DEFICIT FINANCE AND DEVELOPMENT: 
AN ASPECT OF MONETARY POLICY IN DEVELOPING COUNTRIES

by

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B. S., Oregon State University, 1969

A MASTER'S REPORT

submitted in partial fulfillment of the requirements for the degree

MASTER OF ARTS

Department of Economics

KANSAS STATE UNIVERSITY
Manhattan, Kansas

1972

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ACKNOWLEDGEMENT

I would like to express my gratitude to members of my advisory committee -- Professors Edgar S. Bagley, George Montgomery, and John Nordin -- for having read and commented on the first draft of this report. In particular, I am indebted to Professor Nordin for having been willing to make himself available for discussion at all times. He also made several suggestions that I believe have substantially improved the presentation of the report. Needless to say though, that any loose ends or limitations in the presentation are entirely mine and do not implicate the views of my professors at all.
INTRODUCTION

The importance of monetary policy in economic stabilization has long been recognized in the developed nations. The long standing controversy in these nations has not been whether money "matters" in stabilization processes, but whether the contribution of monetary policy for short run stabilization is as significant as fiscal policy. There has long been an implicit tendency to minimize the contribution of monetary policy in raising the rate of economic growth and facilitating capital formation. In this context, the treatment given to monetary policy in its role as a stimulant of economic growth has been very sketchy. One finds such statements as "over the cycle, prices and output tend to move together," and that "a monetary change that provides vigorous (monetary) expansion is likely to promote a vigorous rise in both and conversely."¹ Such statements are qualified by conceding that, in the long run, a country's growth and development actually depends on such real factors as its technology, population, the skill of its labor force, and its endowment in natural resources.² Perhaps, the explanation for the existing ambiguity with regard to the specific role of money in growth processes may be found in what David I. Fand considers to be a dichotomy between monetary theory on the one hand and the historical and applied analysis of business cycles and stabilization processes on the other. "Monetarists follow the classical tradition in their theoretical analysis and treat the nominal money


²Ibid., p. 251.
stock as a kind of veil and stress that its influence is primarily on nominal
variables, with very little permanent impact on real endogenous variables.
But as they move from monetary theory into analysis of business cycles and
stabilization policy, the money stock is somehow transformed into a powerful
lever for determining income, employment, and the price level. The belief
that money primarily influences "nominal variables" and that the analysis of
production and distribution can very well be undertaken even without its use
permeated classical thinking, as is evidenced by John S. Mill's statement,
"there cannot be intrinsically a more insignificant thing, in the economy of
a society, than money; except in the character of a contrivance for sparing
time and labor . . . it only exerts a distinct and independent influence of
its own when it gets out of order."

In recent theories, monetary policy is not treated so lightly -- especially
in moderately shortrun analysis. The fact that it is offered as an alternative
policy choice to fiscal action when there are disturbances in the real (non-
monetary) variables suggests that money is expected to be more than a "veil".
And the rate of growth of the money supply is duly incorporated in growth
models along with other 'real' factors. However, the supply of money, unlike
other variables in growth models, is determined exogenously. There is always
the danger of error of either over estimating or under estimating the right
amount of money that an economy can usefully accommodate. If such an error
is made, it may set off undesirable repercussions in the economy.


As a result of this fact, the monetary policies of most developed countries have been aimed at preventing "money itself from being a major source of economic disturbance."\textsuperscript{6} In practice, this would mean the avoidance of excessive expansions or contractions in the quantity of money over any phase of the economic cycle. It is significant to note at this point that the major depressions and inflations that the developed countries have so far experienced have invariably been blamed upon the erroneous estimation of the right amount of money needed.\textsuperscript{7} With the advantage of hindsight, it seems it has always been possible to attribute the ravages of economic disturbances to the miscalculations of the monetary authorities. Monetary policy is also expected to "provide a stable background for the economy," so that, "... the consumers, employers and employee, can proceed with full confidence that the average level of prices will behave in a known way in the future."\textsuperscript{8} While such policy emphasizes actions intended to restrain money from exerting its own "independent influence", there is the additional belief among many economists that monetary policy can usefully be employed in "offsetting major disturbances ... arising from other sources."\textsuperscript{9} The controversy in the developed countries, and the lack of clarity in analysis that had been referred to earlier, has been over this last use of monetary policy. From recent developments, it appears, however, that the controversy is becoming redundant, due to a growing recognition that both fiscal and monetary policy may have to be used simultaneously in order to offset any severe imbalances in the economy.

\textsuperscript{7}Ibid., p. 3.
\textsuperscript{8}Ibid.
\textsuperscript{9}Ibid., p. 14.
But the aim here is to consider the role of one aspect of monetary policy in the developing countries. This may raise the question: why consider the role of monetary policy in the developing nations at all, if there is already a general theory of money? A general theory of money may well be applicable to both developed and developing nations in general terms, i.e., the direction of change in the money supply resulting from any particular policy action does not differ completely in the two economies. But analysis in general terms may not be very useful in indicating specific policy actions that would be effective in different economic environments. It will not be too gross a generalization to say that "monetary theory is . . . institutional in character, in the sense that the effect produced by money is conditioned by the socio-economic environment surrounding it."11 For instance customs connected with ways of holding money (demand deposits and currency) differ between the two kinds of economies. In the developing economies, currency constitutes the major part of the money supply, whereas in the developed economies, demand deposits account for the major part.12 This suggests that the ability of banks to create money is different in the two situations, because the public's demand for currency is an important factor that affects the supply of money. Therefore, the degree of applicability or the effectiveness of a monetary theory in explaining actual economic phenomenon in the two instances may not be identical if the institutional differences are ignored.

Some studies have indicated that the same economic variables explain the demand for money in both developed and developing economies. But the relative


significance of each variable explaining the demand for money may vary between the two cases.\textsuperscript{13} This fact, coupled with the realization that the emphasis on monetary policy (looked at in an historical perspective) has been different in developed and developing economies, gives the rationale for investigating the role of monetary policy in the respective economies separately.

An exhaustive investigation of the role of monetary policy in the developing economies will not be attempted here. Instead the report will examine the monetary aspects of deficit finance and discuss the theoretical and empirical support this measure has been accorded in the literature with regard to its alleged stimulating effect on economic growth and development. We have chosen to consider the influence of deficit finance on three variables that are often considered to be the chief engines of development. We shall discuss the influence of inflationary finance on each of the following:

1. The rate of growth of real domestic savings
2. The flow of foreign investment
3. The foreign exchange positions of developing nations

The selection of the last two variables will be justified in the appropriate sections (pp. 20 & 24 below). The report accepts Gardner Patterson's definition of deficit finance as "a net increase in the amount of money in circulation, such increase being the result of conscious governmental policy designed to bring about economic activity that the officials believe desirable and that otherwise would not have taken place."\textsuperscript{14}


Monetary Expansion and Savings

Economic development has accumulated its own history of experimenting with various 'novel' ideas that were proposed as short-cuts to a rapid rate of growth. Very often, these proposals did not have sound economic theory in their support, but were advanced as pragmatic approaches to situations which demanded immediate action when the appropriate conditions needed to take action were lacking. The idea of "forced savings" was one of these.

Forced saving may briefly be defined as an indirect way of transferring income from consumers to investors, using market prices as the principal instruments of change. Since usually more than half of total savings comes from the profits of investors (entrepreneurs), a society may be willing to undertake a transfer of resources from consumers to investors in anticipation of increasing the level of savings that would be forthcoming voluntarily. For this purpose, a government (or other central planning body) may encourage inflationary rises in prices deliberately by simply relaxing all or some of the instruments that control the supply of money. For instance, the central bank may lower the reserve requirements on all deposits in the commercial banks so that they can expand their lending activities to the public. The details of the process by which forced savings is obtained is clearly expressed in Don Patinkin's summary of the classical and neoclassical views on the subject: "The essence of this doctrine (forced savings) is that an exogenous increase in the quantity of money which accrues initially to entrepreneurs, or to those who lend to them, will increase the proportion of an economy's expenditures going into investment, and that the necessary corresponding increase in savings will be forced upon workers and fixed-income recipients by the inflationary price movements which the monetary expansion generates. In this way such an expansion
can increase the amount of real capital in the economy.\textsuperscript{15} The implicit assumption here is that investment is responsive to changes in the rate of interest through the schedule of the marginal efficiency of capital (i.e. investment is interest elastic) and that changes in the rate of interest significantly affect the volume of investment available at any time.

This is all right when one has in mind a developed economy with large capital market. However, in the developing economies it may not be feasible to rely upon the rate of interest to bring about the desired level of investment. Arthur I. Bloomfield expresses this view when he writes that "interest rates play a lesser role \textsuperscript{7} in the developing countries\textsuperscript{7} than they do in the more developed countries in influencing the volume and direction of investment."\textsuperscript{16} The rate of interest may be low, and yet the public may not take this opportunity to borrow for needed investment purposes. A study in one of the provinces in Ethiopia showed that farmers there preferred to borrow from relatives or, if this was not possible, from merchant money lenders at higher rates of interest than they could get from the National Development Bank.\textsuperscript{17} Usually, this is the result of lack of trust in the intents of the government. Since the Development Bank requires the farmers to mortgage their lands as collaterals for obtaining loans, they shy away from it regardless of the cost of borrowing it offers. The farmers can get loans from the merchants with less formality by simply promising to pay back loans after harvest. The final result, in the


\textsuperscript{17}Takew Birke, A Credit Study of Alemaya Farmers Cooperative Society; Bulletin, Dire Dawa, Ethiopia; Imperial Ethiopian College of Agricultural and Mechanical Arts, 1965.
event they are unable to pay back the loans, may be the loss of their property in both cases. But they seem to have to give away the titles to their property in advance. In such cases the availability of credit is more important than the cost.

In the classical and neoclassical use of the term forced savings, not only is the government able to generate "real capital", but it is also implied that rising prices may act as incentives for people to work harder and work more hours in order to maintain their accustomed level of living. Thus the government was envisaged as accomplishing, by a single "novel" action, what enormous outlays to persuade the public about the virtues of hard work and austerity in relation to national well-being might not have accomplished. The question now raised is: ignoring the possible results of inequities in income distribution among the different segments of the population, would the deliberate pursuance of an expansionary monetary policy really support the developmental effort?

The Optimistic View

In support of this position one economist writes: "One of the forms in which savings becomes available is through a limited expansion of the stock of money, which helps to finance investment in the economy thus to produce an expansion of output." He concedes that monetary expansion in excess of what the growth in real income warrants will certainly give rise to either excessive

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price increases or pressures against external reserves. But he seems to maintain that there is still a permissible range of monetary expansion beyond the level set by increases in real income which will not "create pressure" on either prices or external reserves. Convinced that this is the case, he attempts to determine the "proportions of investment that could be financed in a non-inflationary manner by the increase in the stock of money."20 The analysis is not quite similar to the argument for forced savings. Here, stable prices are also one of the goals of policy and inflationary tendency is presumed to be avoided. And yet the assertion is made that there is a level of investment that may be financed from "the savings implicit in monetary expansion."21

Another approach distinguishes between true inflation that is applicable to developed economies and that which is applicable to developing economies.22 In this analysis an inflationary situation may exist in the developed economies irrespective of the state of employment of the labor force. High unemployment levels and pressing excess demand for goods and services over the supply are not seen to be mutually exclusive. It is contended that inflation may begin even when the full employment of labor is not reached, as a result of miscalculation or mismanagement by the monetary authorities. According to this view, the latter situation would not be considered as an instance of "true inflation". True inflation can exist in the developed economies only when there is excess demand at full employment of labor. Similarly, there would be 'true inflation' in the developing economies when there is excess demand for goods and services.

20Ibid., p. 82.

21Ibid., p. 83.

over the supply with full employment of non-human resources (i.e. without reference to the state of employment of labor).

After this clarification about the nature of true inflation in the two economies, it is asserted that "lack of real capital, not of labor, is the ultimate bottleneck to real expansion relative to monetary expansion" in the developing economies.

The argument emphasises the dual character of investment in being able to enlarge both capacity and income. Capacity is understood to mean the ability to initiate and sustain any productivity activity that increases output in real (non-monetary) terms. A measure of the productive capacity of an economy would be the total amount of capital already invested in both human and non-human resources corrected by a productivity coefficient. It follows, then, that for correct analysis of deficit financing, it is necessary to determine whether, in the long run, investment may have a greater capacity-increasing effect than an income generating effect. It is further implied that if investment outlays are primarily concentrated in the formation of durable productive equipment, the capacity-creating effect of investment is likely to blunt any inflationary tendency that may be associated with the monetary expansion. Unfortunately, the inflationary tendency is not really blunted even if capacity-creation is increasing. Taking the view that inflation arises when people demand more goods and services than are currently being produced, prices will keep increasing until either the rises in incomes are taxed away or supply catches up with the demand. Capacity-creation does not take place without simultaneously increasing incomes. The increase in output (as a result of larger capacity) relative to increases in income can potentially mitigate the inflationary tendency; but as it is argued elsewhere in the report (p. 14), income has to

23 Ibid., p. 145.
24 Ibid., p. 145.
be seen in relation to output of consumable goods. And since in the developing countries the expansion of this sector is rather slow, the brunt of inflation may not be completely avoided.

The argument also appears to be inadequate in another respect. It dismisses all relevant constraints, other than capital, that are responsible for the slow rate of growth. As one economist has pointed out, "more recently, the importance of capital has been somewhat toned down, and the complementarity of resources or composite forces of development has been increasingly emphasized . . . this suggests that other factors have been more important than capital."²⁵ Often, it is the labor skills, technology, general economic and political organizations, and educational levels of the population, among other things, that determine the rate of development. It would not be useful to confine attention to the "capacity-creating" ability of a monetary expansion to the exclusion of other relevant factors which, if present, simultaneously, determine the nature and extent of development.

Optimistic View (With Qualification)

Another group of economists neither endorse inflationary finance as beneficial to economic progress nor reject it altogether, on the basis of conventional theoretical analysis. They contend that no categorical statement can (or must) be made about the merits of this policy without at the same time examining how the deficit is generated and what other things are happening concurrently. They suggest that the effectiveness of inflationary finance "is a question that can be resolved only by seeing in particular cases what

is accomplished by an investment inflation and what its consequences are."\textsuperscript{26} Or, as Patterson writes, "No a priori answer can be given \textit{to the question of deficit finance}. It depends very much on the structure and organization of the particular economy, on the social and political conditions then ruling, on whether the crops during this period have been especially good or bad or just average, etc."\textsuperscript{27}

Benjamin Higgins also voices this belief when he dismisses any uncritical acceptance of the argument for inflationary finance by saying: "the concept of forced savings belongs to that era of confusion in the theory of savings and investment"\textsuperscript{28} when the difference between ex ante and ex post saving and its relation to investment was not correctly understood. He believes that there is an "optimal pattern" of inflation and that this optimal level is different for different nations. It is seen to depend on such things as the strength of the money illusion, and the point where speculation begins to take the place of productive activity and that these in turn depend on the "reactions of individual workers, consumers, and investors in particular societies at particular times."\textsuperscript{29}

He examines the experiences of several countries to see if periods of high inflation were also periods of high rate of growth and to compare the growth rates with the inflation rates. He concludes that there is no significant correlation between the growth rates and the inflation rates that


\textsuperscript{27} Patterson, p. 183.


\textsuperscript{29} Ibid., p.
would emphasize the positive aspect of prolonged inflation. Typical of this group of economists, Higgins does not dismiss the whole notion as irrelevant. He suggests that "although it is difficult to say precisely what the optimal pattern of inflation would be, there is reason to believe that it would take the form of a 'step function', with short periods of fairly rapid price increase alternating with long periods of price stability." Thus he implies that a skillful manipulation of the money stock can have positive effects in the form of increased savings and more rapid development. Such additional complementary conditions as weak labor organizations and growth conscious entrepreneurial class that is always anxious and willing to channel the increased gains that result from rising prices to productive activity, are believed to support the development effort. In subsequent pages, it will be indicated that these complementary conditions are far from being prevalent in the developing countries.

A Critical View

Other economists are often more critical about the results of deficit finance in the developing countries. They do not view this practice as an isolated policy choice that would be relevant regardless of the type of economic environment that it is applied to. They point out that deficit finance can be of value only when an economy is confronted with inadequate effective demand in relation to potential supply (i.e. where there is the capacity to call forth the necessary skill and technology to accomplish full-employment of labor). The question is not, they frequently suggest, whether it is beneficial to capacity-creation if a plant for the manufacture of farm machinery is constructed instead of a pyramid built. It is only the developed nations that

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30 Ibid., p.
have this type of technological choice. "Most, if not all less developed countries, do not possess to any quantitatively significant extent the sector producing machinery and equipment ... Bank credit ... can hardly transfer resources to machinery and equipment production just because this sector is, for all practical purposes, absent."31 Another economist adds: "Economic underdevelopment means a lack of the capacity for economic growth; without the capacity to grow, a high level of income ... will not generate a continuous process of cumulative expansion."32 The critics contend that the inflationist argument for forced saving arose as a "false parallelism between the policies recommended in advanced economies in a state of depression on the one hand, and underdeveloped economies plagued by extensive open and disguised unemployment on the other hand."33 These economists emphasize the structural differences between developed and developing economies and urge that care be taken in any policy prescription. They point out that in developed countries, there exist many built-in stabilizers such as highly progressive tax systems and high marginal savings rates.34 Furthermore, it is suggested that it is possible to expand both consumption goods and producers goods more rapidly. The lag between the outlays of capital made to revive the economy and the actual use of resources is not very long.

Developing countries lack these kinds of accommodating opportunities.

The tax systems are usually deficient; since there is a non-monetized sector


34 Ibid., p. 9.
in the economy, agricultural production may not be elastic enough for domestic consumption; marginal propensity to save is low and there is not an efficient mechanism that would channel private savings into productive investment. Even assuming that a substantial part of the work of development is undertaken by the government and that most productive resources are under its direct control, the situation may not be remedied. In developing countries, the usual criterion for the choice of investment plans is the contribution to the development effort and not simply the profit rate.  

35 That is to say, among a set of possible investment outlets, the ones that promise higher returns are not necessarily invariably given priority in selection. There is the tendency for administrators to try to evaluate all investment outlets in terms of a subjective value judgment as to their social usefulness. The price mechanism does not direct resource allocation (or is not allowed to do so). Activities which "increase the production efficiency of the working force but are not undertaken by private entrepreneurs because of the long gestation period and lack of immediate returns,"  

36 are usually embarked upon initially. These include investments on infrastructures such as the development of transportation systems, power, and land surveys to study the potentials for mineral resources that may be profitably exploited in the future. In such cases, there is an inevitable delay between the outlays on some socially useful productive investments and the flow of goods available for consumption. This type of built-in lag between expenditures and revenues is likely to encourage an inflationary tendency. Thus, what might be stimulating effects of monetary expansion -- favorable to highly productive

35 Ibid., p. 34.

activities in developed countries -- is rendered inoperative in developing countries because of the underlying structural weakness of these economies.

Several other economists are not satisfied with merely pointing out the shallowness of the theory of inflationary finance. They want to convince policy makers that the object of policy should be that of the control of inflation since the increment to the growth rate that is realized is insignificant compared to the undesirable repercussions it starts off. H.S. Odeh writes, "by distorting price relations and undermining general confidence, prolonged inflation tends to direct investment away from strictly productive sectors and thus slacken growth."[37] Another economist specifically enumerates the unproductive investment activities that may predominate by pointing out that "luxury types of consumer durables, fancy apartments and commercial structures, and real estate are apt to get the lion's share of investment from inflationary profits."[38] Bent Hansen is even more forceful in his denunciation of the theory. After deriding this practice as a "highly wasteful and costly" method of creating increased domestic savings, he goes on to say that "a careful consideration of the theoretical basis for the doctrine that inflation induces growth will show that inflation need not necessarily or exclusively lead to forced savings,"[39] but may instead altogether undermine the investment plans.


There has also been an attempt to show, in theory, the weakness of an inflationist policy in stimulating economic growth. In order to relate the rate of inflation to the rate of monetary expansion and the rate of growth induced by deficit finance, Robert Mundell starts out by differentiating the income equation of exchange with respect to time

\[ MV = PY \]  

and gets

\[ \frac{1}{V} \frac{dV}{dt} = \Pi + \lambda - \ell \]  

where \( M \) = the money supply; \( V \) = velocity; \( P \) = price level; \( Y \) = output, and \( \Pi \), \( \lambda \), and \( \ell \) are rates of inflation, growth, and monetary expansion respectively.

He further assumes the following relations

\[ Y = \phi K \]  

\[ R = rM \]  

where \( \phi \) = productivity of capital and is taken to be constant; \( K \) = capital stock; \( R \) = bank reserves; and \( r \) = the fractional reserve ratio, assumed constant.

Government is the only investor and all investment is assumed to be financed by the central bank. The real value of government investment would then be

\[ \frac{G}{P} = \frac{1}{P} \frac{dR}{dt} = \frac{dK}{dt} \]  

where \( G \) = government investment

By differentiating equations (3) and (4) with respect to time and combining them with equation (5), he obtains an expression which relates the rate of growth and the rate of monetary expansion:

\[ \lambda = \phi \ell \]  

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Initially, Mundell assumes income velocity to be constant and from equation (2) obtains

\[ \Pi = (\frac{v}{x^n} - 1)\lambda \]  ---------------(7)

Substituting equation (6) into equation (7), he writes an equation that relates the rate of inflation to the rate of growth of income

\[ \Pi = (\frac{v}{x^n} - 1)\lambda \]  ---------------(8)

Finally, he gives up the assumption about the constancy of income velocity when there is an inflation, and instead assumes a linear relationship between velocity and inflation.

\[ v = v_0 + \eta \Pi \]  ---------------(9)

where \( v_0 \) = velocity at zero rate of inflation; and \( \eta \) = constant. When he solves equations (8) and (9) simultaneously for \( \Pi \), he gets

\[ \Pi = \frac{v_0 - v}{x^n - \eta \lambda} \]  ---------------(10)

His intention is to show that "the inflation-growth thesis has little empirical significance even under conditions favorable to the argument."\(^{41}\) Therefore, he lists the typical ranges of values that each of the terms in the equation take (\( v_0 \) is between 3 and 5, \( \phi \) between 2 and 5, \( r \) between 1/10 and 3/10, and \( \eta \) is taken to be 10) and then chooses lower limit for \( v_0 \), and upper limits for \( \phi \) and \( r \) to get the values of \( \Pi \) and \( \lambda \) shown in the table below.\(^{42}\) (The figures indicate percentages of increase.)

<table>
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<tr>
<td>0.25</td>
<td>5.7</td>
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<tr>
<td>0.50</td>
<td>14.25</td>
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<tr>
<td>0.75</td>
<td>28.5</td>
</tr>
<tr>
<td>1.00</td>
<td>57.5</td>
</tr>
<tr>
<td>1.25</td>
<td>142.5</td>
</tr>
<tr>
<td>1.50</td>
<td>\infty</td>
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\(^{41}\)Ibid., p. 97.

\(^{42}\)Ibid., p. 103.
The large differences in the percentages of increase of the growth rates and inflation rates led Mundell to conclude that the "growth argument for inflationary finance is not . . . strong."\textsuperscript{43}

It is apparent from the preceding discussion that most of the arguments were aimed at minimizing the benefits of manipulating the price mechanism in order to force the society to save more than it is voluntarily willing to save. The validity of the classical view that a society can save for purposes of productive investment only by postponing consumption is not denied. But the choice of deliberate inflation as a policy action is seen to be inefficient and detrimental to development plans. Furthermore, inflationary finance is opposed on the basis of the biases it introduces into the distribution of income. It is pointed out that as long as rapid increases in prices outstrip increases in wages, the wage earners and the fixed-income groups in the population will, alone, be carrying the burden of development. This may "run counter to the economic welfare objectives of the government and thus be unacceptable."\textsuperscript{44}

At this point it is important to isolate and identify the group that undertakes the decision to invest productively. Is investment carried out by the government or by the private sector? If the private sector does all the investing, then it is clear that the businessmen are given a highly preferential position in terms of income distribution. If, on the other hand, the government is the exclusive investor (assuming it has an effective means of discouraging speculation), then the burden of the cost of development will be on the society as a whole and inflation may fairly be regarded as the social cost of economic

\textsuperscript{43}Ibid., p. 102.
\textsuperscript{44}Patterson, p. 184.
development for that particular society. In addition, if the claims for rising prices as incentives for harder and more hours of work are realized, the benefits of government participation may be substantial. Development plans are more likely to be fulfilled according to schedule, especially if they are reasonable. But for the situation in most developing countries whose economies are characterized by the free market system, albeit with a large government sector, the problem has to be settled in a different manner. There is always the danger that the greed of the profit makers will drive prices to unbearable heights. They can manage to exacerbate the inflationary spiral by simply holding on to their output in anticipation of further price increases. Moreover, the group that benefits from rising prices may not be completely trusted to reinvest its profits in projects that are reasonably believed to create long run benefits for the society.

Effect of Inflation on Foreign Investment

So far in the analysis the discussion has been confined to the repercussions of an expansionist monetary policy on the domestic front. Nothing has been said about its influence on foreign capital movements. This influence cannot be ignored, because many development economists have emphasized the importance of foreign investment in economic development. Some of those who stress the importance of foreign investment in economic development point out that several of "the chief industries, especially export industries . . . have been built up largely by direct foreign investment." Foreign investment is seen to "introduce new industries or improved methods. It provides employment and sometimes specialized technical training for local workers. It contributes

to local public revenue; if it establishes or expands export industries, it increases exports and thereby foreign exchange-earnings."\textsuperscript{46} Others argue that these peripheral benefits may be important in some respects but they do not aid the developmental effort because "the level of savings that can be tapped and diverted into the channels of capital formation is negligible."\textsuperscript{47} Macbean seems to support this view when he writes that "capital accumulation in the average underdeveloped country is still very largely a matter of domestic savings. Foreign ... private investment form only a very small contribution to total saving and investment."\textsuperscript{48} Nevertheless, so long as policy makers in the developing countries believe that foreign investment is essential to their growth and try to attract it to their borders by giving tax concessions, the fact that very little of it moved there in the past does not negate its importance in policy considerations. Whenever planned growth exceeds the amount that domestic savings can finance, a country will welcome foreign capital. The search for foreign capital continues "until such times as a country's marginal rate of savings should exceed the required rate of investment."\textsuperscript{49}

The significance of this source of capital in economic planning may be estimated from reports of the figures for the early 1960's. ". . . the net inflow of foreign resources amounted to about 5 percent of the GNP in developing

\textsuperscript{46} Ibid., p. 69.


countries and accounted for 28 percent of gross investment."50 The question that may be considered now is: what is the influence of the recurrence of inflation in the domestic market on the flow of foreign investment?

To answer the question, one has to look into the factors that determine the flow of foreign capital. Nurkse informs us that "the conventional theory of . . . capital movements is that in countries where there is little capital in relation to land and labor, the marginal productivity and hence the yield of capital will be high, and that, . . . capital would move to these countries from the areas where it is relatively abundant."51 However, the usual theory is restricted in application because there are "various national and international obstacles of a cyclical, institutional, and ideological in nature which thwart"52 the free movement of capital. Any discussion about the influence of an economic action on the flow of foreign capital must therefore remain deficient in application as long as there are non-economic factors that interfere in the process. It is possible for the moment to ignore these non-economic factors on foreign investment and assume that the "volume and flow of foreign investment is largely a function of its expected returns."53 But does inflation increase the returns on investment? As long as there are any lags between rises in prices and increases in costs of production in the form of rising wage demands, inflation does increase the returns on investment. However, the actual returns to the foreign investment would increase only if the economy were a static one. It being dynamic there are other things that are


52 Clairmonte, p. 3.

happening at the same time when prices are rising. A depreciation in the rate of exchange is an almost certain consequence of a rapid rate of inflation. It follows then that the returns to the foreign investors would depend on the magnitude of the relative changes in prices and the exchange rate. Some economists hold that the "exchange depreciation is likely to be more severe than the increase in prices induced by inflation."\textsuperscript{54} New foreign investment is likely to be discouraged, because the foreign firms that establish plants in the developing countries have often larger parent plants in the developed nations. Attempts to develop the local market by reinvesting profits in the region but in different industries are not frequent. Usually, the more pressing concern of the parent firm is to have the branch plants make profits and send them to the management in the parent plant. But exchange depreciations in excess of the inflationary rises in prices would reduce substantially the funds flowing to the parent plants and might dampen any plans for new investment projects in the developing economies.

There are two other indirect ways in which a country may reduce the flow of foreign capital into its borders if it pursues inflationary finance as a matter of policy. The need for foreign capital in the form of aid, loans or even private investment is estimated on the basis of the previous flow of these resources into a region. A region's absorptive capacity, i.e., its ability "to employ financial capital in a way which will result in an increment to the net national product, the discounted value of which is equal to the amount of financial capital employed"\textsuperscript{55} is presumed to determine the magnitude and flow

\textsuperscript{54} Ibid., p. 13.

of foreign capital to the developing regions. This idea is introduced here, not because it is believed that the concept is essential to the understanding of economic development, but because it is taken as one of the criteria for the disbursement of capital by the developed nations. A region's success in maintaining stable economic conditions in terms of prices and the employment of productive resources is taken as an indicator of its absorptive capacity. And the successful employment of productive resources is estimated on the basis of the flow of foreign capital into the region in the recent past. If inflationary monetary expansion precipitates a severe reduction in the balance of payments and unacceptable deterioration in the value of the currency of a region, foreign capital is likely to be discouraged. This tends to reduce the future flow of foreign resources as long as there is believed to be any correlation between "absorptive capacity" and foreign capital flows in recent past.

The second indirect way in which foreign capital may be reduced concerns the possible political repercussions of a continued rise in prices. A condition frequently mentioned as a prerequisite for foreign capital flows is political stability.\textsuperscript{56} If the stability of a political order is undermined by recurring inflationary pressure, both foreign private capital and foreign government loans may become difficult to obtain.

\textbf{Effect of Inflation on Foreign Exchange Reserves}

Developing countries as a whole are capital goods purchasers from the advanced countries. Some of these countries have shown an impressive rate of

\textsuperscript{56}Higgins, p. 569.
growth mostly because they have been able to import capital from outside. Thus, twentieth century development programs, unlike their counterparts in the earlier centuries, do not have to depend on the generally slow advancement of science and technology. The reason for this is that "many goods have strategic importance in the efficient industrial growth but cannot be produced domestically in the early stages of industrial development." Both capital equipment and production techniques have to a certain extent been able to be procured by purchases. While this has the advantage of substantially increasing production and efficiency, it requires considerable amount of exchange items (goods) to pay for the productive equipment thus bought. Developing countries unfortunately, are known for their subsistence level of economies and the general lack of substantial amounts of extra produce of either raw material or agricultural goods to earn more foreign exchange. And in those instances where there is the capacity for exporting primary goods, the foreign exchange earning is still precarious. Being mostly dependent on exogenous factors such as the weather or economic conditions in the developed nation, "it is generally accepted that the prices of primary products vary much more sharply from year to year than do the prices of most manufacturers." In addition, analogous to what is known as the "demonstration effect" in consumption within a nation, some economists believe that the "consumption functions of different countries are in some degree interrelated." The desire to adopt the life style that prevails in the industrial countries is very great. As a consequence, developing economies are

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58 Macbean, p. 23.
59 Morkse, p. 575.
plagued by what is often called the "foreign exchange" bottleneck even when they are pursuing policies that are by their own estimate not too ambitious. Already there is the tendency for "economic development, whether it is financed by internal real savings or by imports of foreign capital to be always accompanied by inflationary pressure." 60 The result is an overvalued exchange rate with, unless effectively discouraged by the government, "a chronic tendency for speculative flights of capital abroad." 61 Whatever funds may be available, instead of being used to increase production for exports "are diverted into the purchase of gold and jewelry and real estate and into speculative activities." 62 This imposes a severe limitation on the developing country's ability to earn foreign exchange. If there is an inherent tendency for prices to rise in the process of economic development, then the developing countries do not want to exacerbate the situation by choosing an inflationary monetary policy. The export products (whatever their nature -- agricultural products or raw materials) can be in a strong competitive position in the international market only if prices are kept low. Besides, there is a good probability that domestic consumption will be diverted to imported goods if prices are excessively high. 63 In practice, of course, this can be discouraged as long as developing countries, being not altogether free-market oriented, can impose import restrictions to limit purchase of foreign goods. Nevertheless, the success of a preventive measure does not solve the problem of lack of foreign reserves that is

62 Ibid.
essentially caused by lack of competitiveness of a country's produce in the world market. It follows then, that there is a good argument for directing policy toward "maintaining external equilibrium and relative price stability," in order to achieve satisfactory rates of growth. This only underscores the fact that development programs in the developing countries depend on the purchase of capital equipment from the developed countries and that the money for the transaction will be available only if the countries manage to remain competitive in selling the export products in which they have a comparative advantage.

Concluding Remarks

Having raised the question of the comparative role of monetary policy in developed and developing nations at the beginning, it may be appropriate to reconsider the comparison now. The effects of excessive monetary expansion on what are often known as the three main engines of economic development has been argued to be not very significant. (1) There cannot be long lasting benefits that would derive from "forced savings" and that would not at the same time trigger an undesirable upward price spiral; (2) the effect on foreign investment is equivocal at best; and (3) it reduces a country's foreign exchange earnings by making its exports less competitive in the world market. Several economists cited in the forging discussion emphasize the contention that it is only when there are unemployed (idle) resources, and the economy is operating under less than full capacity, that deficit financing can have any beneficial effects. "No amount of juggling with monetary measures can

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64Zolotas, p. 120.
successfully deal with the problem of inadequacy of resources appearing as real bottlenecks obstructing production."\textsuperscript{67} The problems of developing countries are often not those of idle capacity, but lack of capacity to generate growth itself. The "bottlenecks" facing these countries may not always be financial, as one economist points out: "There is no lack of instances showing that because of the shortage of technical personnel, the basic survey and design required for the implementation of a project were delayed and the funds allocated from the budget unspent."\textsuperscript{68} Emphasizing the fact that money can have an invigorating effect on the economy only when there are unutilized resources, Prasad observes that "money is related to the economic system not as a causative factor but as a conditioning one. It cannot generate productive capacity."\textsuperscript{69}

If this is the case, it must then be concluded that the general aims of monetary policy in developing countries cannot be basically different from those of the developed countries. Even when conceding that priorities among the goals of economic policy (in the developing countries) may often not be the same as in industrial countries,\textsuperscript{70} the aim of monetary policy cannot be different. The divergence in the pursuit of monetary policy comes in the methods that are employed rather than in the general goals. Open market operations for the purpose of influencing the quantity of money may not be effective in the developing nations because "an open market policy presupposes

\textsuperscript{67}Prasad, p. 4.
\textsuperscript{68}Yang, p. 72.
\textsuperscript{69}Prasad, p. 4.
\textsuperscript{70}P.D. Hajela, Problems of Monetary Policy In Underdeveloped Countries, Bombay: Lalvani Publishing House, 1969.
the existence of a money market, which in underdeveloped countries is either limited or nonexistent. The quantity of money in the developing nations is also believed to be little affected by changes in the rates of interest. For changes in the rate of interest to be of any significance, the cost of credit must be taken as influential in businessmen's decisions to invest. In these countries, internal markets being largely firmly protected, higher costs are usually shifted on to the consumer. It is also believed that changes in interest rates needed to bring about changes in the quantity of money would have to be so great as to be politically unacceptable. The most effective method (and the one more commonly used to change the supply of money in the developing countries) is changing the reserve requirements of the commercial banks. By regulating the commercial banks' abilities to create credit, the central banks exercise reasonable control over the supply of money.

Finally, the contributions of deficit finance to economic growth cannot be usefully assessed without considering all the factors that are necessary for economic development in relation to prevailing conditions in each developing country. Nevertheless, it is believed that excessive expansions in the money supply may defeat its intended purpose and undermine the orderly and gradual progress toward social and political improvements.

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71 Horowitz, p. 103.

72 Khatkhate, pp. 140-141.

73 Horowitz, p. 103.
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DEFICIT FINANCE AND DEVELOPMENT: 
AN ASPECT OF MONETARY POLICY IN DEVELOPING COUNTRIES

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B.S., Oregon State University, 1969

AN ABSTRACT OF A MASTER'S REPORT

submitted in partial fulfillment of the

requirements for the degree

MASTER OF ARTS

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KANSAS STATE UNIVERSITY
Manhattan, Kansas

1972
The report starts out by noting (in general terms) the institutional differences that exist between developed and developing economies. It takes these institutional differences as sufficient justification for isolating and determining the influences of economic policy on the developing economies irrespective of what these influences are known to be in the developed economies. It argues that what may be applicable and effective in the latter may not be helpful in explaining economic phenomenon or suggesting policy recommendations in the former. The aim is then narrowed to the investigation of the use of deficit finance in increasing the rate of economic growth of the less developed countries. An expansionist monetary policy is assumed to be the primary source of financing the deficit. Then three factors that have long been recognized as important "engines" of economic development are examined in relation to the influence of inflationary finance. These three factors are:

1. The rate of domestic savings.
2. Flow of private foreign investment.
3. The reserve positions of developing countries.

A review of the literature presents widely differing views on the subject, ranging from those that envisage the positive uses of inflationary finance in inducing forced savings from the community, to those that are highly critical of the method on the ground that it does not achieve the objectives it attempts to achieve.

There appears to be a consensus on the stimulating potentials of deficit finance when there are unemployed (idle) resources in the economy, as there would be in developed nations during a recession. However, the presence of such unemployed resources in the developing nations is not readily admitted by many economists. Several of them see in underdevelopment a basic lack of the capacity
to generate growth and sustain it. They emphasize the complementarity of the factors that determine the nature and rate of economic growth and point out that availability of money would not be very important unless other factors are also present.

The report suggests that inflationary finance
1. May not significantly affect the level of domestic savings
2. Does not necessarily encourage the flow of foreign investment
3. Exacerbates the foreign exchange reserve difficulties of a country by reducing its export earnings due to lack of competitiveness in the world market

It concludes that monetary policy in the developing economies is not basically different from those in the developed economies. In both, the objectives pursued are the same. The differences are in the order of priority that is given to any one objective and the techniques and instruments relied upon to accomplish it.