the following similarities:

1. Same Conclusion:

The Fisherian and Cambridge versions lead to the same conclusion that there is a direct and proportional relationship between the quantity of money and the price level and an inverse proportionate relationship between the quantity of money and the value of money.

2. Similar Equations:

The two approaches use almost similar equations. Fisher's equation $P = MV/T$ is similar to Robertson's equation $P = M/kT$. However, the only difference is between the two symbols V and k which are reciprocal to each other. Whereas $V = (1/k)$ $k = (1/V)$. Here V refers to the rate of spending and k the amount of money which people wish to hold in the form of cash balances of do not want to spend. As these two symbols are reciprocal to each other, the differences in the two equations can be reconciled by substituting $1/V$ for k in Robertson's equation and $1/k$ for V in Fisher's equation.

3. Money as the Same Phenomenon:

The different symbols given to the total quantity of money in the two approaches refer to the same phenomenon. As such $MV+M'V$ of Fisher's equation, M of the equations of Pigou and Robertson, and n of Keynes' equation refer to the total quantity of money.

II. Dissimilarities:

Despite these similarities the two approaches have many dissimilarities:

1. Relative Stress of Supply and Demand for Money: Fisher's approach stresses the supply of money, whereas, the Cambridge approach lays more emphasis on the demand for money to hold cash.

2. Definition of Money: The two approaches use different definitions of money. The Fisherian approach emphasizes the medium of exchange function of money, whereas the Cambridge approach stresses the store of value function of money.

3. Flow and Stock Concepts: The Fisherian approach regards money as a flow concept; money is considered in terms of flow of money expenditures. The Cambridge version regards money as a stock concept; money supply refers to a given stock at a particular point of time.

4. Transaction and Income Velocities: Fisherian approach emphasizes the importance of the transaction velocity of circulation (i.e., V). The Cambridge Version, on the contrary, lays stress on the income velocity of the part of income which is held in the cash balance (i.e., K).

5. Nature of P: In both approaches, the price level (P) is not used identically. In Fisher's version, P is the average price level of all goods. On the contrary, in Cambridge version. P refers to the price of consumer goods.

6. Factors Affecting V and K: Fisher is concerned about the institutional and technological factors governing how fast individuals can spend their money (i.e., V). The Cambridge School, on the other hand, is concerned about the economic factors determining what portion of their wealth the public desires to hold in the form of money (i.e., K).

7. Relationship between M and P: The Fisherian approach maintains that any change in the money supply produces proportional changes in the price level. This is because Fisher believes that both velocity and real income are in the long run independent of each other and of supply of money.

In the Cambridge approach, the price level may change by more or less than the money supply; it depends upon what happens to the stock of non-monetary assets and their expected yields on which the Cambridge economists believed the desired cash balances depend.

8. Different Approaches to Monetary Theory: Both Fisher and Cambridge School led to the development of two different approaches to the monetary theory. Fisher's approach has given rise to an inventory theory of money holding largely for transactions purposes. On the other hand, the Cambridge approach has been developed into portfolio, or capital theoretic approach to monetary demand.