CHAPTER 2

LITERATURE REVIEW



2.1. The problems of budget allocation

- 2.1.1. The problems of The Bureau of the Budget (BOB). The Bureau of the Budget is one of the central agencies whose role, functions and authority can exert and have exerted great impact upon national development plans. But BOB is limited it its operations (Dhiravegin, 1987). These limitations are:
 - (1) A lack of a clear and well-articulated budget policy

The primary function of a budget is to serve as the main mechanism for translating abstract government policy into concrete action. For this to happen, government policy has to be transformed, via an analysis of objectives, resources, and other, relevant constraints, into an allocation plan controlled by a clear-cut budget policy. The divorce of the budget function from the planning function mentioned above has resulted in a lack of meaningful budget allocation policy beyond the goals, of carrying out "business as usual" with perfunctory reference to policy or development.

(2) Inability to curtail inappropriate operations

Because of the input orientation, there has not been a mechanism for phasing out inappropriate projects and operations of government gencies. Projects which have outlived their usefulness, projects which failed, and indeed projects which are counter-productive have been allowed to continue absorbing scarce public resource because there is little factual or analytical information to justify their curtailment.

(3) Pre-auditing

It has been found that about 60 percent of the **re**sources of the agency are devoted to the preparation of the annual budget and the control of budget spending. However, control is exercised largely in the **form** of pre-auditing (i.e.

allotment, transfer, impoundment and postponement approval). This practice has further reinforced the separation of the process of allocation from the evaluation of outcome. While the evaluation division has been doing good substantive work, its scope has remained very limited, and no evidence has been found that the results have been fed back into the budgetary process.

2.1.2. The problems of health care delivery system

Most health care providers in both less developed and developing countries face similar problem that remain dauntingly prominent in health care systems (Cassels, 1995). These problems are:

- (1) Scarce resources are used inefficiently: public funds are being spent on inappropriate and cost-ineffective services, too much is spent on salaries compared to operating costs, money does not get to those who they are need it, and it is hard to allocate budgeting.
- (2) People can not get the health care they need: This can be attributed to a variety of factors such as: an individual's means, geographical location, sex, age, or employment status.

2.2 Processing the finances of the health sector

- 2.2.1. The most appropriate form of budgeting and resource allocation will largely depend on the organizational structure of the health service, and in particular on its degree of centralization. We have stressed that budgeting is an integral part of effective planning, being the means to achieve resources and hence action. Planners who fail to get involved in the budgeting process are handicapped from the beginning. The budgeting process as out line by Green, 1992 is as follows:
 - (1) Review of previous year. The first stage of a budgeting process should involve a review of the previous year, as part of the ongoing monitoring role of planning. This should occur at all levels of the service, and can be seen as part of revision of the situational analysis. Within the specific context of budgeting, the

review should consider the levels of expenditure by different services against the service targets set within the plan and against the indicators of achievement of these targets.

- (2) Review service objectives and targets. The concept of a rolling plan allows annual reviews of objectives and targets to affirm or amend them. During this process, changes in emphasis may be placed on different areas of the service, as a result of either a change in external circumstances or priorities, or practical experience of service provision.
- (3) Central government resource guidance. The central government ministries should provide guidance on the likelihood of the budget for the ministry as a whole, together with regulations regarding personnel or planning requirements.
- (4) Discussion and negotiations between different levels. The next stage in the process involves negotiation over the level of individual budgets with the managers of different services. Such discussion may take many forms, this diversity in part reflecting the differences between a bottom-up and a top-down setting approach, depending on the budget-setting approach adopted.
- (5) Set draft budget. The ministry should be in a position to draft an overall budget close to the central government guidelines. Indeed the discussion which occurs at this level is analogous to that which occurs carried out at lower levels among the service ministry staff.
- (6). Final budget set by central government. The last stage of the process involves the final approval of the budget by central government, and by the political levels of government. This approval then provides the authority for budget-holders to allocate expenditure according to the budget set.
- 2.2.2. E .P. Mach and B. Abel-Smith, in 1983 present definitions of personnel health services, health-related activities, capital and recurrent expenditure, and sources of finance. It is useful to make a distinction between personal health services (services to improve the health of identifiable persons) and health-related

activities (which promote the health of the population collectively). This is not because one category is necessary more important than the other but because the activities are of a different character. The distinction is not always clear-cut. Moreover, in view of the wide range of activities that have some influence on health, any attempt to draw a line around health-related activities must inevitably be a matter of somewhat arbitrary convention.

- (1) Personnel health services. Obviously these include the services to persons provided by health trained personnel, the cost of the buildings and supplies they use and the other personnel who work with them. The services may be preventive, curative or rehabilitative. The cost of training the personnel is part of the cost of providing the services. But what about traditional practitioners who are apprenticed rather than trained, and herbal remedies where evidence of effectiveness is not available? It is proposed that services should be defined in terms of purpose rather than achievement. Even the most highly skilled care may not improve the health of a particular individual. Thus all services purchased or used for the purpose of health improvement should be classified as personnel health services.
- (2) Health-related activities. It would not be useful to include all expenditures which might contribute to health, for example, all expenditure on food, housing and water supplies. Many people spend much more on housing and food than is necessary for health and some water supplies are used for agricultural purposes. The aim should be to include expenditure on nutrition, water supplies and sanitation which (a) have clear health purposes and (b) are primarily to meet basic needs.
- (3) Capital and recurrent expenditure. In both personnel health services and health-related activities a distinction should be made between capital and recurrent expenditure. Expenditure on water supplies or on basic housing can be capital or recurrent. In general, the acquisition of a durable asset with a life of more than one year, such as land, buildings, equipment, vehicles and furniture, is counted as capital expenditure. Some countries include within recurrent

expenditure the depreciation and interest and shares on capital assets as the annual cost of the use of the assets. This item should be separately identified. It is not appropriate to add together some items of expenditure that include depreciation and interest charges and some that do not. In national totals, depreciation and interest should be either included in all cases or completely excluded.

(4) Sources of finance and categories of health expenditure to planning the finance of the health sector. It is suggested that attempts should be made in studies of this kind to trace back funds to their original sources (e.g., to determine which income groups pay the taxes or health insurance contributions that finance personal health services and health-related activities) unless there is a specific research objective. It is rather proposed that funds should be classified according to the agency that originally provided them. Thus grants from central government to compulsory or voluntary health insurance or to local government, or from central or local government to voluntary bodies, are classified as the funds of the grant provider rather than the spender. Funds coming from abroad should be separately identified, though they may be channeled through government or voluntary bodies (e.g., mission hospital or agencies providing family planning). In Thailand and most other countries all source of finance can be classified under the following headings:

(a) Public sources

- ministry of health
- other government departments
- regional and local government
- compulsory health insurance

(b) Private sources

- private employers
- private health insurance
- local donations (cash)
- private households

- 2.2.3. The Israel Information Center was to explained the health insurance situation Israel in 1996. The National Insurance Law provides for a standardized basket of medical services, including hospitalization for all residents of Israel, which must accept all applicants regardless of age or state of health. The main sources of funding are a monthly health insurance tax of up to 4.8 percent of income, collected by the National Insurance Institute, and employer participation in the cost of insurance for their employees. The insurance schemes are reimbursed according to a weighted average number of insured persons, calculated by age and other criteria determined by the Ministry of Health.
- 2.2.4. From the research of the government in Bangladesh (Kawnine,1996), health sector finance was planed by balancing resources and expenditures
- (1) Future public expenditure patterns. Any estimation of the future must take into account the official public plans. Approved objectives, targets and cost effective strategies would ideally provide the framework for a costing exercise. In turn the financial feasibility of such plans can be tested by detailed costing of activities and comparison with available resources. Activities can then be prioritised according to their cost effectiveness. The initial forecasting of cost in the public expenditure review relied on extrapolation. While this may have been useful at the time it is not appropriate for examining desegregated expenditure projections. A compromise is required which can give indicative results within a limited time-frame and with the available data. Two possible methodologies should be considered: financial costing based on delivery of specific services and expected future individual projects and their impact on the health.
- (2) Balancing resources with expenditure. A reduced capital investment scenario for the health sector is a means of cutting forecast expenditures. Improved efficiency at the facility level may well save valuable costs.

2.3. Equity in budget allocation for health systems

Definition and basic concepts: The equity in health and health care (World Health Organization, 1996)

- Equity means that people's needs guide the distribution of opportunities for well-being.
- Achieving equity the reduction of reducing unfair disparities as well as meeting accept able standards for everyone.
- Pursuing equity in health and health care development means trying to reduce unfair and unnecessary social gaps in health and health care, while working efficiently to achieve the greatest improvements for all.
- There are both ethical and pragmatic arguments for equity in health and health care.
- Equity in health care requires equity (a) in the way health care resources are allocated, (b) in the way health services are actually received, and (c) in the way health services are paid for.

This initiative is concerned with avoidable gaps in health status as well as in health care. Widening gaps in health status may be one of the most sensitive indicators of problems regarding budget allocation or social policy, and responses by the health care sector alone may not be effective or efficient.

The first element in any "equitable" allocation formula is the population. Resources, at the most simple level, should be allocated to states and districts on the basis of their population. Such an allocation formula needs good population data and this is often not readily available in an accurate and up-to-date form. However, the use of such a formula sharpens the incentive for the collection of good data. It can also, of course, lead to falsification of population returns to enhance resources. (World Bank ,1998)

A common criticism of a simple capitation formula is that it does not reflect the relative needs of different population sup-groups. For instance, a State may have a

large number of poor, unemployed people whose health status is inferior to that of a neighboring area. In richer countries some areas have larger numbers of elderly people who, as they survive into their 70s and 80s have huge resource demands.

Consequently, policy makers may wish to weight population by measures of relative need such as:

- Mortality: those states with higher standardized mortality rates (SMR) might be given more resources.
- Morbidity: those states with high levels of illness might be given more resources.
- Cost variation: if wage levels vary between States (often they do not due to central wage setting); allocation adjustment may be necessary.
- Other need indicators:
 - (a) income
 - (b) unemployment
 - (c) age: more resources are needed where there are larger numbers of young infants or elderly

These revisions have led to modifications in the basic Resource Allocation Working Party (RAWP) formula but not the abandonment of the principles of allocation by weighted capitation. As applied in England, the new system allocates each of the 100 Health Authorities funds on the basis of its population weighted by three factors: age structure, health needs over and above age factors, and the local costs of delivering services. Thus the weighted population is:

WP (weight population) =
$$POP(1+a) (1+n) (1+c)$$
(2.1)

Where POP is the authority's unweighted population, a is the age adjustment for the authority, n is its needs adjustment and c is its relative cost adjustment. Thus each adjustment is treated independently.

In 1981, Maynard and Ludbrook, adapted the method of RAWP in order to compare between England, France and The Netherlands. They found that there were inequitable in giving the budget as the there are fewer regions in England than in France or The

Netherlands. And the study of Pekurinen et al. in 1981, show that there was inequity in managing the resources in Finland. It shows that the developed countries still distribute public health resources between the regions inequitably. In addition, the method of RAWP can be used to measure the inequity in the use of health care resources developing countries (Beven in 1991). Reven's results showed that the developing countries have limited information, which is necessary in using the method of RAWP method. To use this method of measurement in allocation of the resource the expense per person in the region is calculated. It is the standard for improving the level of equity in public health care resource allocation.

In 1995, Linda produced a study on Equity in Budget Allocation for Health in Thailand. The purpose of this study was to suggest a resource allocation model for achieving equity of health at a provincial level. The equity is defined as an equity of health service facilities in the fiscal year 1992 under the responsibility of MOPH and uses secondary data from the fiscal year 1990, analyzing using both a descriptive method and stepwise multiple regression equation method. This study uses standardized mortality rates as an indicator of health needs of people in each province. The results of the study show three types of budgets. The first is the model to allocate nonlabour recurrent. The second model is for nonlabour recurrent budget, including the welfare budget for low income people and the aged, plus the fund from Family Health Division and General Communicable disease division. And the third model is for allocating recurrent budget of health service facilities at tumbon, district and provincial level, including salaries of health personnel and the welfare budget those with low income and the aged plus the fund from Family Health Division and General Communicable Disease Division.

In the first and the second model output (hospital day inpatients, number of out patients), the population adjusted by standardized mortality rates, and the average income of each province are factors playing vital roles for the budget allocation. In the third case, the most significant factor is the number of bed patients, although the other factors still play a vital role in the same level as the first and the second case.

Because the factors playing vital roles in the budget allocation are the same as in the existing budget allocation, only standardized mortality ratio is introduced as a

factor expressing demand. When comparing the results from the models and existing budget allocation, there are discrepancies both in amount of budget allocation to the provinces and budget per head in a certain number of provinces. But comparing the budget per head in each province with the average per capita budget, the directions of differences are shown to be consistent.