THE THEORETICAL LATTICE OF THE MONETARY AND CREDIT POLICY FOR THE FIRST HALF OF 1998-99*

A. Vasudevan

One of the distinguishing features of the monetary and credit policy for the first half of the current year is that it opens up the possibility of having a fairly structured theoretical framework of monetary policy that brings into fusion the various strands of thought from the economics of development and microeconomics to suit the changing economic circumstances. Such a framework, when constructed, would enable the monetary authority to generate a liquidity model that could be operated on almost a daily basis. Here an attempt is made to provide such a possibility. The endeavour is not to provide, as Keynes has once remarked, "a machine or method of blind manipulation which will furnish an infallible answer, but to provide ourselves with an organised and orderly method of thinking out particular problems …" relating to the working of the monetary system against the backdrop of the recently made monetary policy statement.

2. First consider the well-known Harrod Domar formulation that growth of an economy is dependent upon the investment rate and productivity of investment. The latter factor, often represented by Incremental Capital – Output Ratio (ICOR), is influenced by a host of factors such as technological advancement, skill formation, institutional changes, and the rate of investment itself. While there is a body of opinion that ICOR is represented best by investment itself, a number of country experiences, especially in East Asia in recent years show that the state of technology and institutional changes are areas of critical importance from the viewpoint of growth.

3. Let us assume the state of technology as given – an assumption that is reasonable for the short to medium term period. The institutional factor which has always been a matter of intense interest for economists ever since the days of Veblen, has, however, taken a dimension that is breathtakingly extensive and complex. To put it simply, it encompasses both real sector and financial sector reforms, with complex linkages within each of the sectors and between the two sectors. It is the complexity of the linkages that necessitates 'sequencing', an area in which there are no firm and reliable guideposts for action. But it is recognised in both academic circles and policy making bodies in India that reforms in both real and financial sectors will need to be undertaken in tandem to improve efficiency in the allocation of investible resources. While there has been a forward thrust in respect of both real and financial sector reforms since 1991, the pace of reforms has differed as between the two sectors. The recent monetary policy statement has gone further to intensify financial reforms. But what is important to recognise is that it placed emphasis on a crucial aspect of financial market reforms, namely, the one that has a bearing on market efficiency, besides touching upon aspects such as prudential standards, and banking

*** Presentation made by Dr. A. Vasudevan, Executive Director, Reserve Bank of India at the Faculty Meeting of the National Institute of Bank Management at Pune on May 18, 1998.**

structure. It is here the policy statement broke away from the constraints of the logic of monetary targetting, which has often been described as the strict version of monetarism. This point needs elaboration.

4. Market efficiency would improve considerably if institutional constraints on the functioning of markets are removed. The measures announced in the recent policy statement in respect of money and Government securities markets essentially belong to this genre.* By themselves, these measures may not be regarded as highly innovative, but they have to be undertaken as a matter of course to deepen and widen the markets. What has given critical thrust to market efficiency is in our opinion, the ingenious move toward greater interest rate flexibility and toward liquidity management. The deregulation of deposit rates together with a reduction in the maturity period of term deposits would significantly improve the liability management of economic units, while the measures to sharply reduce regulation of lending rates provide flexibility in market operations. The interest rate flexibility would thus facilitate asset-liability management and enable market forces of demand for and supply of funds to operate freely, giving in the process *information* to market participants about the true opportunity cost of capital.

5. The policy announcement also contained a clear message that liquidity would be so managed that banks would not find any difficulty in managing their assets, should their liabilities not change in tandem. Apart from announcing the reductions in the Bank Rate and pre-shipment export credit rate, refinance limits have been restored. These instruments together with the intention to use Cash Reserve Ratio (CRR) and repo rates for efficacious liquidity management, would influence market expectations.

6. The "information" content of and information flow from the policy announcement is available to all market participants simultaneously and symmetrically. But, as interest rates have become predominantly flexible, information on the movement of interest rates could be asymmetric. In the event, the economic unit which has greater information is expected to reap benefits in terms of improving its volume of business. Under such a framework, economic units would actively compete for business, reducing the spreads in the process. To overcome the problem of information asymmetries, the units would have to not only invest in information-seeking but also adopt a game-theoretic approach to optimise decision-making. But, for the system as a whole, optimisation would largely depend on the nature of contracts and the principal – agent relationship.

7. It must be noted that the quantum variable reckoned in the calculus of interest rate determination and the interest rate itself could undergo a change, if credit delivery systems improve. It may be recalled that the policy statement referred to the recommendations of the two committees on bank credit for agriculture and small scale industries in very positive terms.

*** They are: provision of liquidity support to primary dealers against the security holdings, reintroduction of 182-day Treasury Bills, holding of 364-day Treasury Bills auctions every month instead of every fortnight as of now, permission to Foreign Institutional Investors to transact in Treasury Bills within the approved debt ceilings, the possibility of using repos on a daily basis in near future, and use of both fixed interest and auction based repos, as appropriate.**

8. The interest rate flexibility could be expected to throw up information on the endogeneity of bank credit. Besides, in view of the auctioning of Government securities and the growing secondary market for gilts, the investment behaviour is also endogenised, subject to the limited constraint imposed by the Statutory Liquidity Ratio (SLR) requirement. As such, one could regard the overall bank asset portfolio as endogenously determined. This leaves out the Net Foreign-exchange Assets (NFAs) on the sources side of money supply. NFAs too are already endogenous, given the fact that capital account has become a critical part of the overall balance of payments and capital flows are largely dependent on the confidence of the external world in the working of the domestic economic system. In this context, one of the interesting aspects of the policy statement is a reference made to the need for discouraging short-term external liabilities and large unhedged exposures of corporate clients, respectively by effecting suitable changes in the interest rate ceilings on FCNR(B) deposits and by adopting appropriate risk management systems in banks' credit appraisals. This is an indication that capital flows are policy-induced and not solely based on economic fundamentals. In defence of this argument, the policy statement pointed out that the pressures on the exchange rate of the rupee in the second half of 1997-98 had to be addressed by a strong package of monetary policy measures on January 16, 1998, which as is well known, has helped to restore orderly conditions in the foreign exchange market.

9. The economic developments in 1997-98 provide a number of important indications that the analytical foundations of monetary policy based on pure monetary targeting are increasingly becoming vulnerable to financial shocks, in particular from rate variables. The sources of money supply changes are suggestive of the growing influence of endogenous factors. This cannot be dismissed lightly, even though the money demand functions appear to be stable in functional form, and much less so in numerical terms.

10. Interestingly enough, the policy statement provides a broad money (M_3) target for 1998-99 on the conventional parameters such as the income elasticity of money demand, anticipated growth rate, and a tolerable rate of inflation. At the same time, the statement points out that the emergence of financial innovations in recent years provides some evidence that interest rates too seem to exercise some influence on the decisions of economic units to hold money. One interpretation of such a stance of policy is that money supply target would be informational and not be an intermediate target. Admitting that the interest rate channel of transmission of monetary policy or the evolution of a monetary conditions index cannot be laid down in clearcut terms as yet because of the enormity of data base needed for it, the policy statement makes out a case for adoption of a multiple indicator approach as an initial measure.

11. The multiple indicator approach by definition will mean not merely updating of data on diverse areas - output, prices, interest rates, exchange rates, credit flows, money supply, capital flows, fiscal position, and trade, to name a few - but also a careful understanding of the underlying trends and inter-relationships. This is important because it is essential to move out of the existing operating procedure of policy, namely the bank reserves positioning to one that reflects market conditions. There is no denying the fact that as markets become increasingly

close and interlinked, as shown by the recent evidence of the relationship between money and foreign exchange markets, the rate variables would exert considerable influence on the economic units' decisions on the management of portfolios in which money would be only one of the substitutable assets.

12. An important implication of the policy announcement is that the adoption of the multiple indicator approach would help to work out the lags in monetary policy, the empirical dimensions of which are now *not* as clear in the case of the Indian economy as in respect of the developed economies. Proxying the lags by averaging or by moving average method could give rise to serious problems, for example the timing of policy actions, and using the information content of the feedbacks of policy during a year. The scope for research in this area is immense and the problems of data collection on high frequency basis on rates, institutional mechanisms and other macro indicators would have to be addressed quickly as much by adoption of new technologies as by focussed research efforts.