



ECONOMIC  
AND  
SOCIAL COUNCIL



GENERAL  
E/CN.12/BRW.1/L.3  
E/CN.12/521  
25 April 1959

ENGLISH  
ORIGINAL: SPANISH

ECONOMIC COMMISSION FOR LATIN AMERICA  
BUDGET RESEARCH WORKSHOP

Sponsored jointly by the Bureau of Technical Assistance Operations (TAO), ECLA, the Bureau of Economic Affairs and the Public Administration Division of the United Nations

Santiago (Chile), 26 May to 6 June 1959

THE FISCAL BUDGET AS AN INSTRUMENT IN THE  
PROGRAMMING OF ECONOMIC DEVELOPMENT

NOTE: The present version of this document is provisional and subject to modification.

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## I. INTRODUCTION

### 1. Need to readjust the machinery and procedures used in the public sector

As a result of historical circumstances which are a matter of common knowledge, in many countries the public sector has come to absorb a considerable share of the national product. Latin America has been no exception. In the countries of the region, at the present time, the expenditure of the public sector ranges from 15 to 23 per cent of the product.<sup>1/</sup> Any body, of whatsoever kind, which handles a proportion of the country's productive resources so large as to make it the biggest consumer, the leading investor and the principal employer, is under the obligation to pursue an unremitting search for procedures which will enable it to operate with steadily increasing efficiency.

As the activities of the public sector have expanded, they have also become more complex. Hence the need to reconstruct administrative machinery and procedures. As often happens in such cases, modern thought has been slow to realize the necessity for these readjustments. Although quantitative and qualitative changes in the functions of the public sector have been taking place since the dawn of the current century, the first university schools of public administration date from the Second World War.

The initial tendency of the systematic efforts made to readjust administrative structures and procedures was in the direction of rationalizing this type of activity mainly by the application of the same principles as were proving so successful in private enterprise. Only in recent years has there been a movement towards envisaging the problem from the much more comprehensive standpoint of the efficiency of the Government as a mechanism for the devising of economic and social policy. The progress achieved is modest but encouraging. There are several signs that a more active participation of the public authorities in the process of perfecting the new instruments and adapting them to practical needs will be reflected in further advances, to the benefit of the community. The object of the present document is precisely to draw the attention of

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<sup>1/</sup> See Economic Survey of Latin America, 1955 (E/CN.12/421/Rev.1), United Nations publication, Sales No: 1956.II.G.1, p. 117.

Latin American statesmen to some of the developments which might usefully be applied, especially in the field of budgetary practices.

The budgetary practices most widely adopted in Latin America are not without serious defects, such as those to be studied in the present report. Few people clearly understand what failure to remedy them really means for the progress of the Latin American countries. It is therefore perhaps worth while to cite the fact that, although public investment constitutes over 40 per cent of total annual investment in several of the Latin American Republics, scarcely any of them have at their disposal a mechanism for reaching objective decisions as to the way of distributing the resources in question which will best promote the growth of the national product. This seems paradoxical in countries where the need for development is so great and investment resources are so limited.

The solution of the problems discussed in the present report calls for new techniques, expeditions, administrative procedures and properly qualified personnel. To tackle them from any single one of these angles would be useless. This is the reason for the efforts made by the Fiscal and Financial Branch of the United Nations through the budget seminars that have been held in several parts of the world - efforts with which those of the secretariat of the Economic Commission for Latin America are now associated.

## 2. Influence of Government decisions on economic development

A large proportion of the decisions adopted by Governments, especially those which most directly influence economic phenomena, find expression in their fiscal budgets. Hence the assertion in technical circles that the fiscal budget represents the Government's plan of action for the period which it covers.

This plan of action inevitably exerts a supremely important influence on the economic decisions of the private sector and on the course of economic events in the country as a whole. The level of public expenditure may be taken as a case in point. What the Government spends represents a demand for goods and services which combines with the demand generated in the private sector to constitute aggregate demand. Thus, if fiscal

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expenditure veers in a given direction, total expenditure will tend to move the same way.

Changes in global demand have noteworthy repercussions on economic development, since, if the former expands, there will be a tendency to effect new investment to satisfy it, whereas if, on the contrary, it contracts, private investment too will tend to diminish. As economic development largely reflects the accumulation of capital, both public and private, it is decisively affected by variations in Government expenditure.

Again, if all that were needed to stimulate investment were an increment in aggregate demand, nothing would be easier than to accelerate development by permanently increasing the expenditure of the State. But this is not the case. While it is true that the growth of demand is an essential requisite for the expansion of private investment, its influence does not extend beyond certain limits. Once these are passed, investors will not be able to effect further investment even if they wish to do so, since they will find that there is a shortage of foreign exchange, or a lack of skilled labour, energy, cement, or any one of the physical resources that capital formation requires. If the growth of demand outstrips that of the supply of such resources, the result will be price inflation, or a balance-of-payments deficit, or a combination of both these disequilibria.

It must also be borne in mind that State expenditure is not the only determinant of the evolution of internal demand. Exports and the private sector's own investment partly account for the process. Consequently, it may happen that in certain periods world economic conditions allow exports to develop sufficiently fast to encourage employment of all the available economic factors. In that case, an increase in State expenditure may create inflationary or balance-of-payments distortions instead of stimulating private investment. On the other hand, if exports contract from one period to another, their depressive influence on internal demand can be offset by an appropriate fiscal expenditure policy. The same thing may occur if private investment is reduced. Consequently, the decisions of the State with respect to its level of expenditure influence not only the country's rate of development but also its stability.

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This latter - which implies the absence of inflation, of balance-of-payments disequilibria and of unemployment - has repercussions in turn on economic development. In an economy which is very unstable or is affected by chronic inflation, investment tends to decrease or its average productivity to decline, whereas this does not happen in a thriving economy.

Government decisions relating to the composition of public expenditure also have an effect on economic development. Given a total volume of expenditure, the larger the proportion allocated to investment and the smaller the share of consumption, the more rapid will be the rate of development, not only because of the direct contribution to national capital accumulation thus implied, but also because public and private investment are in some measure mutually complementary. For example, when the State builds a road, executes an irrigation project or constructs a hydroelectric power station, private entrepreneurs generally place complementary investments which they probably would not effect but for the facilities created by the installation of new basic social capital.

The capital formation process is likewise very closely dependent upon the decisions adopted with respect to the financing of State activities. Here positive and negative influences are observable. For example, in most Latin American countries the public sector invests a higher proportion of its income than the private sector, which suggests that income transfers in favour of the public sector by means of taxation may result in an increment in total national investment. On the other hand, taxation undoubtedly restricts private investment, and its effect may be so great that heavier taxes, even if the State invests the whole of the increment, may jeopardize total capital formation.

If the tax burden is not excessive, however, the effect of taxation is more likely to make itself felt in the channelling of investment towards the different sectors of production than in its total volume. In this context, the role played by customs tariffs, both in Latin America and in other parts of the world, has been decisive. But for them, the proportion of total investment earmarked for manufacturing in the last twenty years would undoubtedly have been much smaller.

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Wherever it affects the relative profitability of the various investment opportunities, taxation necessarily causes a redistribution of the resources invested. This relative profitability may be influenced in several ways. For example, any form of taxation, even a single-rate tax, may raise the costs of the various economic activities in differing proportions. Social security contributions operate on these lines, because the percentage of production costs represented by wages varies from one product to another. Taxes may also affect the relative profitability of investment in so far as they bring about different changes in demand for the diverse lines of production to which they are applied. Single-rate taxes levied on a series of different products alter their prices, with the consequent repercussions on demand, according to the price-elasticity of each. Profitability will be more seriously affected in the case of enterprises producing goods with a high coefficient of price-elasticity than where demand for the goods produced is relatively insensitive to price fluctuations.

The repercussions of Government decisions on economic development also derive from the influence exerted by taxation and the provision of public utilities on income distribution. When this latter alters, the composition of demand changes, since the higher-income groups do not buy the same goods as people in the lower-income brackets. A modification in the structure of demand necessarily leads to a correlative rechanneling of investment.

An orderly economic development process would seem to require a gradual redistribution of income. The less advanced the stage of development that a country has reached, the greater are the differences observable between the productivity of agricultural and of non-agricultural workers. This is inevitably reflected in widely differing income levels. As the country develops, sectoral differences in productivity progressively decrease, and the same is true with respect to the income of the workers concerned. It may happen, however, that for various reasons this process undergoes distortion, and while the level reached by the population as a whole improves, some group is left behind, so that the

possibilities of over-all economic development are restricted. In a case like this, the State can influence development by directing taxation along such lines that income distribution ceases to be an obstacle.

Apart from their reflex action on investment, the effects of Government policy on income distribution have an intrinsic importance of their own. It is something that the responsibility of the modern State for securing an equitable distribution of the yield of the country's economic effort is now taken for granted. The acceptance of progressive tax rates, and of the principle that education and certain social welfare services should be provided gratis, as well as the widespread condemnation of certain taxes in particular and of indirect taxation in general, afford clear proof of the recognition of this responsibility.

The most important factor that Government policy must take into account in this connexion is the conflict between the ethical objectives involved in income distribution on the one hand, and, on the other, the efficient utilization of resources. In countries where manpower is plentiful and not very mobile, maximum output is likely to be obtainable by means of a combination of the factors of production such that part of the labour force is left without employment or earns wages lower than the minimum subsistence level. Since this situation is inadmissible from the social standpoint, the group of workers in question would have to be given higher wages than their productivity warranted, and this might lead to a new combination of factors calculated to reduce total production.

Lastly, Government decisions may also affect economic development through their influence on liquidity, that is, on the availability of liquid resources for the financing of investment and current production operations. The two general mechanisms through which the Government can exert this influence on liquidity are its credit policy and its policy with respect to issues. Of course, these two mechanisms, whose mode of operation is more than familiar, are closely inter-related.



Both credit and issues have important medium-term and short-term effects on liquidity, although it is to the former that reference is most frequently made. Since it often happens that the months in which the heaviest expenditure is incurred are not those in which the taxes with the biggest yield are collected, the public sector absorbs liquid resources from the rest of the economy in some periods and gives them out in others, so that the system's level of liquidity is alternately very low and very high. Much the same applies to external transactions. There are months in which exports exceed and others in which they fall short of imports. If the periods of absorption coincide in the fiscal field and in that of foreign trade, cash difficulties may arise in the private sector, together with pressure on the banking system and on issues. If it were as easy to reduce the means of payment as to increase them, such seasonal fluctuations would be of little importance; but in actual fact this is not the case, and in the long run they promote inflation and militate against stability. Moreover, in default of careful programming of cash resources, the Treasury may find itself compelled to pay abnormally high rates of interest in order to finance its expenditure. As the public sector is such an important customer in the capital market, its influence on the general level of rates of interest cannot be dismissed as negligible.

The fact that in the foregoing observations attention has been concentrated on the influence of the Government's economic decisions upon development does not imply failure to recognize that exerted in other ways. In reality, over the long term everything that the Government does affects development. To take the case of education, on the one hand, services of this kind require productive resources which, if they were not used for education, could be turned to account in some other direction, such as the improvement of transport or of diet levels. Consequently, education competes with other useful activities for each country's limited production resources. On the other hand, economic progress calls for specialized personnel in various fields on a scale which can within reasonable limits be determined, and this in turn calls for a veritable pyramid of students at different /educational levels.

educational levels. Furthermore, it necessitates certain general attitudes towards labour and legislation and, broadly speaking, a minimum of rationality. All such attitudes are to a large extent the outcome of the educational system.

Education is no exception as regards the mutual interdependence between it and economic development. The same is true of public health. It is idle, for example, to suppose that a very under-developed country can attain the same health standards as one that has reached an advanced stage of development, but the defective state of public health and hygiene in some of the under-developed countries is obviously responsible in part for the maintenance of a low level of productivity.

### 3. Need for a method of formulating Government policy

It has been shown that Government decisions and the development of a country are closely interdependent in the broadest sense of the term. Their interdependence is of a very complex nature, as the same factors which operate in a particular direction, once a given limit has been passed, produce a different effect. Furthermore, the influence of a factor considered in isolation may differ totally from that it exerts when operating in conjunction with others.

In view of this complexity, the public sector cannot act with maximum efficiency if its decisions are adopted by the light of common sense and inspiration alone. In the past these virtues sufficed, since the responsibilities of the Government were limited. Nowadays they must be supplemented by methods of establishing that the aims pursued are clearly-defined, realistic and compatible with one another, and that the measures applied to achieve them are also compatible and increasingly efficacious. Since there is no absolutely infallible way of selecting ethical objectives or assessing values, all that can feasibly be attempted is to secure the application of a system which, under any given socio-political and ethical régime, will enable targets and instruments to take specific shape without risk of incompatibility.

To formulate public policy in watertight compartments, to regard it as the sum of a number of independent parts, when it is really a set

/of interdependent

of interdependent and tricky factors, is tantamount to reducing the rate of growth and increasing instability. There is no need to look for examples of anomalies in fields which at first glance seem to have no connexion with one another, in order to demonstrate the costliness of the habit of taking isolated decisions in respect of the various activities. Cases in point abound even within the economic functions themselves. There are irrigation works in which the primary channels are constructed, but not the distribution network; there are industrial development programmes unaccompanied by the corresponding development of the sources of energy; there are metalled roads where no motor traffic exists; there are programmes of subsidies aimed at channelling income distribution in a particular direction, alongside systems of taxation which produce an opposite effects; there are monetary stabilization programmes side by side with heavy fiscal deficits, and plans for agricultural development unrelated to transport development programmes.

In fields less closely connected with one another such anomalies are also common. Industrial development programmes are carried out by the appropriate economic bodies in the absence of any corresponding effort on the part of the educational authorities to make provision for the training of skilled labour; while hospitals are being built, no nurses are being trained to staff them; costly agricultural development programmes lack the support of commensurate extension services; new tax laws and responsibilities are backed by no adjustment of the administrative machinery to enforce them.

Inconsistencies such as these can be cited by the hundred. The conclusion has even been reached in some circles that they are inherent in the very nature of public administration, and to that extent they have helped to discredit it and to create an attitude of mistrust towards the Government official.

In reality, the defects so commonly noted in the conception and implementation of the public sector's decisions are in great measure due to the relative slowness with which improvements have been introduced in its methods of operation, as against the speed with which the tasks to be accomplished have multiplied. Fortunately, in recent years both the science of economics and the technique of administration have made progress which may serve to bridge the gap thus created, although some of the resultant innovations are still at the experimental stage, and it is impossible to say whether they will ever become effectively useful instruments. Some aspects of the advances achieved are analysed in the following pages.

## II. THE NATIONAL BUDGET AS A REFLECTION OF PUBLIC POLICY

### 1. Defects of the traditional conception of the budget

It has been said that all Government decisions involving a financial transaction are or ought to be registered in the budget statement. In this sense, the latter is a set of accounts reflecting the action which the authorities propose to take in the course of a given period. On the other hand, the budget is also the mechanism whereby the decisions reflected in those accounts are adopted.

These decisions may be related to the following three types of considerations, which influence both the budgetary mechanism or process and the accounts or budget proper: the criteria applied in selecting the objectives at which the proposed action is to aim, the standards referred to in appraising the efficiency with which such objectives are achieved, and the accounting systems whereby the Government keeps check of its activities.

For historical reasons which need not be gone into here, in most countries the budgetary process is not closely enough linked to the selection criteria or the standards of procedural efficiency. The same is true of the accounts that make up the budget statement. These in particular have been envisaged solely from the angle of the need to ensure that books are kept in such a way as to facilitate the implementation of Government policy within the established legal framework. The most serious deficiencies to be noted, therefore, both in the budgetary process and in the budget statement itself, relate to the selection of objectives and the assessment of the efficiency of the methods used. In some cases, however, grave defects are also observable with respect to the usefulness of the accounts as a book-keeping instrument.

In Latin America autonomous public bodies have multiplied exceedingly fast, and in most cases their budgets are not incorporated in the national budget. In certain countries much the same is true of the so-called special accounts or funds and the social security institutions. In other instances, the receipts and expenditure corresponding to special accounts are included in the budget without due consolidation, a practice which is

/conducive to

conducive to misconceptions of the volume and allocation of total income and expenditure. Another serious defect in the accounts as regards their usefulness as instruments of control is the lack of a cash budget. In reality, for this function to be properly fulfilled, the public sector ought to have at its disposal accounts of the same type as are utilized by any large and well-organized private enterprise, including a capital account.

The fact that the budget statement shows only what the Government plans to buy and not what it plans to achieve is the result of the stress laid on its role as a book-keeping instrument. Most of the Latin American countries' fiscal budgets are long lists of goods and services which the Government is authorized to purchase. To take these lists as a basis for defining the uses to which these goods and services are to be put is usually an extremely difficult task, which in many cases can be accomplished only by dint of more or less haphazard estimates and assumptions. It is true that a fairly precise indication is always given of the State entities or institutions which will make the outlays in question, but as a rule each of them has complex responsibilities which are sometimes unconnected with the tasks or objectives implicit in its title. For example, national defence bodies often have educational responsibilities which, for purposes of analysis, must be considered separately from the work of defence proper. It also very often happens that the so-called development corporations are called upon to exercise regulatory functions which have little to do with development. But their budgets do not show in sufficient detail how far the services purchased by such bodies are used for one or the other purpose.

If more attention were paid to the efficiency with which the tasks incumbent upon the Government are performed, both the budgetary process and the budget statement would have to be different. The main consideration would have to be what the Government was doing or intended to do; the various tasks would have to be carefully defined, and to each one would have to be assigned the expenditure directly or indirectly corresponding to it, costs accounting in private enterprises being taken as a model. <sup>2/</sup> Furthermore, a set of standards of productivity would have

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<sup>2/</sup> This system has been introduced in some countries with the programme budget and the performance budget.

to be drawn up for reference purposes, and supplemented by the procedures and reports necessary for checking how far the work undertaken was being carried out in accordance with these standards.

As a rule, the failure to pay adequate attention to the efficiency of Government operations is criticized mainly from the standpoint of costs, whereas the lack of a procedure enabling the disadvantages and benefits of each of the public sector's activities to be compared with the disadvantages and benefits of the rest may possibly exert a much more harmful influence. Costs are undeniably an important factor which must always be taken into account, but in the case of the public sector there are others too that are equally or more fundamental. For example, if the aim of State investment is to increase the national product, it might be easier to attain that end by allocating such investment to the construction of hydroelectric power stations rather than to housing, since from that point of view the former would be more efficient than the latter. Choosing unwisely between these two alternatives might prove more prejudicial than carelessness in respect of costs. In most cases the composition of expenditure, that is, the selection of the tasks which the Government undertakes, is the outcome of inertia or routine, of political manoeuvres, of group influences, of the capability and enthusiasm of particular public officials, and of many other factors which have no bearing whatever on the rational selection of the activities under consideration. In reality, it could be asserted without exaggeration that the want of a rational procedure whereby to determine an order of priority for the various activities is one of the most serious defects of the budgetary practices applied in Latin America to-day.

Some of the public officials employed in the budget services of the Latin American countries are inclined to take a pessimistic view of the objective possibilities of reforming the systems of selecting State activities on lines which will permit maximum results to be achieved. This pessimism is, up to a point, justified, and its roots go deep. For example, the custom prevalent in many countries of distributing funds for road-building in accordance with the strength of each area's parliamentary representation is partly attributable to an electoral system which attaches

undue importance to the local character of political representation. But considerable influence is also exerted by the lack of a method that will show members of parliament and politicians in general the price that must be paid for building a road from A to B instead of laying it from C to D, or for erecting a handsome public building instead of constructing a drainage system in a marshy area.

The budgetary methods and classifications in use reveal other defects of an economic nature which also need remedying. Thus, for instance, decisions on public receipts and expenditure are adopted with very little regard to their possible aggregate effects on monetary stability. Discussion of such subjects is usually dominated by the impressions and the political philosophy of those taking part. Such important data as the probable balance-of-payments situation and food supplies are rarely taken into account. The best way of evaluating these influences is to prepare a national budget which expressly establishes what is likely to be the magnitude of private consumer expenditure and investment, receipts and disbursements deriving from foreign trade, the volume of production of goods and services and the level of employment. In many highly-developed countries, the national budget is a widely-used tool, but in Latin America it is virtually disregarded.

This instrument of economic analysis may also be of use in correcting so grave an additional defect as is the want of co-ordination between the policies pursued in relation to revenue and to expenditure. Expenditure is usually determined on the basis of the revenue which it is hoped will be obtained through the existing system of taxation, in which the requisite changes are made when effective expenditure turns out to exceed income. But whether because of shortcomings in the methods of calculation applied or for other reasons, it often becomes necessary to introduce tax reforms at times other than the period when the budget is under discussion, so that the co-ordination that should be maintained between expenditure and taxation policy is weakened. From the accounting standpoint, such co-ordination does exist, since most of the changes in the tax bases are dictated by the need to cover expenditure, but when the two decisions are adopted independently, economic inconsistencies may result. The truth of this statement can easily be demonstrated by a reminder that a

Government can determine its expenditure, but not its income. It can, in fact, fix tax rates and define the bases for their application, but it cannot establish the "magnitude" of the latter, which depends on the intensity of economic activity and on price levels, - two variables that are significantly influenced by the public sector's expenditure policy. In reality, the more the Government spends the more revenue accrues to it, although, obviously, the income increment generated by its expenditure usually exceeds the outlays in question. It is this interdependence of income and expenditure that makes it advisable for the two decisions to be adopted simultaneously. It must also be borne in mind that taxes affect the Government's capacity to purchase a specific real volume of goods and services in the market. The transfer of taxes means that the Government is not entirely exempt from paying them. For example, it may not pay duties on imports directly effected by its dependencies, but when it purchases goods which are domestically produced on the basis of imported materials, it cannot avoid paying the higher price resulting from the customs duties involved. Thus, efforts to increase tax revenue may decrease the real purchasing power of the Government's financial resources.

Again, the methods used in the preparation of budgets and the budgetary classifications adopted preclude an accurate forecast of the probable effect of income policy upon the economy. From a practical point of view, one of the most important questions is to determine who are the real taxpayers. This problem can generally be reduced to ascertaining whether the main contributors are the higher or, on the contrary, the lower income groups. Hence budgetary classifications sometimes show the volume of direct and indirect taxation. But it is just as important to know how the tax burden is distributed among the various sectors of production. In many countries the usual contention is that agriculture, for example, does not carry its fair share of the burden, but such assertions are based on incomplete data relating to over taxation, and take no account whatever of disguised taxation. Income tax, for instance, may be lower in the case of agriculture than for other activities, but taxes on agricultural inputs may well offset or more than offset this advantage.

What is more, budgets generally make a distinction between current

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expenditure, investment and transfer outlays, but real investment, such as purchases of machinery, is often grouped together with financial investment, like purchases of buildings or old shares, or capital contributions to autonomous State bodies. These data on the distribution of expenditure are never properly supplemented with those relating to the incidence of taxation on typical investor or typically consumer activities. It is not always easy to draw this distinction, and, moreover, there are many taxes that cannot be assigned to this or that activity. However, even if such differentiations are impossible in respect of the whole of the tax burden, a comparative study of the changes undergone in the course of time by the part which is allocable and affects each of the activities in question is useful as a guide to economic policy.

Lastly, as a general rule, the budgetary practices in use afford no means of programming the distribution of effective income and expenditure over the course of the year. In most Latin American countries current revenue is collected in more or less fixed periods, whereas effective outlays are more regularly distributed. These discrepancies tend to create cash difficulties and compel the Treasury to resort to bank credit, thereby incurring unnecessary costs or causing distortions in the monetary market.

## 2. Budgetary practices permitting optimum allocation of resources

In the foregoing pages an indication has been given of the principal defects characterizing both the procedures adopted in the preparation of the budget and the statement of the budget itself. Suggestions follow for procedures whereby these defects could be modified or eliminated; the present section will deal with those relating to methods, and the next, with means of improving the budget statement.

The most important requisite as regards budgetary methods is that the annual budget should be prepared in accordance with a medium-term national economic development programme. Such a programme is usually misinterpreted in several ways. Some think that it consists in the establishment of a series of rigid targets set up to justify more and more direct Government intervention in private activities; others, that it is merely a matter

/of quantifying

of quantifying investment, so that, without denying its significance, they assign it a relatively subordinate role in the action of the public sector, which, according to them, has to discharge politico-social functions that are perhaps of greater importance. But in actual fact, a development programme neither consists solely in the establishment of rigid targets nor represents merely a set of investment projects; it is, first and foremost, the outcome of a process of selection of realistic and consistent objectives, on the one hand, and of efficient means of attaining them, on the other, and is implemented in conformity with the principles of the Government's general political philosophy, whatever it may be. As the targets and methods which meet these requisites are gradually defined, the relations of economic with political, social and administrative aspects become clearly apparent; the fields in which public and private enterprise are respectively more effective can be demarcated with greater precision, and, in broad terms, the bases for the adoption of more rational and less haphazard decisions are progressively established.

When the means required for the attainment of the proposed targets are determined, the economic policy that the public sector must adopt takes fairly definite shape, in the sense that the objectives thereby pursued are clarified and often quantitatively assessed. A programme affords opportunity for the elucidation of questions of such great political interest as income distribution, the extent to which income can be redistributed without prejudice to the country's institutional structure, the changes likely to be necessary, or the degree to which such redistribution may cause a contraction or an expansion of production.

Furthermore, unless over-all economic activity is taken into consideration, it is impossible, as has already been pointed out, to clarify such matters as the determination of the level of public income and expenditure, which are at the present time the chief concern of those responsible for preparing the budget. It is consequently needful to estimate the value of the gross product, which will partly depend upon the medium-term development programmes that the country is proposing to carry out.

Nor can the task of distributing income among the various public activities that lay a claim to it be accomplished as efficiently as is

to be desired, in the absence of such an over-all development programme. For example, in default of a programme to indicate the most urgent transport requirements, there is a risk that the funds available for lorries may be distributed without due regard to the needs of agricultural production.

The procedure generally followed in drawing up the total Government budget is to combine the partial budgets prepared by each ministry, but without breaking them down by functions or relating them to medium-term problems. What is advisable is for each ministry or independent body to prepare the medium- and short-term budgets for which it is responsible on the basis of classification by functions; thus, for example, if there is a Ministry of Education and Justice, the budget concerned should indicate separately what corresponds to education and what corresponds to justice.

Each of these functional budgets must reflect that proportion of the targets set up for the medium-term (5 or 6 years) which it is planned to attain within one year. If the Ministry of Education proposes to provide in the following year educational services for a given number of scholars, this objective should appear as part of an education target established for a term of several years. The advantages of this type of appraisal of the future lie, on the one hand, in that it gives an idea of how far annual objectives are too ambitious or too limited, and, on the other, in that it draws attention to the possible need for the adoption of new methods which will enable available resources to be utilized in the way best calculated to serve the ends proposed. For example, there are countries where no provision is made for a large proportion of the school-age population, and where demographic growth is very rapid. Medium-term programmes might show that only by means of a reform of educational methods could the requirements of all the school-age population be met within a reasonable space of time.

For the sake of ease of operation, it does not seem advisable to define too many functions. Perhaps, within each of the three major categories - administration, social work and economics - some six or seven might be enough. In each functional budget, however, subdivisions might usefully

/be included,

be included, as the functions themselves are not homogeneous and their subdivisions are complementary. It is not the same thing, for example, to allocate 50 as to allocate 20 per cent of the resources available for education to universities, just as, in the field of public health, the percentages earmarked for pre-natal care and infant welfare and for epidemiology are not a matter of indifference; the efficacy of epidemiological effort depends, up to a point, on the work done in other branches of the public health services. The same applies to education and to the other spheres of Government activity.

The main characteristic of the sub-function is that the activities it covers can be expressed in homogeneous units of operation or measurement. The sum of all school years at the primary level can be obtained, but those years cannot be added to years at university level; the sum of the hectares which it is intended to bring under cultivation by means of public works can be calculated, but those hectares cannot be added to the higher yields which it is hoped will result from the efforts of the research and extension services. The homogeneity of the unit of measurement is the determining factor in the grouping of activities by sub-functions.

Each of the sub-functional or programme budgets is made up of a varying number of performance budgets. The term activity should be understood to mean a group of similar tasks which have to be accomplished for a sub-functional target to be attained. Examples of performance budgets under the sub-functional heading of primary or elementary education might be those relating to the building of school premises, to the training of teachers, to the purchase of educational equipment, etc. The main purpose served by these budgets is that of determining the real and financial costs involved in the attainment of the targets established. They are, up to a point, the groundwork for a public costs accounting system based on the efficient utilization of resources.

In many cases, performance budgets are prepared on the basis of smaller units constituted by projects. Thus, an irrigation budget must be made up

of investment projects for specific irrigation works. In all such instances, the projects constitute the basic instrument for evaluating the efficiency with which resources are allocated.

The preparation of projects is in all countries an established custom in those activities which - like public works - cannot be carried on without them. Nevertheless, it is a custom which is at present vitiated by two fundamental defects. In the first place, the benefits which it is hoped will accrue from each project are seldom quantitatively assessed, and seldom are more projects prepared than can presumably be executed with the resources to hand. If the benefits in question are not estimated and no other projects exist for purposes of comparison, it is very difficult to say whether optimum use will be made of the available resources.

The pyramid of budgetary categories which is proposed here, and which climbs from the project to the performance budget and hence to the programme budget and the functional budget, culminates in the consolidated budget of the public sector; and this in turn, is incorporated into the national economic budget, which includes the activities of the private sector. The value of this pyramid is not purely formal, although failure to respect the essential principles on which it must be built up would certainly turn it into an elegant but useless façade.

Among the principles referred to, those of fundamental importance are the correct definition of activities under each sub-functional heading and the quantitative assessment of the corresponding targets in real terms. It is necessary to know how many kilometres of each type of road are to be built, but medical attention must be given to babies, how many cubic metres of drinking water are to be supplied. Furthermore, it is essential to ascertain as accurately as possible the real and financial unit costs of attaining the targets set up. Lastly, in each ministry and at each level criteria must exist on the basis of which it can be determined which activity should be given priority over another when they cannot all be carried out, and what is the most satisfactory combination of the various

/activities within

activities within a sub-function and of the sub-functions within each function; while the central budget office or the central programming office must possess criteria for weighing the comparative merits of the different functions.

Criteria on which to base decisions or priorities are not easy to establish, particularly when the execution of a specific activity or function involves intangible or subjective benefits and costs. This difficulty is practically insuperable when it comes to comparing certain types of functions. For example, it is almost impossible to use objective criteria to decide whether it is preferable to spend more on education and less on public health, or vice versa. Nevertheless, decisions of this kind are inevitable, and constitute the very essence of the work of the programming authorities. The difficulty is much less when sub-functions have to be compared. For instance, if the ultimate aim of the public health services is to lower the mortality and morbidity indices, in given circumstances a greater reduction can be achieved per unit of resources used if more importance is attached to epidemiology than to the diseases of old age.

As a rule, while it is true that the agencies responsible for carrying them out are usually the best judges of the relative advantages of activities and sub-functions, the same does not apply to functions. The Ministry of Public Works cannot express an impartial opinion as to whether its function is more important than that of the Ministry of Agriculture. That is the responsibility either of the central budget office or of the central programming office, or of whatever authority is in a position to take an objective view of the whole prospect which the country's over-all situation affords.

The central office must inform each functional agency of the amount of resources to which it will have to adjust its specific programme. For this purpose, it has many data on which to base its decisions, deriving on the one hand from the over-all development programme and on the other from the information on costs and requirements supplied by the executive agencies.

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From the over-all programme the central office can assess the total volume of productive resources that will be at the country's disposal during the period covered by the programme (5 or 6 years) and the proportion of those resources that can be channelled through the public sector. It can also form an idea of the country's situation as regards public health and education at the different levels, and the extent to which requirements in respect of these services are likely to increase in the future. On the other hand, the functional agencies will have to tell it what standards of health and education can be considered satisfactory, given the country's stage of development, and suggest average and optimum time limits for the attainment of such standards. On the basis of all this information, the central office will be able to form a more objective opinion as to the volume of resources that should be allocated to each functions.

The need for priority criteria makes itself felt at all levels in the preparation of the budget. In the case of performance budgets, for instance, it will have to be clearly indicated which is more essential, to build school premises or to expedite the training of teachers.

Priority criteria constitute objective bases on which to choose between rival activities. But, as was previously pointed out, even those functions which may seem to have least to do with one another are linked by complementarity. The preparation of fiscal budgets with due regard to an over-all development programme helps to ensure that complementary activities are combined in the right proportions. However, it cannot do so entirely, whence the need for recourse to co-ordination between ministries or departments. Joint commissions composed of representatives of various ministries and serving throughout the period of preparation of the budget seem to be the most effective mechanism for co-ordination of this kind.

The adoption of the methods proposed here may in many cases entail changes in parliamentary procedures bearing on the budget. The defect that perhaps most urgently needs remedying is the want of systematic contact between those responsible for preparing the budget and the members of the budget committees of Congress. This lack of contact makes it difficult for such committees to act with full knowledge of the causes and considerations underlying the receipts and expenditure submitted for approval.

/Another widespread

Another widespread custom is that of maintaining public finance commissions apart from the budget committees. This is to some extent linked with the custom criticized here of not considering income and expenditure policy simultaneously when the budget is being prepared. If this practice were corrected, it would be essential to maintain one joint standing committee on finance and the budget.

Lastly, budgetary allocations are usually approved item by item, a method which fits in well with budgetary systems in which the emphasis is laid on what Governments purchase and not on what they do. This system should be altered and allocations voted by activities, since otherwise all analysis of priorities and every effort at co-ordination would be bootless.

3. Requisites to make the budgetary statement a useful instrument of economic policy

The function of the budgetary statement is to transmit whether merely in draft form or as an annual law, information as to the programmes and activities which the Government is going to carry out and the financial and material resources that it will have at its disposal. It is, in short, an instrument for the communication of ideas.

If it is to fulfil this function, it must be properly presented and arranged. Defects of presentation often account for the failure of public opinion and legislators to obtain a clear grasp of the Government's objectives. A badly constructed budget, which lacks the necessary details, does not cover the whole of the public sector and does not specify short-term and long-term investments, may not shed enough light on the plans of action prepared and may ultimately frustrate them.

To determine the requisites that must be met by a budget statement which has been prepared with due regard to the foregoing considerations, attention must be turned to the question of who needs to study it.

In the first place, the budget must be made known, in its full scope and significance, to the higher executive authorities and to parliament. It is their responsibility to work out short-, medium - and long-term Government policy and to orientate the budget. Obviously, the budgetary

/statement must



statement must be clear and precise, so that the authorities in question can bring their day-to-day and long-term action into line with the objectives in view. Members of parliament must also be given the information they need, inasmuch as it is they who have to review the programmes and finally authorize their implementation, suppression, modification or expansion. The statement must enable the member of parliament to assess the influence which a decision of his may exert in the direction of increasing or decreasing any item of expenditure, and to understand how far such a change, without another correlative modification, may throw a whole programme out of gear. Suffice it to consider what would happen if a decision to economize on the item "Purchase equipment" in a programme designed to provide education for 100 new pupils prevented the purchase of the 100 benches that would be required. Supposing, again, that a public health programme were devised to meet the needs of 50 new patients; if the purchase of only half the requisite number of beds were authorized, the whole programme would be frustrated, and the authorized expenditure on medicaments, doctors/hours, etc. could not be profitably utilized. In a programme and performance budget, on the other hand, the consequences of parliament decisions become perfectly clear, since the contribution represented by each of the programmed items of expenditure can be determined.

The budgetary statement must also provide detailed information for the public officials who are responsible for putting the programme into effect. The programme may be compared to a navigation chart, whereby an efficient executive director can steer an intelligent course. The head of each administrative department must find in the budgetary statement an account of the functions of his incumbency, a quantitative specification of the objectives pursued, an estimate of the human and material resources available, and an assessment of the money that will be needed for the purchase of the further resources required, all classified under separate functional and sub-functional heads.

In addition, the budgetary statement must supply the information needed by the supervisory agencies. It must show, for example, who is responsible for handling State funds in each public service. The relevant data must therefore be given in sufficient detail to facilitate the

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identification of the culprits in cases of fraud or malversation, and the determination of the items concerned. Budget statements are currently presented in the form of ledgers showing the agencies which spend public funds and the various items of expenditure classified by purpose. On the basis of these, the inspecting authorities open the books in which a record is kept of each outlay that each agency is authorized to make, as and when effected, with a view to ensuring that the maximum fixed for each item is not exceeded. The programme budget is not a substitute for current legal practices, and therefore does not entail the elimination of the data and classification used at the present time for State auditing.

Lastly, the budget statement must be accessible to the public. The taxpayer must be assured that proper use is being made of his contribution to the treasury; the private entrepreneur needs to know, for purposes of the management of his enterprise, the attitude that the State will take towards it, the demand for its products that will be created, and other factors that may influence his own line of action; the ordinary citizen needs to be acquainted with the programmes that concern him in the field of education, health, social security, and so forth.

Such, then, are the requisites that the budget statement must meet. Their fulfilment implies a sweeping change in traditional presentation, which is determined by the concept of State inspection and has no concern with priority and efficiency. The programme budget directs interest towards the efficiency of Government action and what it aims at accomplishing, with the result that much more information is required.

The modern budget is no longer a mere list of items of expenditure and accounts of receipts. It is made up, in addition, of volumes containing, respectively, the medium-term or long-term budget, the annual fiscal budget and annexes with the budgets of autonomous institutes and of real resources. Only the annual fiscal budget, or that of the central Government, becomes law; the remainder are for purely informative purposes.

The volume containing the medium-term or long-term budget must begin with a statement on the features characterizing the country's medium-term

economic development programme, giving details of per capita income targets, production objectives by major sectors, the distribution of production between consumption, investment and exports and, in general terms, all that is necessary for a clear grasp to be had of the nature of the programme. Some account must follow of the chief difficulties that will have to be overcome if the proposed targets are to be attained, and of suggested measures for tackling them, which latter, in the aggregate will constitute the structure of medium-term Government policy.

If there is a development programme already under way, an indication must be given of how it is being executed, the reasons for failures, the changes of direction that it has been necessary to introduce and, broadly speaking, all such data as will enable Congress and public opinion to appraise the efficiency with which the policy established is being implemented and the effects which its application is producing.

The next requisite is to indicate the role that the public sector will play in the task of attaining national development targets, and a statement will be presented comprising an analytical description of each of the main functions of the public sector and a detailed list of the standards or levels of activity which are considered satisfactory, together with the medium-term targets established for each of the functions in question and the most important sub-functions. In any case, the real inputs which the public sector will have to purchase in order to achieve the proposed objectives will have to be shown, especially those which, like skilled labour and foreign exchange, may constitute a limiting factor. Another question to be dealt with is that of the monetary costs of the medium-term programme, broken down by activities or investments. Lastly, it will be necessary to explain how far the administrative apparatus of the public sector is capable of executing the proposed programme, what readjustment measures would be advisable if it should prove inadequate and, in general, what is the rationalization programme contemplated for the period.

In relation to the medium-term programme of achievements, the public sector's financing programmes can next be presented. The productive /activities will

activities will be shown, together with the income groups that will make the most substantial contributions; the tax mechanisms which it is intended to use for the transfer of funds; the reasons on which the choice of this type of instrument was based; and those that might be used instead. Consideration should then be given to the possible general effects of proposed policy on financial conditions for the private sector, to which end the so-called national budget of sources and uses of investment funds will have to be drafted. This contains an estimate of the financial requirements of the whole economy and the resources that will be available.

The same statement should give full details of the Government's medium-term capital budget, enumerating all the investment projects to be carried out by each type of function. This is to enable funds to be earmarked from the outset for investment projects that will take several years to carry out, and thus avert any risk of their being brought to a standstill or slowed up for want of resources.

The volume containing the annual fiscal budget bill must begin with a preamble in which the general objectives pursued by public action during the period covered by the annual budget are related to those established in the medium-term programme, and an indication is given of the specific targets for that period which are linked to medium-term objectives by technical considerations, or by considerations connected with the factors that influence the medium-term situation of the economy and that cannot be taken into account when the medium-term programmes are prepared, and, lastly, by unpredictable factors. For example, it might not be possible to attain certain agricultural production targets until the irrigation works were completed, so that in such a case a sixth part of the six-year programme could not be taken as a target for the first year. Again, it might prove necessary to establish a very modest annual objective because conditions in the preceding year had been abnormally unfavourable, or because it was impossible to invest all the resources projected on account of the decline of exports to a level unforeseen in the medium-term programme.

The statement must go on to evaluate the effects which the proposed policy is designed to bring about, especially as regards stability.

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To this end, the income and expenditure of the public sector will have to be related to those of the rest of the economy by means of the annual national budget, in default of which a foreign exchange budget will have to be utilized.

Income and expenditure and the cash budget are next shown in outline, after which attention is drawn to the homogeneity of the various programmes and the ways in which they are inter-related, in order to demonstrate the desirability of keeping programmes and policy consistent.

The income budget should begin with an economic classification, breaking down the year's receipts by wages, profits, capital, consumption and other economic operations. It is advisable to classify receipts under the headings of current and capital income; to indicate the proportion of revenue that should be obtained from the various income categories of taxpayers; to make a distinction between the amounts likely to accrue from the internal and from the external sectors; and to define the contributions to be expected from agriculture, manufacturing and other important activities.

Receipts must also be classified in accordance with an administrative criterion, to permit the establishment of the accounts which the Treasury will have to open so as to collect them. To facilitate payment for the contributors, key symbols are assigned to these classifications. Finally, it is advisable to classify receipts according to the currency in which the sums concerned are paid. The Government's external purchasing power can thus be assessed; this is important from the standpoint of defining the possibilities for purchasing machinery and other accessories which have to be imported, and the extent to which foreign trade fluctuations will affect public finance.

Then comes the budget of expenditure, classified in various ways, current expenditure being first distinguished from capital outlays. This break-down gives an idea of the effort which the State will make to promote economic development, and of the aggregate cost of public administration. It should be detailed so as to show the components of consumption, such as remunerations and purchases of goods. Furthermore,

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details of investments must be given, by type of works, roads, buildings, ports, factories, etc. If the Government grants loans or contributes capital to any enterprise, this should be indicated separately under the head of financial investment.

Expenditure should next be classified functionally, so that the aims of Government action can be ascertained, for in this way it will be seen how far education is given priority over national defence or the police force, public health over transport, etc. To facilitate the analysis, it is advisable to include an economic-functional classification, which will permit an accurate assessment of the volume of investment by functions and the cost of each under the heads of salaries and wages, purchase of material and other components. Each functional budget must be broken down by sub-functions, targets being indicated in every case.

It is necessary to indicate the institutions participating in each sub-function and to specify, in accordance with the classification by purpose, how much will be spent on salaries and wages, purchases, hire or premises, travel allowances, furniture, and, in general, each of the main items of expenditure. Tables combining the break-down by institutions with the classification by purpose should be prepared. Expenditure should also be broken down by currencies, disbursements in national currency being kept separate from foreign exchange outlays. Lastly, it is advisable to include, for information, the fiscal cash budget, in order to show the total volume of monetary resources over which the central Government will have control.

In the third volume of the budget statement, the budgetary annexes or appendices are presented. First appear the budgets of such autonomous institutions as the social security banks, development corporation and other decentralized bodies. Summaries of the budgets of the state or municipal authorities will also have to be included. All this information must be combined with that relating to the central Government to form the consolidated budget of the public sector, which will provide an overall picture of its total transactions.

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As the funds handled by the Government are intended for the purpose of mobilizing real productive resources, tables with the appropriate budgets should be appended. A case in point is the personnel budget, showing the number of Government employees, classified by professions, functions and sub-functions, levels of remuneration and administrative rank. Another budget of this kind relates to the material resources that will be purchased from the private sector; it is broken down by types of product and expressed in terms of physical units. A budget of sources and uses should also be included for the public sector, giving details of the total volume of financial resources which will have to be mobilized in order to execute the Government's programmes.

As will have been gathered from the foregoing pages, with the adoption of the method of preparing functional and programme budgets, the budgetary statement acquires a totally new aspect; it shows the Government's long- and medium-term programmes, reflects them in the annual budget bill, covers the whole sphere of action of the public sector in informative annexes, and indicates in detail the real resources required for the implementation of the decisions adopted.

### III. SKETCH OF A MECHANISM FOR THE FORMULATION OF NATIONAL POLICY

#### 1. Basic principles for an effective policy

Specialists in budgetary problems have long been stressing the need to conceive of the public budget as a single unit, in the sense that it must embody absolutely all the income and expenditure of the public sector. This emphasis is dictated by the conviction that the budget statement should be the instrument wherewith to judge the direction and cohesion of Government policy. With the passage of time it has become more clearly evident that such unity, although an essential requisite, is not enough, since the Government's policy cannot be appraised or conceived in the same way as that of an independent private enterprise. To ascertain whether Government programmes are over-ambitious or over-modest, it is indispensable to form an idea of the probable behaviour of the economy as a whole. The modern concept of budgetary unity therefore extends beyond the public sector and embraces the rest of the economy.

/Budgetary integration

Budgetary integration of all sectors is achieved by means of the instrument known as the National Budget, which comprises the budgets of the Treasury, of enterprises, of households, of the external sector, of real national product and income, of saving and of domestic investment. In a country where free enterprise prevails, the public sector's budget is fundamentally different from those of the other sectors, in the sense that while the former reflects the action that the Government intends to take, the latter are merely estimates of what is likely to occur in the rest of economy during the period covered by the budget.

Probably the most important of all the principles that have to be taken into account in the conception of economic policy is that of unity, although, of course, due importance must be attached to the clarity, realism and compatibility of targets. As a rule, one of the serious defects to be noted in almost all attempts to prepare a policy is the vagueness of the objectives established. To say, for example, that the aim is to raise the standard of living of the population has very little value if no clear indication is given of what is implied and how long a time limit is visualized. The usefulness of defining objectives increases in proportion to the accuracy with which they can be quantified. Of course, not all the objectives of a policy are susceptible of quantitative assessment, but this is not a valid argument against quantifying those which are. Moreover, such a procedure enables the realism of intangible objectives to be more easily appraised. For example, if plans are afoot to nationalize a given activity, an estimate of the real costs that nationalization implies may help supporters and opponents of the measure to realize the price that will have to be paid.

Another common mistake is that of setting up targets which are unrealistic, that is, unattainable within a specific time limit. As regards economic objectives, the degree to which they are realistic is commensurate with the feasibility of achieving them with the productive resources available and the techniques known, and their compatibility with what people are willing to undertake or accept. A target that consisted in doubling per capita income in the course of one year would be unrealistic, because no country in the world has access to resources of the magnitude and composition required for such a feat. Similarly,  
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it would be impossible to double the tax burden within a year, since there would probably be no means of ensuring the taxpayers' compliance with such obligations. It may therefore be asserted that the extent to which targets are realistic depends largely on the efficacy of the available instruments, and for that very reason ends and means should be shown at one and the same time.

The different targets are linked by complex relationships of complementarity and incumbency, which are sometimes difficult to discern by the light of common sense alone. Two objectives compete with each other when they require inputs of the same type. For example, it may happen that the flow of a river, whose waters can be used for direct human consumption, for irrigation or to generate energy, is insufficient to meet these three types of requirements within a given period; in a case like this, the corresponding objectives are placed on a competitive footing. If they are quantified in such a way that total water requirements exceed supplies, the targets become mutually incompatible. Consequently, the incompatibility of objectives is in many cases a question of relations between their respective magnitudes. In other instances, however, it derives from the conflict between the effects that attainment of the various targets produces. For example, a medical assistance programme financed with indirect taxation may cause a deterioration of diet levels and thus neutralize the effort made by the public health sector.

On the other hand, targets are mutually complementary when one must be attained before the others can materialize. The capacity for complementarity of the objectives proposed also depends upon their relative magnitude. Supposing, for example, that the target set up is a two-per-cent annual increment in family income, and that, on the other hand, it is proposed to increase milk production by ten per cent in order to ensure that diet levels are satisfactory from the nutritional standpoint. But since, as family income rises in a particular proportion, demand for milk expands in another, it may happen that the growth of income gives rise to an increase in demand for milk which greatly exceeds the ten per cent projected. In such a case the two objectives - the rise in income and the expansion of milk production - prove quantitatively incompatible,

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whereas if supply and demand increase at the same rate, they are complementary. At a more general level, examples can be cited that are perhaps more striking, like that of the necessary complementarity between the development of agriculture and that of industry. Until a short time ago these two activities were usually visualized as alternatives, and there were "agriculturalists" and "industrialists". Fortunately, it has been possible to establish that the development of the two activities must be smoothly co-ordinated, since if agriculture expands and manufacturing does not, over-production of foodstuffs will result, and if the latter develops while the former fails to do so, there will be a food shortage. It is perfectly possible, however, for the agricultural and industrial targets to prove incompatible, if, taken in conjunction, they require more capital or more manpower than is available.

Incompatibilities also emerge among targets which are not strictly economic. For example, in countries with high per capita income levels, the number of children of school age per primary school teacher does not as a rule exceed 35. An attempt to establish the same ratio over the short term in a country with low income levels might render educational targets incompatible with production objectives.

A third principle that must be borne in mind in the preparation of Government policy is that of the compatibility and efficacy of the instruments used to attain the targets set up.

Much the same applies to instruments of policy - taxes, subsidies, credits, regulations or whatever they happen to be - as to objectives; they may be at once complementary and mutually competitive, and may therefore turn out to be incompatible. Taxation of the higher income groups, for example, is a useful instrument for the financing of public investment, but since it is their income that generates most private saving, its utilization to increase public investment may, if carried to excess, result in a decline in private investment.

Almost all instruments of economic policy produce effects over and above those for the sake of which they are adopted - often of such a nature as to nullify all the direct advantages to be derived from their

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application. For example, exaggerated use of the customs tariff to stimulate economic development may cause a deterioration of the terms of trade for agriculture so serious as to lead to the stagnation of this activity. In a case like this, the tariff could not be described as an efficacious instrument for economic development, however much it might encourage industrial production. Another case in point is that of favourable tax treatment for the undistributed profits of enterprises. Might not this result in over-investment in the more developed activities, and in a tendency towards concentration of industrial ownership?

The indirect effects of certain instruments of economic policy are often of a social character, and may be seriously detrimental to development prospects. For instance, the relaxing of ethical standards in the business world in countries that have resorted to particular forms of exchange control has given rise to a great deal of comment.

The principle underlying all this can be clearly defined. The efficacy of instruments of economic policy must be judged in relation to their global effects, both direct and indirect. But, as has been shown, competition and complementarity exist among these instruments themselves, which means that to the foregoing proposition a rider must be added: instruments of economic policy must be appraised as a single whole.

These requisites are not easy to satisfy. Much has been written for and against the several instruments of economic policy, although as a rule only in terms of their direct effects, which are considered independently of over-all policy. In many cases, moreover, it is hardly possible to determine, and still less to quantify, the direct effects produced by the application of a specific instrument. The statement that the efficacy of such instruments must be judged as a complex whole is not so much a categorical requirement as a way of calling attention to the twofold need for taking into account the elements creating that complexity and for promoting research on the complexes themselves.

Lastly, in the formulation of economic policy, due consideration must be given to a fourth principle - that of the interdependence of ends and means. It was previously pointed out that targets must be realistic,

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but the extent to which they are so largely depends on the efficacy, and, of course, the acceptability, of the instruments to be used. For example, during the post-war period Latin America increased its per capita gross national product at an annual rate of 2.7 per cent. It may safely be asserted that, from the point of view of the availability of real resources, the annual increment could have been raised to 3.5 per cent, but to that end it would have been necessary to reduce consumption, strictly regulate the use of foreign exchange, ration investment and adopt other measures which probably would not have been readily accepted. Consequently, to have established the 3.5 per cent rate as a target would have been unrealistic, because the requisite instruments would have been rejected by a political majority.

On the other hand, it might happen that, irrespective of political forces, no body of instruments existed whereby such a rate of development could be attained, in which case the target would be unrealistic because of the inefficacy of the instruments available.

The closeness of the relationship between targets and instruments renders it essential that when economic policy is being formulated the two elements should be determined at one and the same time. If it is further borne in mind that, as has been seen, targets, like instruments, form a complementary whole, a corollary is evident at first glance; economic policy must be planned with due regard to the economic complex in its entirety. This corollary is the first of the four principles cited here as the most important of those that the public sector should take into account in devising its policy.

## 2. Methods of determining targets and selecting instruments

Twenty years ago, the possibility of conceiving economic policy as a single whole would have been a Utopian dream. Neither the system of concepts nor the statistical data required for such a purpose existed at that time. Economic policy in the past was necessarily remedial, rather than preventive as it can be at the present time. In the following pages an attempt is made to present, in simple outline, the system of concepts

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referred to, in so far as it is applicable to the economy as a whole; it will then be related to methods of preparing budgets.

Since targets can be assessed in quantitative terms, and since a series of known relationships exists among the targets themselves and between them and the available resources, they can be established in such a way as to meet the requisites of clarity, realism and compatibility. For example, if the gross product is analysed from the standpoint of the use of production, the following relationships result:

$$PTB_1 = C_1 + I_1 + D_1 + X_1 - M_1$$

$$PTB_1 = a (K_0 + I_1)$$

$$D_1 = d (K_0 + I_1)$$

According to the first, the product of any year ( $PTB_1$ ) is equal to the algebraic sum of consumption ( $C_1$ ), net investment ( $I_1$ ), depreciation ( $D_1$ ), exports ( $X_1$ ) and imports ( $M_1$ ). From the second it can be seen that the product equals the preceding year's capital ( $K_0$ ) plus net investment ( $I_1$ ), multiplied by the productivity of capital ( $a$ ); and from the third, that depreciation ( $D_1$ ) equals total capital ( $K_0 + I_1$ ), multiplied by the rate of depreciation ( $d$ ).

The existence of this system of relationships means that targets can be set up or projected<sup>3/</sup> only for three of the variables it includes. For example, if it is decided that the product is to increase by 50 per cent during the period covered by the programme, and the probable expansion of exports is estimated, it is enough to establish the increment in consumption in order to determine, by the application of the system of relationships, the volume of investment, depreciation and imports. Variables other than those mentioned here can be valued, but in no case more than three.

If the extremely simple relationships noted above are used for establishing targets, it is impossible to say a priori what will be the

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<sup>3/</sup> By "project" is meant the valuation of an element on the basis of criteria which are unconnected with the system of relationships in which it is included, and which need not be indicated here.

resulting balance of payments (represented in them by the difference between exports and imports of goods and services). The higher the targets fixed for the product and for consumption in relation to exports, the greater will be the difference between X and M. This difference, which, if negative, provides an indication of the loans and investment that will have to be obtained from abroad, may be completely unrealistic, as there are clearly limits beyond which it is neither possible nor desirable to obtain such loans. For this reason, when a development programme is being prepared the starting-point is usually a much more complex set of relationships, which considers the final balance-of-payments figure as a determinant, and which, in general terms, begins with the projection of the product, exports and the net flow of foreign capital, and ends with the preparation of three types of medium-term budgets which cover the whole of the national economy.<sup>4/</sup>

Although programming methods cannot be analysed in detail in this study, it is worth while to present in diagrammatic form the budgets in which they culminate, so that some idea can be formed of how their preparation is related to the drawing-up of the public sector's budget in particular, and to the determination of economic policy in general.

The most important of all the budgets resulting from a programming process is that of production and supplies of goods and services, of which a simplified example is given in table 1, where each column represents the components of total costs plus the profits of each sector of production,<sup>5/</sup> and each line, the distribution of sales of the production of each sector; the figures represent monetary values at constant prices of any given year.

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<sup>4/</sup> This method is analysed in detail in the various publications making up the series Analyses and projections of economic development - Introduction to the technique of programming (E/CN.12/363) and studies on the economic development of Argentina (E/CN.12/429/Rev.1), Bolivia (E/CN.12/430 and Add.1/Rev.1), Brazil (E/CN.12/364/Rev.1) and Colombia (E/CN.12/365/Rev.1) - as well as in The industrial development of Peru (E/CN.12/493), and in the mimeographed editions of lectures given under the Joint ECLA/TAA Economic Development Training Programme.

<sup>5/</sup> Purchases on capital account made by each sector are not taken into consideration in costs.

The second budget is that of investment broken down by sectors of origin and destination; an example is given in table 2, where the columns represent the investment expenditure that each sector must incur in order to produce the amounts projected in the production budget, indicating the sector of origin of the goods and services concerned and whether they are domestic or imported. The lines opposite each sector give its production of capital goods and show who are the purchasers.

The third budget is that of sources and uses of investment funds, in which all the items that appear as sources are funds that enterprises, the Government, household and the rest of the world can utilize in transactions which affect their assets and liabilities, and which are broken down by uses. The commercial banks and the central bank are not consolidated (see table 3).

From these three tables it is easy to grasp how decisions on production targets and the use of production are closely linked to Government decisions as to economic policy. To take, for example, line 1 in table 1, broadly corresponding to agriculture. The figure appearing in the last column, headed "Production and supplies", represents total availabilities of domestically-produced and imported agricultural commodities. Again, the figure given at the foot of column 1 is the gross value of agricultural production, and those shown vertically in the same column represent the costs that will be incurred in obtaining the production in question, including profits and indirect taxation, all of which are elements that determine the total value of production.

None of these values can be established without the adoption of precise decisions in several fields of economic policy. To consider, in the first place, table 1, column 1. The value of the intermediate products purchased by agriculture from other sectors depends, apart from purely technical considerations, upon the tax burden borne by the sectors concerned. For example, in so far as a country levies duties on imports of fertilizers, agricultural production costs will be higher, or methods of production will change. Furthermore, the distribution among entrepreneurs, wage-earners and the Government - shown in lines (a) to (d) - of the amount by which the value of agricultural production

/Table 1





Table 2  
NATIONAL INVESTMENT BUDGET

		Sectors using capital goods					
		Agriculture	Mining	Foodstuffs and beverages	Textiles	Government	
Sectors producing capital goods	Agriculture	Total domest. prod. imports					
	Mining	Total domest. prod. imports					
	Foodstuffs and beverages	Total domest. prod. imports					
	Textiles	Total domest. prod. imports					
		Value added					
Total							

Table 3

BUDGET OF SOURCES AND USES OF INVESTMENT FUNDS

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Sources	Uses
	<u>Government</u>
1. Surplus or deficit on current account	5. Public capital formation
2. Loans	5. Cash and deposits
3. Sale of bonds	7. Credits to enterprises and persons
4. Issues	
	<u>Persons</u>
8. Personal saving	10. Cash and deposits
9. Loans from enterprises and the Government	11. Capital contributions to enterprises
	12. Government bonds
	<u>Enterprises</u>
13. Undistributed profits and depreciation reserves	16. Private capital formation
14. Loans	17. Cash and deposits
15. Capital contributions	18. Credits to Government and to persons
	19. Government bonds

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/exceeds the

exceeds the cost of raw materials is closely linked to the level of production that can be attained in agriculture. If the proportion reaching the entrepreneurs were very small, these might lack incentives to produce more; if wage-earners received very little, demand for agricultural commodities might prove insufficient to absorb the volume of production stipulated; and if it were the Government whose share was very limited, it might find itself unable to finance the public works and the research and extension programmes needed for agricultural development. Lastly, the requirements shown in the end column may be met with domestic production or with imports, according to general tariff and trade policy. This in turn has repercussions on the public sector's revenue from taxation, especially in countries where foreign trade is an important source of public funds.

Attention may now be turned to the columns indicating consumption and investment by the public sector. They show the decisions that must be taken in respect to a major proportion of such expenditure, since only transfers are excluded. The values noted in the lines corresponding to each sector represent estimated purchases of the various goods and services needed for the discharge of the Government's regular functions. Salaries and wages paid by the Government are given below.

As the foregoing observations show, in order to determine the production targets that must be attained by the various productive sectors of the economy, decisions have to be adopted on taxation, the policy to be pursued in respect of remuneration of the different factors of production of the private sector, trade policy and the level and composition of public income and expenditure.

Table 2 must now be considered. As was previously stated, it represents the volume of investment that must be effected in order to obtain the volumes of production stipulated in the Budget of Production and Supplies. Part of this investment will be the

/responsibility of

responsibility of the private and part of the public sector. How much each group should contribute is one of the most controversial questions in the field of policy. Once this problem has been settled, there remains the fact that the share of private enterprise may differ greatly from what this sector is prepared to invest. To make its possible investment consistent with what it is necessary to invest, a policy must be devised which in some cases will provide incentives and in others deterrents. In such a policy, the instruments constituted by taxation, credit, import controls, training of personnel, etc., have a significant part to play.

The preparation of the Budget of Sources and Uses of Investment Funds also calls for a series of decisions on economic policy.

The magnitude of the resources available to enterprises for the financing of investment partly depends upon the following factors: (i) tax policy, in so far as this affects total profits, the proportion of profits undistributed to shareholders, and the depreciation reserves of enterprises; (ii) the policy adopted with respect to corporations and the capital market in general, which is reflected in the amount of resources that enterprises can obtain through the sale of bonds and shares to private individuals, to foreign purchasers and to the Government itself; (iii) decisions as to monetary and credit policy, since this has repercussions on the resources obtained by enterprises from banks and from the Government; and (iv) policy relating to foreign loans and investment, which in turn is closely linked to exchange policy.

The items in the Budget of Sources and Uses of the public sector are affected by the decisions adopted in matters that have a bearing on the financing of enterprises, and the same applies to the accounts of the other sectors.<sup>6/</sup>

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<sup>6/</sup> See Osvaldo Sunkel, "Una metodología para analizar la estructura de los ahorros", El Trimestre Económico, Vol. XX, N°4 (Mexico, 1953), for an analysis of economic policy in the light of the figures shown in accounts of this type.

### 3. Methodological requisites for the preparation of the medium-term budget of the public sector

The preceding section contained a brief account of the relations between the establishment of objectives in economic development programmes and the decisions adopted in the various fields of economic policy. The present section will call attention to some of the elements used in determining the targets for the public sector in the budget of production and supplies, and the way in which economic policy gradually takes shape in the course of its preparation.

The procedure which will be described is based on a system of successive approximations. The fact that all the variables utilized are inter-related means that if any one of them is modified, all the rest are affected, and a further influence is thus exerted on the first. For strict accuracy, a set of variables related in this way must be dealt with simultaneously.

A system does exist for working out all the variables simultaneously, deriving from the new method known as linear programming. It permits the determination of the price system which would enable maximum production of all goods and services to be achieved. This system of prices - termed shadow prices, accounting prices or equilibrium prices - may present a structure such that some are either unduly high or unduly low from the standpoint of the distribution of income and incentives. Economic policy, by means of taxes and subsidies, could lower some and raise others without affecting the allocation of resources, or affecting it in the least unfavourable way possible. Unfortunately, this system cannot yet be applied for want of statistical data, so that it will not be discussed in the present study.<sup>7/</sup>

The first requisite for establishing medium-term official objectives is to determine the levels of activity that it is desired to attain in each of the major fields or functions of the public sector which have financial implications. To this end, the following sectors at least might

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<sup>7/</sup> See, however, Hollis B. Chenery, "Development policies and programmes", ECLA, Economic Bulletin for Latin America, Vol. III, No. 1, March 1958.

be differentiated: education, public health, housing, transport, energy, municipal services, land and agriculture, and basic industries. A monograph on the current situation with respect to each of these sectors must be prepared, stress being laid on the most important problems and how they can be solved. In the case of primary education, for example, such a monograph would indicate the total population of primary-school age, the number of pupils attending school in each grade, and the number for which no provision was made, with an explanation of the reasons.

To judge whether and how far the existing situation is satisfactory or the reverse, it is necessary to set up a standard of reference, and to quantify this a unit of measurement must be available. In the case of primary education, this unit might be defined as the number of years of instruction per inhabitant of school age. The standard of reference will show how many years of school attendance per school-age inhabitant are considered satisfactory, and comparison of this figure with the actual situation will indicate the deficit, or magnitude of the deficiency.

The standards set up, like the targets, must be realistic. To test this, recourse may sometimes be had to international comparisons. If it is found, for example, that in countries where income levels are much higher a school life of six years has not been attained, such a standard can be regarded as unrealistic, at any rate unless a radical reform of elementary teaching methods is considered feasible. In the instance cited, use might also be made of studies on the relationship between family income and the length of school life, and, more specifically, of analyses of the causes of absenteeism among school children. In many cases, the chief of these causes is the low income of the parents, who, finding themselves unable to provide for their children, send them to work prematurely.

Once a realistic standard has been determined, provisional maximum, average and minimum targets per unit of measurements are set up. For example, the provision of five, four and three years of school education by the sixth year of the programme may be established as the maximum, average and minimum targets, respectively. The total school-age population is next projected for the whole period of the programme, so that the total number of pupil/years for which provision will have to be made in each case can be determined.

/The monographs

The monographs must also show costs per unit of measurement in both real and monetary terms. They must indicate, for example, the number of teacher/hours per pupil/year, the number of square metres of classrooms, and so on, until all the most important inputs are covered. At the same time, the price of each input and the total unit cost in money is given. In the estimate a distinction must be made between overheads and investment costs.

When unit costs and prices of inputs are known, it is easy to calculate total costs for the three targets, minimum, average and maximum. Obviously, calculations of the same type are applied to each of the sub-functions included under a function, so that every institution responsible for preparing a functional budget may present proposals representing many levels of achievement, for which purpose all it need to is to combine in several alternative ways the different types of targets for the various sub-functions.

From the estimate of the total costs which the attainment of a specific objective will entail, it can be judged whether the targets for the sub-function are realistic or not. For example, a target which implied that half the public resources likely to be available during the period of implementation of the programme would have to be spent on pre-university education might in many cases be unrealistic. In others, however, the maximum target, or that permitting the nearest approach to the standard of reference while the programme is in force, may be unrealistic, but not so much on account of financial limitations as because of some insuperable physical or technical difficulty. For example, it might be impossible to train all the teachers needed within the time limit stipulated. Knowledge of what these adverse factors may be is a valuable means of saving work in the selection of alternative solutions.

Everything that has been said in connexion with primary education also applies, in general terms, to the preparation of preparation of programmes for other sub-functions of the public sector. It therefore seems worth while to sum up the process, which can be said to consist in the following tasks: (a) defining the sub-functions; (b) determining the

/unit of

unit of measurement for each sub-function; (c) choosing standards indicative of a satisfactory level for the sub-function; (d) establishing criteria whereby the extent to which these standards are realistic can be assessed; (e) ascertaining the current situation of the sub-function; (f) estimating current costs per unit of measurement; (g) setting up alternative targets; and (h) calculating the total costs of each alternative solution, distinguishing between those corresponding to current expenditure and to investment respectively.

The establishment of targets in the transport, energy and basic industries sectors may create certain special problems which do not fit into the general framework of the procedure outlined. In the first place, none of these activities constitutes an end in itself, like education and public health. The objectives which must be attained in each depend fairly strictly on the production targets established in the economy as a whole. For example, once the desired level and composition of the product is known, the volume of energy needed is defined within inelastic limits. It is not therefore necessary, as in other cases, to consider alternative targets. Secondly, activities of this type present, in contrast, more technological alternatives than arise in other sub-functions, and this necessitates criteria for deciding which of all the feasible methods is the most appropriate. For example, while the over-all programme gives a satisfactory indication of the total volume to be attained by transport of goods, it says nothing as to whether the emphasis should preferably be laid on railways or on roads, or, again, on what type of roads. This is probably the biggest problem that has to be solved by the authorities responsible for the programming of such activities. Again, it is in this field that the question of private enterprise as against public action arises in its most controversial form. When the objectives in a transport or energy programme are established, the problem of allocation of responsibilities is shelved for the time being, but before any pronouncement is made on Government expenditure policy a decision must be reached. Lastly, in activities of this type a great deal of influence is exerted by the question of how long investment takes to mature - that is, the length of time that must elapse



between the initiation of the project and the moment when it can be brought into operation - and the technological interdependence of several investments of various types. To increase agricultural production in a given area, for instance, it may be necessary to carry out irrigation works which will take several years to construct. If the area is destined to become an important source of supply, very careful attention must be devoted to the lay-out of the irrigation works and to co-ordination with transport projects. Neglect of such relationships inevitably results in waste of resources.

The studies mentioned above, which fall within the province of the specialized agencies concerned, enable the office responsible for the preparation of the national programme to study the compatibility of the targets for the public and private sectors and to form a preliminary idea of the public sector's probable financial requirements. Logically, the next step is to assess in quantitative terms the resources that will be available for meeting these needs.

The quantification of production targets by sectors greatly facilitates the projection of the revenue which the public sector will derive from taxation. It enables a preliminary estimate to be prepared, on the basis of the assumption that there will be no change in the rates of the most important taxes in force in the basic period.

It sometimes happens that most of the tax rates are applicable to tax bases which tend to increase more slowly than the product. If the rates remain unchanged, the result is a gradual decrease in the average tax burden - that is, in the ratio between tax revenue and the national product - which will mean that either Government expenditure must little by little be reduced in relation to the national product, or the system of taxation must be reformed. Even if this is not the case, when a development programme is to be put into effect it almost always becomes needful to introduce innovations in the tax system, and the right time to consider them is when income is being estimated or projected.

As was shown in earlier pages, the possibility of attaining the proposed targets largely depends on Government decisions with respect to taxation, remuneration policies and trade policy. In this connexion, it

/is probably

is probably trade policy that will present the greatest difficulties. As a rule, the acceleration of development calls for the encouragement of exports and a modification of the structure of imports, some of which have to be superseded by domestic production. To achieve this, it may be necessary to alter tariffs, exchange rates and export duties, and to grant subsidies. Those responsible for setting up foreign trade targets must be in a position to indicate what the nature and magnitude of these changes should be. But the adoption of any modification will entail repercussions on the rest of the economy that will have to be taken into account.

Knotty problems also arise in connexion with remuneration policy. As was previously pointed out, each target necessitates a certain amount of private investment which may be very different from the investment that individuals are prepared to effect, given the existing situation with respect to profitability. Research will consequently have to be undertaken to determine what changes must be brought about in the situation in question in order to provide inducements to invest. In a case like this, it may be necessary to alter taxation on profits and on the inputs used by each sector, or to grant subsidies. Here too, once a decision has been adopted, consideration will have to be devoted to the indirect repercussions that are likely to result from the reforms.

It may prove more advisable in practice to examine the whole set of major changes known to be required, and then to analyse their possible effects on the economy as a whole and on fiscal income. For this purpose it may be very useful to resort to the inter-industrial relationships or input-output tables, which are the same as the budget of production and supplies, but relate to past events. For example, they enable some idea to be formed of the approximate magnitude of the changes that may take place in price levels in any given sector as the result of a modification of tariffs or of any other indirect tax.

Once the basic changes in the system of taxation have been introduced, it is possible to prepare the Budget of Production and Supplies, and on the basis of this to determine, with the help of projections of production of specific items in some cases, the total revenue likely to accrue from taxation during the period covered by the programme.

/The projection

The projection of probable receipts from the sale of public utilities presents no major difficulties, as, in accordance with programming techniques, each of the agencies concerned will have to prepare specific expansion programmes, on the bases of which its income is calculated. By the time the research has reached this stage, an estimate of the Government's current income is available for each of the years covered by the national development programme, with several alternatives as regards current expenditure, obtained by combinations of the maximum, average and minimum targets projected for each of the sub-functions. Which of these current expenditure combinations is chosen depends to a great extent on the resources required by the public sector to finance its investment programmes, that is, the income on capital account which it must have at its disposal. This income is shown, as has already been pointed out, in the Budget of Sources and Uses of Investment Funds, the preparation of which will be briefly reviewed in the following paragraphs.

The column in table 3 showing uses of investment funds by the public sector contains elements deriving from the other basic national budgets, together with others which have to be determined. The former include the Government's real investment, part of which depends upon the current expenditure established targets. As several alternatives present themselves here, one of an intermediate nature may be chosen to begin with and either adopted as final or corrected according to the degree of equilibrium registered in the capital budget. Another known element is constituted by the amortization of debts contracted by the Government in previous periods. Here some complications arise out of the evolution of borrowing, but it is not worth while to spend time on them. Consequently, it remains to determine the liquid assets which the Government must maintain in the form of cash and deposits and the sums it must have at its disposal for credits to the private sector. The amount of liquid assets required is relatively easy to establish. The Treasury always knows how much it needs to cover the seasonal differences between fiscal receipts and expenditure. The determination of the other item is more arbitrary, although an approximate idea of its magnitude can always be formed, thanks to the fact that the

national development programme provides data on the major projects which private enterprise is to develop, and which will require financial assistance from the public sector. The consumer loans customarily granted by the latter are as a rule channelled through the social security institutions and can be assessed with a degree of accuracy sufficient for this kind of work.

Once the public sector's total requirements in respect of investment funds have been established, the full amount that must be provided by the various sources in the aggregate is also known. The most important of these sources is the surplus on current account, that is, the positive difference between current income and expenditure. As will be recalled, in a first approximation it is best to use the average projection of the expenditure in question. Loans constitute another important source of funds on which the Government can draw. Those obtained through the sale of bonds can be fairly easily quantified, since the absorption capacity of the securities market is known. Loans from abroad are estimated when the overall development programme is prepared, so that they provide a source of information for the maker of the sectoral programme concerned.

The item called issues can be estimated as follows. The concept that the money supply must increase at the same rate as the gross national product is taken as a point of departure. All the sources of funds which will be available to the public sector can thus be quantified, since bank loans will have to cover the difference between total requirements and the sources which have been analysed.

To determine whether the programme is or is not over-ambitious from the financial standpoint, the amount of bank loans which will be available for the private sector is studied. If it should prove that this sector's requirements cannot be covered, the whole programme will have to be revised, and the magnitude of the targets reduced or, alternatively, new sources of financing provided.

4. The medium-term budget as an instrument for formulating annual budgets

Once a medium-term budget is available, it is relatively easy to establish year-by-year targets. The procedures applicable in the two cases are very similar, except that in the second special attention must be devoted to the way in which investment is applied, whenever one project has to be completed before another can be begun; that much more effort must be made to tackle stability problems; and that it is not as a rule necessary to introduce substantial changes in the tax system every year.

The relationship between the two types of budget can be much better grasped if it is reflected that the medium-term budget is not so much a statement as a continuous process. It is not really a question of setting up targets for the next six years and rigidly adhering to their use as the pivot of all Government action throughout the period. This is impossible, because what can feasibly be done in the future depends to a great extent on factors which in the present are either entirely unpredictable or foreseeable only within very broad limits. Consequently, in countries where programming of this kind is applied, medium-term targets are revised every year. In other words, every year a new 5- or 6-year programme is drawn up. By means of this system, the hypotheses on which the projections are based can be reconsidered, and adjusted to the criteria afforded by the new circumstances. For example, export prospects may have seemed brilliant when the first projection was prepared, but they may alter in the course of time and necessitate revision of targets and of the instruments used to attain them.

The yearly revision of the medium-term programme entails an exhaustive analysis of the forces operating over the short term, which are those that must be taken into account in the preparation of the annual budget.

From this analysis it can be deduced whether there will be any need to apply a compensatory policy. It may happen, for instance, that export prospects are much more favourable for the forthcoming year than over the medium term, and in these circumstances the attainment of the corresponding part of the objectives may produce an inflationary situation. Since the stabilizing influence that can be exerted by public expenditure and tax

/policy depends

policy depends upon what happens in the rest of the economy, the Annual National Budget must be prepared. In form it is exactly the same as those on the basis of which the medium-term targets are determined, but in substance it differs from them in two fundamental respects. In the first place, the part relating to the expenditure and receipts of the private sector is a forecast. In the case of the medium-term budget, on the other hand, the figures for the private sector constitute a projection. The projection reflects the results which are thought to be at once desirable, and obtainable with the instruments of economic policy that can be applied. The forecast reflects the most likely results. If there were no unpredictable elements and if it were possible to measure the efficacy of the economic instruments with perfect accuracy, the two ought to be identical. Again, at the time when the medium-term objectives are prepared, a set of instruments of economic policy is established which must be maintained over a more or less lengthy period. This set of instruments may be efficacious provided that there is no change in the average conditions that were taken as a framework of reference when it was adopted, but may prove ineffective if temporary distortions take place. Fluctuations in the degree of efficacy of the economic instruments resulting from changes in conditions and circumstances may thus be another cause of discrepancies between the forecast and the projection.

Over the short term, the forecast is more useful than the projection for the reason already mentioned; it is not easy to adopt a fresh set of instruments of economic policy. Moreover, there are many instruments whose effects take a considerable time to make themselves felt.

The other basic difference between the annual and the medium-term budgets lies in the fact that in the preparation of the latter the prices of a given base period are taken as constant. The annual budget, in contrast, must make allowance for probable changes in price levels. In countries whose economy is greatly dependent on foreign trade, this consideration may be very important, both because a fluctuation in world prices may produce balance-of-payments movements without affecting the volumes of trade, and because such fluctuations may influence the over-all level of internal prices.

In a given month of the year the budget office or the programming office must be in a position to say what is likely to be the level of economic activity in the private sector and, in particular, what are the prospects for exports and the other sources of foreign exchange. These predictions are summed up or cast in specific form in the annual national budget. The annual budget will indicate the probable supply of goods and services, valued at the preceding year's prices, and the availabilities of specific goods and services which are liable to cause a bottleneck in the economy. Foremost among these are foreign exchange, foodstuffs, energy and certain types of skilled labour. In addition, it will establish the magnitude of global demand and of specific demand for goods and services of key importance. From a comparison between supplies of goods and services on the one hand and aggregate demand on the other, an idea can be formed of the force with which inflationary or deflationary trends may operate, as well as of the possible magnitude and composition of Government receipts and expenditure.

Once a decision of this nature is reached, the central budget office works out a provisional distribution of income among the various functions of the public sector; thence in turn the specialized executive agencies can draft their annual budgets.

Each of these agencies next prepares three alternative draft functional budgets - the volume of expenditure involved being equal in one of them to that fixed by the central office, exceeding it in another and in yet another falling below it. The first of these should show separately which are the activities that are expanded in relation to the average budget, why they were chosen and what benefits would be derived from their execution. The last must indicate which activities would be restricted and why it was thought preferable that the contraction should affect them rather than others. Each agency must also describe in as much detail as possible the priority criteria which were borne in mind in the selection of the proposed targets for each sub-function, and, where relevant, those which were utilized in choosing between alternative techniques.

/Once these

Once these alternative budgets are available, the next step is to study what degree of cohesion exists among the programmes prepared by the various specialized agencies. This study is carried out by inter-ministerial commissions comprising representatives of the central programming office, the budget office and the joint parliamentary committees. In reality, they should be standing commissions, to prevent mistakes in co-ordination, which are difficult to set right once the draft budgets have been prepared.

The co-ordination of the various functional and programme budgets having been checked, the budget office can proceed to choose a combination which will be conducive to the attainment of the basic objectives pursued, whether these relate to the expansion of production, to stability or to redistribution of income, each being given the weighting that will ensure achievement of the maximum net social benefit.



#### IV. CO-ORDINATION OF BUDGETS IN THE PUBLIC SECTOR

##### 1. Co-ordination of performance budgets within each sub-function

The sub-function was defined as the sum or aggregate of those tasks to each of which one and the same homogeneous unit of measurement is applicable. It was stated that primary education constitutes a sub-function because all the activities involved in its provision can be related to the unit of measurement "year of instruction per scholar", or pupil/year. As a rule, the literature on the subject refers to these units of measurement as units of final product.

The importance of defining final products or units of measurement can be more clearly grasped if the situation of a private entrepreneur is considered. If this entrepreneur manufactures only footwear, the output in question is homogeneous and production costs can therefore be accurately calculated. On the other hand, if he produces footwear, gloves and handbags, it will be much more difficult for him to avoid the application of arbitrary procedures to allocate costs to each type of product. Again, he prepares his production programmes in terms of units of footwear or of a combination of products, but not of a sum of heterogeneous products. In reality, if it were impossible for him to define homogeneous products he would be unable to form an opinion as to the efficiency of his operations or to prepare production programmes on any sort of operational basis. The same is true of the public sector.

Broadly speaking, it is not always easy to define the units of measurement of final products of the various Government activities. For instance, what may be the final product or products of policing? It is sometimes recommended that the number of offences and arrests should be used, but this obviously does not constitute an appropriate definition, since the object of the police force is not the mere adoption of measures against disturbers of the peace but the prevention of such offences. In fact, given socio-economic conditions, the fewer offences are committed the more efficient is the police force. The final product must therefore be defined in such a way as to indicate the effectiveness of the efforts made to fulfil the purpose of the function.

Some of the tasks carried out by the public sector cannot be related to a specific final product. Cases in point are the administration of justice, external defence, foreign affairs and others of the same nature. Here the procedure is based on what are termed units of volume of significant work. In the case of justice, for instance, the elements utilized are the number of sentences pronounced and the number of appeals and other petitions presented, so that the requirements of the corresponding services can be evaluated. In these instances the programme budgets can only be prepared and presented in monetary terms. If, however, significant work units can be used, the amount of resources that will have to be earmarked for this type of activity in the future can be projected on the basis of past experience. The efficiency with which the type of activity in question is carried out will have to be judged by means of a comparison of the changes through time in indices of volumes of significant work, on the one hand, and, on the other, in monetary expenditure.

There are yet other tasks in which the definition of the final product seems a very simple matter, since custom has sanctioned the use of certain definitions. However, brief consideration suggests that they are not the most appropriate. With respect to transport, for example, the final product generally used is the kilometre of road built according to certain technical specifications. A serious drawback attaches to such a unit, since the objective of this type of activity is to facilitate transport of goods and passengers. Road-building is only an instrument with which to attain this end; it does not constitute an end in itself. This confusion may lead to the building of roads or other means of transport where there is no demand for the service concerned. The most appropriate unit of final product may in this case be the ton/kilometre for freight, and the passenger/kilometre for persons.

In public health programmes the final product depends upon the varying objectives that may be pursued through action of this kind. As a rule, a distinction is drawn between measures for the protection, for the promotion and for the restoration of health. The aim of protection is to avert the risks deriving from community life, and includes such activities as control of contagious diseases, inspection of food and

/drinking-water,

drinking-water, etc. The object of health promotion measures is to improve conditions for the physical and mental development of the individual through the encouragement of dietary habits, occupational hygiene and other similar activities. Lastly, the measures bearing on the restoration of health pertain wholly to traditional curative medicine. This list of the objectives of the public health function suffices to give some idea of the difficulties arising in connexion with the specification of units of final product. However, as every unit of measurement is always conventional, specialists in the fields concerned will be able in the course of time to establish units which meet the requisites of describing the objectives that has to be measured and being susceptible of quantification.

So far units of measurement or of final product have been discussed in relation to sub-functions. A few brief remarks must now be made on units of measurement by activity. As will be recalled, an "activity" was defined as a set of similar tasks which have to be carried out in order to attain the target established for a sub-function. To take once again the example of the transport function, road-building corresponds exactly to the definition of an activity given here. In this instance too it is necessary to define units of measurement or of final product which are as far as possible quantifiable.

Since the executive aspects of administrative organization are much more highly developed than those concerned with programming, and units of final products relating to activities are more useful for executive purposes than those relating to sub-functions, the former have received much more attention. Thus in budgetary practice many definitions are found of units of measurement in the fields of education, public health, administration proper, policing, development activities, etc.

Units of measurement by activity, which must be homogeneous, like those which relate to sub-functions, present additional difficulties in this respect deriving from technical factors. Seldom is one kilometre of road built, or one hectare irrigated, exactly the same as another. In other cases - for example, in that of hospitals for lung patients - yields may differ from one to another because of changes in techniques

/for the

for the treatment of the disease. All these types of difficulties can be overcome by means of conventional solutions, which are satisfactory for the ends pursued.

To establish targets for Government activities and co-ordinate projects, not only it is necessary to define the final products or the tasks to be accomplished, but it is also essential to calculate the volumes of human and material resources that will be required and to determine their costs.

To calculate the volumes of resources necessary for attaining the targets set up, certain technological relationships are used, expressed in terms of coefficients of measurement. In almost all sectors of Government activity, coefficients of yield from resources can be determined. It is thus possible to establish the volume of activities that must be developed in order to graduate the effects which will help to ensure a given quantity of final product, in accordance with a standard of yields. For example, the construction of a certain number of square metres of school premises makes it possible to educate a specific number of pupils, and requires the training of so many secondary school teachers employed in giving so many hours of classes per week or per year. In the field of public health, standards of this kind also exist. Thus, for example, if the number of patients that will be given attention is known, the number of beds that will have to be provided can be calculated on the basis of the average coefficient of days in hospital per patient. In this way it is possible technically to establish the target for available hospital beds which is compatible with the other objectives programmed, such as those for the expansion of hours of medical or paramedical attendance, probable pharmaceutical requirements and other aspects of the activity in question. The same thing happens in the case of transport. If, for instance, it is established that the vehicle park will be enlarged in a specific proportion, the average "vehicle/kilometre" coefficient can be applied to determine the intensity of road use and subsequently to check whether the road-metalling target is or is not properly adjusted to the target for the expansion of motorized transport. Supposing that, in default of this procedure, a country were to initiate a policy of substantial facilities for importing lorries, passenger-cars and other motorized vehicles, without taking the necessary steps to extend the network of

/metalled roads,

metalled roads, the result would be an additional expenditure on spare parts and repairs which would exert a negative influence on the social benefits of such a policy, thus detracting from the usefulness of the programme in question. It must be made clear, however, that these relationships should not be taken as inflexible, but should be adopted for calculation purposes as approximate indicators wherewith to define volumes of resources, a matter in which the good judgment of the programme-makers must be brought into play.

Once an estimate has been made of the volume of resources required for the attainment of targets in each sector where this is possible, the process of calculating costs of targets by activities begins. The object of the system of programme and performance budgets is precisely that of determining the costs of each of the final products or activities programmed.

The procedure for the public health sector is to calculate costs and construct performance budgets after first determining costs per unit of final product. For example, with respect to the food target, an estimate is first made of the total number of rations that will be distributed in hospitals in the course of one year, the average cost per ration is next determined and, lastly, the total number of rations programmed is multiplied by their unit cost, the result being the total value of the target established.

Where pharmacy is concerned, prescriptions per consultation and per bed/day are taken into account for the purposes under discussion. In the case of care and medical treatment of hospital patients, the starting-point is the number of beds available; the average number of patients daily is next calculated, that is, the average day/stay, and the occupation of bed is determined; the number of patient/days is then established, on the assumption that a hospital functions 365 days a year; subsequently, the cost per patient/day previously calculated is multiplied by the number of patient/days, and in this way the cost of the activity is calculated. This method is applied to estimate the cost of each activity, and the budget for the year concerned is drawn up, on a basis of classification by sub-function and by public health activity. A similar procedure can also

be adopted for other sectors of Government activity. In the case of education, the cost per pupil is determined; in that of road transport, the cost per mile or per kilometre of road or street; in that of policing, the cost per prisoner, etc.

In connexion with the establishment of unit costs, various problems arise, to which due consideration must be given by the authorities responsible for preparing the budget. In the first place, the normal cost of one kilometre of road varies from one year to another as a result of fluctuations in price levels; in countries with a rapid rate of inflation it is difficult to determine a significant average annual cost, and in those where public investment has a high import content it is sometimes impossible to predict the influence of devaluations of the exchange rate. In the second place, costs may vary as a result of technical innovations, in so far as these lead to a saving of time, labour and materials which often implies a substantial reduction of costs, as well as changes in their composition, in accordance with the structural modifications that have to be introduced in the combination of resources.

The targets in a programme budget are attained through the activities specified in the performance budgets which compose it. In many cases, in order to achieve any sub-functional objective various combinations of activities can be used. For example, to provide a given number of pupil/years of primary education the construction of a certain number of school buildings can be combined with the training of a certain number of teachers, but the proportions can be altered, more importance being attached to either one or the other of these activities. Which of these combinations is preferable?

A problem of selection also arises within each activity. For example, if school premises have to be erected, it must be decided how many square metres will be built per pupil, what the characteristics of the buildings will be and what materials are to be utilized.

In both cases, in order to ensure that the choice made is in no way arbitrary, some standard or norm on which to base the requisite decision must be available. These standards are known as priority criteria.

/In practice,

In practice, several types of priority criteria are used, but all have features in common. The chief of these is the invariable need to measure, on the one hand, the benefits deriving from the proposed action and, on the other, the costs which its execution implies. In the example given above, the benefit would be represented by the number of pupil/years and the costs would correspond to the monetary value of the set of activities selected with a view to the provision of this service. The coefficient obtainable from these figures would have different values according to the combination of activities chosen. It might happen that if stress were laid on the building of school premises, more money had to be spent per pupil/year than if the emphasis were placed on the training of teachers. In that case, unless there were intangible costs or benefits, the second combination of activities would be preferable to the first.

Selection within each activity entails action on the basis of projects. By a project is meant the set of tasks which must be performed in order to fit any productive unit for independent operation. For instance, according to this definition, the building of an irrigation dam would not be a project, since its construction alone would not suffice to permit the irrigation of new land. In the case of school premises, the project would consist in the building of the premises and the supplying of equipment. This definition in terms of independently operating productive units is very important, because for engineers the concept "project" has a different meaning. If budgetary resources are allocated to a "project" which does not constitute an independent unit, it may and often does happen that works are constructed and for a long time left unused or that they are not correctly evaluated.

In the case of activities, the problem of priorities consists in determining which is the most advantageous combination of projects.

The nature of the difficulties attendant upon the selection of projects is in broad outline the same as for the selection of activities, although in practice obstacles of a different kind arise, in accordance with the type of project, in relation to the definition and measurement of

/both benefits

both benefits and costs. These problems cannot be fully discussed here, but, by way of example, some aspects of the evaluation of road-building projects may be briefly described. In the determination of priorities, the main difficulties derive from the method used to estimate the benefits accruing from roads. For this purpose, the authorities responsible for road-building plans have worked out statistical methods of measurement, which take into account the influence of the population; of agricultural, industrial and mining activities; of the tourist industry; and of transport of goods and passengers. The population factor takes into consideration direct transit between cities and towns. Such transit can be approximately measured by means of the vehicle/kilometres registered between various points. In order to calculate these vehicle/kilometre it is necessary to ascertain what traffic is likely to use a road of which the construction is contemplated.

To make the estimate, an equation is used which is a function of towns and the distances between them. This equation relates the population's travel needs - which depend on the economic, social and cultural activities of the various built-up areas, and which are symbolized by "T" - to the number of inhabitants in two built-up areas, symbolized by "P<sub>1</sub>" and "P<sub>2</sub>" and to the distance between them, symbolized by "D", with a proportionality constant "K". This formula runs as follows:

$$T = K \frac{P_1 P_2}{D_2}$$

The formula can be applied to any case; the proportionality factor K is the same for all roads that are equally fit for traffic at a given time, and can be deduced from the data relating to traffic between different places. By its means the probable amount of traffic can be approximately estimated, and the benefits of a road which does not yet exist can be compared with those of one in service. As has already been pointed out, it expresses only traffic between towns, and must therefore be adjusted to take into account the incidence of agricultural, mining, industrial and

/tourist activities



tourist activities on road networks. That of agriculture is measured by the total value of the estimated agricultural production of the road's zone of attraction, divided by its length. This index is used to prevent long roads traversing areas of little agricultural value from working out to be more important than short roads running through potentially rich areas. The estimates must be based on the most comprehensive data that can be obtained with respect to the land under cultivation, showing products and average yields per hectare. Each cultivated area is divided into sectors corresponding to the zones of attraction of the roads under consideration, and the quantities of each article which each sector is capable of producing are calculated. Next the monetary value of the products of each sector is estimated on the basis of average prices in the area for the farm year in question. The influence of mining is taken into account in the same way, except that the estimate excludes large mining enterprises whose output is carried by rail, as well as mines producing high grade gold and silver in small volumes, which do not need good roads. The only mines taken into consideration are those using highways and having a minimum annual output of 500 tons. The influence of industry is evaluated by estimating existing and probable industrial production in the zone of attraction and calculating what proportion of the raw materials and finished products will be transported by the roads concerned. The influence of the tourist industry is measured in terms of passenger-car traffic, the total volume being determined by means of a comparison between that registered in the tourist seasons and the figures for the rest of the year. Another way is to compare the number of tourists registered at hotels in the various areas of interest; it is assumed that a certain constant percentage of tourists for all zones travels in cars and buses. The point of departure of the tourists visiting each centre is next determined, so as to ascertain the roads they will use. Some specialists recommend preparation of an index of benefits for an "ideal" road. For this purpose, in specific areas the best sections of each existing road are selected until a length of 100 kilometres is completed. The index for each factor of influence is next calculated for each of these sections, weighted in every case by

/the relative

the relative importance of the various agricultural, mining, industrial and other activities in the area. The resulting indices for each section chosen are averaged, a value being thus obtained which is taken as equal to 100, and which represents the best or ideal road for the area. Every road-building project which shows an index of benefits approaching 100 will have a high priority.

All those agencies which are responsible for drawing up a programme budget must prepare a number of projects such that the sum of their costs is higher than the maximum allocation of resources that can be contemplated for the financing of the activity concerned. For example, if it is expected that 20 million pesos will be available for road building, the projects evaluated should total more than 20 million. If there are projects only for 20 million pesos, those will be the roads that have to be constructed and there will be no possibility of comparison.

Each of the projects has an index of priority, so that they can be arranged in a scale headed by the project with the highest priority. Opposite each project is shown the total cost of its execution plus that of all the others preceding it in the scale of priorities. It is thus a simple matter to determine which will be the projects to be carried out once the allocation of resources to each activity is established.

A similar process takes place with each of the activities making up a sub-function. Each has an index of priority, and by means of comparison it is possible to select the one best calculated to promote the objective of a sub-function.

When the selection of projects and activities has been completed, the agency carrying out the studies finds itself faced with a series of alternatives in support of which it will be in a position to adduce objective arguments, in the certainty that, in any event, it is recommending the best combination of activities which can be conceived on the basis of the data available.

## 2. Co-ordination of programme and functional budgets

Integration of the targets of the programme and performance budgets having been achieved through the process of evaluation already described, the sub-functional objectives must be duly related to those of functions.

Activity targets are expressed in terms of homogeneous final products which can easily be integrated within the sub-function, but the same does not apply to the integration of sub-functional with functional targets, since the former are expressed in units which cannot be added together. For this purpose, the programme budgets must be grouped in monetary units so that the total cost of the function may finally be established. The method of comparing a functional budget with others, therefore, is through their respective costs, since, as has already been pointed out, it cannot be done in terms of final products. In view of these considerations, the spending of larger sums on a particular function than in some other way becomes an entirely political decision, and most countries seem to have envisaged it thus, inasmuch as they have established in their budgetary procedures mechanisms to permit the incorporation of political decisions and the influence of the groups which exert pressure. Through the preparation of the budget at the executive level and its discussion in parliament, the distribution of resources among the sectors is finally determined. The officials responsible for preparing budgets receive the various functional budgets, presented in accordance with the scale of minimum, average and maximum alternatives referred to above, and decisions as to the degrees of intensity with which the various programmes will be developed are incumbent upon them, in the first place, and then on the members of parliament, who have the last word on the importance that shall be given to each sector.

The establishment of priority criteria is, as has been shown, the cornerstone of the co-ordination of public action at the level of projects and activities. On the other hand, co-ordination of functions and of Government action as a whole with private enterprise is effected on the basis of political decisions. However, the problem of co-ordination in general is broader and it is worth while to add a few further remarks in this context.

/Well-ordered

Well-ordered governmental effort in pursuit of the objectives selected calls for the creation of institutional mechanisms to assemble decisions and synchronize their implementation. State activity should be co-ordinated in two directions - towards the formulation of programmes of action, and towards their execution. To serve the first purpose, the Government must create an institutionalized programming apparatus by means of which it can formulate sectoral programmes and subsequently integrate them in an over-all programme. This mission is fulfilled by the sectoral programming offices of the ministries and agencies and the central programming office. Within the programming system itself a co-ordinating mechanism is needed to synchronize studies, preparation of statistical data and the other information required by the programme-makers. There are various methods by which this co-ordination can be achieved. Some take the form of technical co-ordinating committees, while others consist in the creation of committees to promote unofficial contacts among programme-makers. Institutionalized systems are those applied, for example, in the Netherlands, where the inter-departmental commissions made up of technical experts from the ministries and representative of the Central Programming Office effect co-ordination among the sectors. Another mechanism is that used in Norway, where an Advisory Committee on the Economic Budget exists, the members of which are 30 high-ranking officials representing the ministries, and which is responsible for co-ordinating the sectors. The same task is performed in the United Kingdom by the Economic Planning Board; in the United States, by the Advisory Board on Economic Growth and Stability, and in various Latin American countries, by the Co-ordination and Programming Boards. Systems based on informal contacts operate mainly at the level of ministries and official agencies. Their disadvantages lie in the fact that they leave co-ordination entirely to the initiative of the programme-makers.

In a second direction, co-ordination relates, from the standpoint under consideration, to the unified execution of programmes. As a rule, this type of co-ordination is effected through Cabinet meetings or the action of ministerial Under-Secretaries, while the programming agencies have to exercise general supervision, and, above all, perform the task of evaluating the implementation of policy and programmes.

V. NECESSARY CHANGES IN GOVERNMENT ORGANIZATIONS TO PERMIT  
THE USE OF THE BUDGET FOR PROGRAMMING PURPOSES

In most of the Latin American countries, with the extension of the sphere of competence of the State new agencies have come into being. Development corporations, investment banks, social security institutions and other autonomous bodies have been created to absorb new functions in the promotion of development. Thus, in the apparatus of Government a process of "growth by aggregation" has taken place. To the increase in the functions of the State corresponds a correlative increase in official agencies.

But over against this type of purely quantitative development of the machinery of the State, qualitative changes in the apparatus of Government may also come about. A change of this kind generates new methods of action, new procedures; it engenders modifications not only in the anatomy of bureaucracy but also in the physiology of government. A case in point is the introduction of a system of performance budgets.

The establishment of a budget of this type implies radical alterations in the structure and operation of governmental machinery, and, what is more, a metamorphosis of the behaviour patterns and mental attitude of public officials. Action in terms of previously established programmes constitutes a sweeping reform; hence, in order to introduce the system, an invisible and powerful enemy must first be overcome - established custom.

1. Adjustments in governmental machinery to create a  
system of programme budgets

To bring the programme budget into being, a complete strategy should be worked out to lead, step by step, to the introduction and subsequent operation of the new system.

The following are the two most important of the basic tools which Governments have to handle: the central budget office and the "pilot groups" for budgetary programming, set up at the key points of the governmental apparatus.

Functional and programme budgets cannot be grafted on to the administration from above; the basic work must begin at the intermediate and lower levels.

/To judge

To judge from the experience of various countries - including the United States, Puerto Rico and the Philippines -, the following are the chief steps which must be taken in order to establish a functional budget:

1. A high-level decision must be adopted as to what part the Government is to play in economic activity; to this end, the quota of national income which will be absorbed by the public sector is established, and the appropriate proportions are allocated to the central Government and to the decentralized bodies.
2. The participation of the Government in the development process, must be determined, together with the quotas of Government resources which will be earmarked for investment, consumption and transfers.
3. Funds for consumption, transfers and investment must be distributed among the various functions which the Government will fulfil in the forthcoming year. Quotas for public health, education, policing, agriculture, etc., are allocated in accordance with the corresponding sectoral development programme.
4. Once the quotas are fixed, the central budget office must help to determine the work programme which are to be developed in the performance of each functions; the ministries and public services must try to differentiate between the sub-functions and to establish programmes with due care to define the responsibility of the public officials concerned.
5. The programmes having been established, the structure of administration must be studied, so that each directorate, department or division can be made responsible for a complete programme or for part of it.
6. Units of activity must be defined within each programme; these units may be a final product or an activity or piece of work.
7. The cost of each activity must be measured; if the volume of inputs and their respective values are ascertained, the cost of each programme can be determined.
8. An internal information system must be organized with the object of measuring the progress achieved in the execution of the programme and comparing its results with the original plan.
9. The annual programme budget bill must be presented to this end, the system of allocations should be simplified so that as far as possible each programme could be financed with a single allocation.

10. Accounts must be opened and kept for the supervision and registration of expenditure on the basis of programmes, broken down by units of final product or of significant work.

It should be made clear that, in taking these steps, the central budget office must maintain close contact with public officials and standardize programme nomenclature and structure. But it must also be recalled that during the phase of establishment the greatest responsibility is shouldered by the public officials who have to prepare the programmes and budgets; it is they who must ensure that the programmes are studied in such a way that the administration can effectively follow the lines laid down therein.

2. Reforms in the budgetary process to permit  
the operation of budgetary programming

Once a programme budget system has been organized, the supplementary measures required to permit its "operation" must be adopted. To this end, a study should be made of the most important measures that must be taken if the budgetary process is to lead "naturally" to the formulation and integration of programmes, to the evaluation of the pertinent priorities, to their expression in budgetary terms, to their approval by the public authorities, to their implementation and subsequently to their inspection by the State. In this connexion it is worth while to formulate the following considerations:

1. It is essential that Governments should substantially reinforce their programming systems or agencies at all levels of public administration, endowing them with the necessary specialists and resources; a good programme budget is inconceivable if those who prepare the programmes are not technically trained to do so.
2. Central programme and budget offices must be created or strengthened. The former are mainly responsible for over-all programming and for the programming of public investment. This latter must be co-ordinated through a capital or investment budget for the public sector, prepared by the central programming agency itself. Operational and transfer programmes would be incumbent on the central budget office, whose task it

/is to

is to formulate and administer the general budget. In all the Latin American countries the central budget offices must be organized on strictly technical bases. During the next few years important work will have to be done in respect of the training of specialists in budget questions, so that there will be no lack of human resources with the technical knowledge essential in any attempt at reforming the budget for the purposes described.

3. Governments will have to draw up schemes which are at once theoretical and operative, so that they can establish an order of priorities in their programmes. The formulation of a practical and handy method of evaluation, even if it is not highly perfected to begin with, is a task which must be undertaken without delay. The establishment of evaluation standards or criteria is indispensable for budgetary programming, as there has already been an opportunity of pointing out.

4. The basic inflexibility of legislation, which hampers budgetary programming, must be eliminated. A case in point is that of expenditure which is compulsory under the provisions of permanent laws that the annual budget legislation, temporary as it is, cannot modify. It has been estimated, for example, that in one Latin American country 80 per cent of the central Government's expenditure is predetermined and cannot be altered by those responsible for preparing the budget. Unsound practices like, for instance, that of creating taxes allocated to specific purposes and earmarked for the formation of special funds will also have to be reduced to a minimum. Another undesirable custom is that of burdening the executive with the obligation to present to the legislative a balanced draft in which income and expenditure are levelled up. To facilitate programming, the English custom of authorizing the executive to include changes in tax rates in its budget bill and thus adapt tax yields to the expenditure programme should be progressively introduced.

5. A budgetary statement constructed in accordance with the component programmes should be transmitted to the legislative. To this end, the latter should be supplied with a maximum amount of information on programmes and allocations, and endowed with standing ancillary agencies of a technical character, responsible for supplying technical data and studies which will enable members of parliament to discharge their functions with greater ease.

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In this way Congress would be converted into an agency thoroughly acquainted with the programmes and requirements of the executive.

6. Measures will have to be adopted to leave the execution of budgets and programmes in the hands of a central directorate. The synchronization of objectives and the timely and appropriate allocation of resources can be achieved through a department set up in the central budget office or in the Ministry of Finance.

The centralization of the execution of the budget is reflected in a certain "normative" authority acquired by the central budget office. By virtue of this, instructions are issued to the various important services as to the method of investing funds and the dates for drawing on their allocations. In order to fulfil this obligation, the central office must have a clear conception of the receipts collected by the treasuries, of month-by-month requirements and of the financing possibilities that will exist in future months. For this purpose, seasonal fluctuations in the various types of income must be ascertained and the use of treasury funds throughout the course of the year must be properly programmed.

7. Radical changes must be introduced in the ideology and practices of the agencies responsible for financial administration and for official supervision of the budget. The book-keeping of the public sector must be adapted to the information and inspection requirements that derive from a programme budget.

The financing agencies must understand that the budget is a programming instrument and that financial administration is a mechanism for the execution and supervision of programmes and budgets. The fiscal administrator must recognize that the budget cannot be subordinated to the functions of collecting and taking charge of public funds, and keeping and officially auditing the accounts. Once the conception prevailing among any state officials has been modified, there will be no danger that financial administration will steer a mistaken course or that the officials concerned will lose sight of the final objective of their activities - that of contributing to the attainment of certain targets established in programmes. The distortion caused by a financial administration designed only to safeguard legality and trustworthiness will gradually disappear as

Governments grasp that in order to carry out the programmes formulated with the minimum waste of time, material and effort a flexible and efficient fiscal system is needed. The most important aspect of budget implementation does not, therefore, consist in the complicated administrative processes designed to give effect to measures of State control, but in efficient achievement of the objectives mapped out; Governments will thus cease to devote their attention to strengthening independent control agencies and will direct their efforts towards the creation of efficient systems of financial administration that spring essentially from the programming and budgetary mechanisms, and are unhampered by red tape.

Consequently, the financial authorities hold an important place in public administration. The financial administration agencies must be ancillary to the executive authorities. As has already been stated, their mission is, on the one hand, to collect Government revenue, and, on the other, to take charge of funds and apply them to the appropriate purposes. In the whole of this process they are co-operating in the fulfilment of the Government's decisions and programmes. Their role is to smooth out the minor difficulties which hamper the implementation of the programmes, not to eliminate the programmes themselves, or to prevent their correct application.