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# REPORT

on

# GUIDELINES FOR DEVELOPING A STRATEGY FOR FINANCING NATIONAL SHELTER NEEDS

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# PREFACE

These guidelines have evolved from several studies of housing in Sri Lanka that have been undertaken since 1980, sponsored by the Office of Housing and Urban Programs, Agency for International Development (AID). Many people have contributed to these studies. Donald Gardner has been responsible for much of the work, and more recently Raymond Struyk, John Tuccillo, and Nan Humphrey have made significant contributions. These guidelines, which drew heavily on the work of these individuals, have been drafted by John L. Goodman, Jr.

At AID, Sean Walsh and Philip-Michael Gary have reviewed and commented on these studies and provided general oversight to this research.

These guidelines are to be viewed as preliminary; they will be expanded and refined in the near future through reviewer comments and field application.

# I. INTRODUCTION

Finance stands as a major stumbling block in attempts to improve housing conditions in developing countries. Recent studies have shown that safe, sanitary housing is within the economic reach of most people in developing countries. But because of the inability to borrow the sums required to achieve that housing and due to institutional impediments, typically only a smaller fraction of the population actually achieves adequate housing. Availability of housing finance is, then, a key to achieving improved housing conditions in developing countries as well as in the more developed countries, where financial facilities and markets are more mature.

To establish a framework for specific actions to improve housing conditions through enhancements to housing finance, it is necessary to develop a strategy that takes account of finance needs, current institutions, market performance, and government objectives and policies. Based on these factors, quantitative estimates of financial needs and finance provision under alternative assumed government policies and private sector performance can be developed. A housing finance strategy can serve as a planning tool and reference not only for developing comprehensive national finance plans but also for consultation when specific project plans are under consideration, in assessing how a particular project will further attainment of the nation's housing needs.

## A. PURPOSE AND INTENDED AUDIENCE

The purpose of this document is to offer a blueprint for developing a strategy for financing national shelter needs, defined broadly to include not only structures but also land and infrastructure. These guidelines offer an annotated checklist of factors to be considered, some methodological tools for conducting key computations, and an integrated conceptual framework for bringing the pieces together.

The audience for these guidelines are housing and planning officials charged with forecasting national housing finance needs and with developing a strategy for meeting those needs. These individuals may be in agencies of the national government or with international lending and technical assistance agencies that promote economic development. The individual in charge of developing the strategy should have a background in housing finance. This document is not intended as a primer on housing finance, nor does it go into detail on any of the topics addressed.

A housing finance strategy should not be the first housing study conducted for a country. Development of an overview of the national shelter sector is a prerequisite. Compared to a shelter sector assessment, a housing finance strategy will stress, obviously, the financial aspects of housing. The finance strategy also will be more quantitative, and less descriptive of institutions and programs. The finance strategy is also characterized by its focus on the future, both in terms of the needs for housing finance and the ability of the economy to provide that finance.

## B. UNDERLYING ASSUMPTIONS

The guidelines presented here are based on several assumptions which underly the presentation. The first is that the scarcity of development resources means that large subsidies cannot be provided to the housing sector. This being the case, development of affordable housing standards and recovery of government housing investments through user charges or tax schemes is important.

Second, any subsidies that are provided either through direct government financing of housing programs or through indirect mechanisms such as interest rate controls, should be targetted on the lowest income groups.

The third assumption is that the incidence of outcomes by both income group and geography are important and should be highlighted. Both needs and policy impacts vary across each of these dimensions. With regard to geography, housing costs and servicing by financial institution vary between urban and rural areas, and thus this breakout is an important one. As to income, housing policies can have differential effects by income group, and public policy emphasis on improving the housing of the poor argues for special attention to this group.

## C. DATA REQUIREMENTS

As mentioned, a shelter sector assessment or similar overview document is a prerequisite for a housing finance strategy. However, even with this document in hand, there will be certain information that cannot be assembled even through further field work. The information may simply not exist. For example, oftentimes there will be incomplete information, if any, on which government programs and financial institutions serve which people. These guidelines represent a best case scenario for data availability. Clearly, compromises will have to be made in many instances and assumptions made about missing data. The exercise of developing the strategy can itself be useful in pinpointing key pieces of information required before the finance strategy can be put in place.

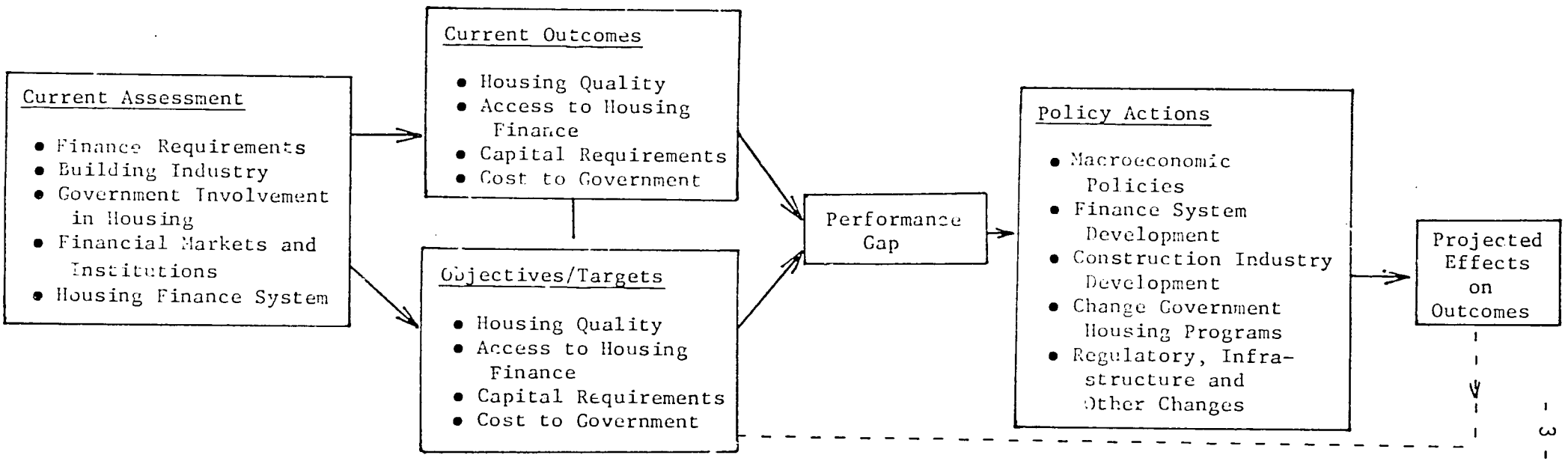
## D. OVERVIEW OF THE APPROACH

Development of a strategy for financing national shelter needs can be viewed in terms of the schematic diagram in Figure 1. An assessment of current needs relative to current provision of housing finance together determine the current outcomes in terms not only of housing conditions but also in terms of the macroeconomic outcomes such as GNP allocation to the housing sector and percent of the government budget going to housing. These current outcomes can then be compared to the government objectives in each of these areas. These quantitative objectives may not be explicitly stated in any government pronouncement. If objectives have not previously been set, they can be set as part of the finance strategy development. Going through the assessment of current conditions will make it possible to set objectives that are realistic in terms of the current outcomes and the potential rate of improvement.

A gap will undoubtedly exist between the current conditions and one or more of the government's objectives. A number of policy options are open to the

Figure 1

Developing a Strategy for Financing National Shelter Needs



government to close that gap. The approximate quantitative impacts of these actions can be estimated. Specific options may lend themselves to packaging; that is, logical groupings of actions may exist such that by implementing the policies together the effect is greater than if each is enacted separately. These alternative strategy options can then be compared in their impacts to what the government objectives are. A sizable remaining gap calls for reassessment of the objectives.

The remainder of these guidelines go through each of these steps in more detail.

## II. ASSESSMENT OF CURRENT CONDITIONS

The beginning point for developing a strategy is an assessment of current conditions. Compared to the type of description in a shelter sector assessment, this description should be more quantitative and more specific to the finance sector and financial variables.

### A. ESTIMATING HOUSING FINANCE REQUIREMENTS

Development of the finance strategy is driven by the estimates of housing needs. Forecasts of housing needs both determine the range of realistic targets for improvement and guide the selection of policy strategies for achieving the objectives.

Housing capital is required to meet three needs: needs arising from population growth, needs arising from upgrading of the current substandard stock, and needs arising from depreciation of the existing stock.

For housing needs forecasts, the rate of growth in households (i.e., families or other groups of individuals sharing living quarters) is a preferable measure of demographic change, since it signals the number of additional housing units required. If average household size changes over time because of either economic growth or change in the age/marital status composition of the population, household growth will differ from population growth.

The second component of housing needs arises from the need to replace the existing housing stock, holding quality constant at current levels. Assume that the replacement need is 5 percent of the existing stock annually. There are two alternative interpretations of this figure. One is that each housing unit has a life of 20 years, during which period it does not deteriorate, but at the end of which it drops out of the stock and must be replaced. Another interpretation is that each unit has an indefinite life, but to maintain a constant quality level, improvements amounting to 2 percent of the value of the structure must be made every year. The correct interpretation of the replacement need undoubtedly lies somewhere in between. For purposes of generating the overall needs estimate, the precise definition is not critical although it is important for developing financial instruments and institutions to meet the need efficiently. The rate of physical depreciation of housing is one of the more elusive housing statistics in all countries, and an informed guess will be required.

The third component of housing needs is upgrading to a minimally acceptable quality level of housing. As part of a housing finance strategy, there should be specific attention to the financial need arising from achievement of the social goal of adequate housing for the entire population.1/ Three separate aspects of achieving this minimum quality need to be considered. First, some households live in substandard units that are so deficient that it is unlikely that they could be upgraded. Second, there are dwellings that are deficient, which could be upgraded. The standard that determines deficiency is important and we will return to this later. A third element, crowding, can result in inadequate housing, even if the structure itself is physically sound and

1/ In estimating the needs, there is an implicit determination of an objective or housing quality. This gets us ahead of ourselves, because the objectives may not yet exist and have to be established after the current assessment. For purposes of exposition, however, we treat the upgrading component of finance needs here.

properly serviced. The crowding component can be seen as requiring additional new construction to remedy, in the case where two households occupy the same dwelling unit. Also in the case where a single large family is crowded into a small dwelling unit, in many instances the only solution will be new construction unless there is room on the lot for expansion of the existing structure.

In computing the number of newly constructed dwellings needed in the future, it is often advisable to make two separate calculations. In the first, the "gradual improvement scenario"--so called because it follows the tenets normally used in such calculations--one assumes that (1) temporary dwelling present in the base year are replaced at the rate of five percent per year; (2) the crowding deficit is also eliminated at this rate; (3) replacement dwellings equivalent to two percent of the housing stock are required annually; (4) an additional dwelling is needed for each new household. The second set of calculations is termed the "status quo scenario" because it estimates the number of new units required only to prevent deterioration in the housing situation. In this estimate there is no provision for eliminating the deficits from crowding and the presence of temporary structures. Moreover, it is assumed that the rate of crowding is unchanged, i.e., that newly formed households share units to the same extent as the population average in the base.

Once the need for number of housing units has been projected, it is possible to shift the focus to determining the level of investment in housing one anticipates in the future. Prices, expenditures, and housing capital are more difficult to project than are demographics. One approach used in several studies begins by overlaying an income distribution on the demographic projections of household growth. If data permit, different income distributions should be used for urban and rural areas. This gives a distribution of households by income group for each year during the planning period. Then estimated household income allocations to housing can be used to generate estimated housing expenditures by income group.

Consider first the financing needs to accomodate population growth. In any year during the projection period, there is an estimated addition to the number of households by each income group. Associated with these households is an expected average housing expenditure. The next step is to translate the expenditure level into its capitalized value. In other words, what is the level of loan consistent with the affordable level of housing expenditures. The result is determined by the interest rate and implied capitalization factor used. For example, a monthly payment of $100 can support a 20 year self-amortizing loan of $15,152 at a 5% rate of interest but only a loan of $5,882 if the interest rate is 20 percent. At 10 percent interest, $100 monthly payments support a loan of $10,351.

Using mortgage amortization tables, affordable loan amounts can be computed under any assumed interest rate and mortgage maturity combination. These computations yield the total capital required to accomodate population growth, with no increase in current quality levels. This capital is in addition to any contribution available from household savings that can serve as downpayments.

For replacement housing for existing households, a rule of thumb is that a replacement unit is required for 2% (annually) of the households in each income group. Using the same assumptions as for the additional households regarding

expenditures, downpayments, and interest rates, the implicit financing requirements can be derived.

Finally, financing needs arising from the social goal of bringing all housing to at least a minimum level of quality requires a somewhat different methodology. Here it is necessary to estimate directly the cost of bringing those units up to the standard. Combined with the estimated number of substandard units, a total cost is estimated. Subtracting from this cost the portion that the occupants can pay results in an estimated subsidy cost to the government.

In addition to the current substandard stock, financing needs arise from the substandard stock that will accompany the forecast population growth over the planning horizon. The number of these units can be projected, by assuming that they will comprise the same proportion of the additional stock as of the current stock. Similarly the same upgrading cost estimates applied to the current stock can be applied to these additional units.

A key assumption behind the investment projections is that in the future, households are likely to devote the same share of income to housing as they did in the base year. Other key assumptions include the increase in the number of households, the anticipated rate of growth in real household incomes, and the assumption that the distribution of incomes among households remains constant over the period. The simplest strategy for estimating housing asset values is to capitalize the average gross housing expenditures of households in each income quartile using the same capitalization factors for each period. Thus, property values and incomes move in lock step, since the share of income devoted to housing is being held constant.

If real income is projected to grow, the size of the substandard housing gap will diminish steadily over the projection period. On the other hand, if the number of households is constantly rising over the projection period, the aggregate capital deficit will increase unless real incomes grow.

## B. BUILDING INDUSTRY

After the estimation and projection of capital needs, the next component of the initial assessment should be a discussion of the building industry--formal and informal. Costs of materials and labor are important in determining the cost of housing and therefore, the rate at which housing expenditures and investment translate into improvements in housing quality. This section need not be lengthy, but it should give the current costs of building to different standards, whatever information is available on the components of the total cost, and recent time trend information. Any available information on the capacity of the building industry and on constraints and bottlenecks should also be included here.

## C. GOVERNMENT'S INVOLVEMENT IN HOUSING

The first question is the place of housing in the national development plan. This section should be a description of the overall financial levels of the development plan with particular focus on proposed investments in housing,

including the direct government programs and that portion of the investment level allocated to the private sector.

After the development plan, the next thing to be described in summary form should be the government's legislation and policies on housing, land use and urban development planning, building and infrastructure codes and standards, etc. with particular attention and more detailed coverage of any aspects which have a greater impact on housing finance, e.g., rent controls. From the analysis of legislation and policies, conclusions should be drawn as to the priority for housing within overall government policies and goals, and those priorities related to housing finance.

Another dimension of government involvement in housing to be examined is the government housing programs. The discussion should include all major government housing programs, both central government and local government, including upgrading and sites and services and other programs which have a direct impact on housing, e.g., urban development, and how these programs are financed and implemented, including cost recovery. This should include the government's budget and expenditures for housing, which should be put in the context of the total government budget.

This section should also examine subsidies which government provides to its housing programs and indicate who are the beneficiaries (i.e., income group) of those subsidies. Housing subsidies are important to development of a finance strategy because these subsidies represent a direct draw on government resources. The matter of low-income housing assistance should be treated separately from that of development of the housing finance industry, but it cannot be treated independently.

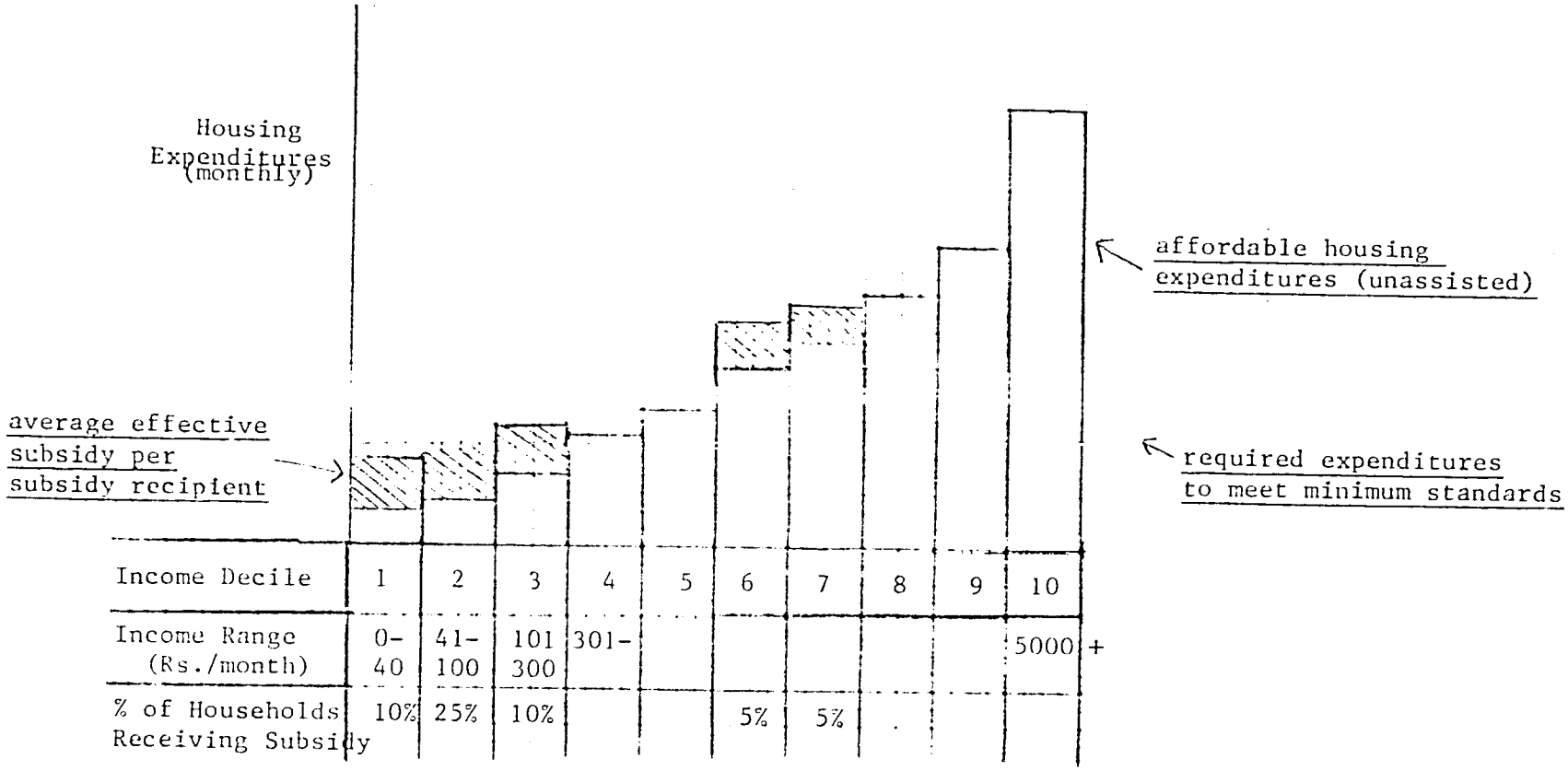
Residential infrastructure typically is provided under government auspices. What are the institutional arrangements for provision of water, waste, and electricity, and other infrastructure services? Are they handled by municipal government or by the central government? What are the methods and levels of payments for infrastructure services? What is the experience with payments and how are payments enforced?

Land costs constitute a substantial portion of total shelter costs in urban areas. As such, land use regulations and their effects on land availability are important components of the assessment of current conditions. What is the current status of land availability in urban areas? How do land use regulations enforce land uses different from what would occur if the land were developed to its "highest and best use"?

At this point, it is now possible to graphically display the distribution of the population by income group, affordable housing expenditures, and the capital values corresponding to those expenditure levels. For households whose affordable expenditure level is below the level required for basic housing, the required subsidy amount can be capitalized as well. Figure 2 presents a hypothetical distribution for a country that provides subsidies to some low income families through a sites and services program and also to some middle income families through a below-market interest rate for home loans.

Figure 2

HOUSING EXPENDITURES AND SUBSIDIES BY INCOME




| Income Decile | 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 | 10 |
|---|---|---|---|---|---|---|---|---|---|---|
| Income Range (Rs./month) | 0-40 | 41-100 | 101-300 | 301- | | | | | | 5000 + |
| % of Households Receiving Subsidy | 10% | 25% | 10% | | | 5% | 5% | | | |

## D. FINANCIAL MARKETS AND INSTITUTIONS

The description of the financial structure of the country is intended to set the context for the examination of the housing finance system by determining the total financial capacity of the country, the trends in flows of funds (especially the composition of savings), and the structure of the financial institutions through which these funds flow. Accordingly, this section of the report ought to begin with the most general of factors, Gross National Product and National Savings. The composition of savings will also be crucial here as the proper approach to the provision of necessary housing finance will be contingent on whether private, corporate or governmental savings predominates and which sector is growing the fastest. For example, if the largest category of savings is generated by the government, as is the case in a number of developing countries, the necessary housing finance solution may lie in the creation of a specialized public housing bank. On the other hand, predominance of private or corporate savings may argue for an emphasis in housing finance policy on private sector institutions designed to mobilize savings through market inducements such as interest rates.

A second set of issues concerns the more specific question of the financial priorities of the government. These priorities are usually expressed through the nature of the activities undertaken by major public financial institutions like the Central Bank, the development bank, or the agricultural credit bank. The resources devoted to specialized financial institutions will reflect the priority that the government places on these sectors. For example, the fact that industrial development loans may be discounted at the Central Bank, while housing loans cannot, would suggest that the encouragement of housing finance among other development needs is not one of the targets of the government. Alternatively, the absence of a specialized housing intermediary where the government maintains specialized institutions for the benefit of other sectors carries a similar message.

Finally, it is important to determine the extent to which financial markets exist in the country. Savings mobilization can occur only if there exist mechanisms for the placement of funds. For most countries, this does not prove a problem on the primary level: there exist financial institutions that will generate funds. But the ability of a country to sustain a housing finance system that will provide the means necessary to actuate dwelling units depends on the existence of a relatively sophisticated system of capital markets, both primary and secondary. For example, the existence of a dependable secondary marketing facility, either through the government or another private firm will make a bank much more willing to grant a loan. In the case of housing, where the creditworthiness of the borrower is a chancier thing than in the case of a corporate loan, this is especially important. Thus, the degree of development of capital markets in the country is an important piece of information.

To address these three sets of issues, the finance strategy must include careful inventory of the financial system of the country, looking at both major national variables and the trends in these variables, and the operations and structure of specific classes of institutions. On the national level, the analyst needs to collect information of Gross National product, total private savings, total public savings, and total financial assets. In addition, information is needed on the structure and organization of capital markets, the

number of issues in existence and their maturities, interest rates, and the average daily volume of transactions on these markets relative to the total stock of financial assets.

To analyze the structure of the financial system, the finance strategy needs to identify the major classes of public and private financial organizations, from the Central Bank down to the smallest credit union, and attempt to gather full information on each class of institution. As background, the analyst should obtain copies of the pertinent banking laws, rules and regulations, capital, reserve and liquidity requirements, etc., and should describe government's supervisory role and its organizational make-up to play this role--both the Ministry of Finance and the Central Bank. To the extent possible, the study should also analyze the government's overall philosophy toward banking in general--both toward government-owned banks and private banks--and the role of housing finance in the banking sector. The study should also contain a description of how the government finances its debt and the burden of the debt on national expenditures.

While the major portion of this analysis will of necessity be devoted to larger organizations, other significant factors such as provident funds and the insurance industry, and their operations and governing legislation, should be looked at as both mobilizers of savings and investors of these savings. There should be a brief description of major banks and other financial institutions. Besides the examination of each type of institution by itself, the analyst must be careful to determine and describe the interrelationships that exist between and among organizations. For example, to the extent that a commercial bank receives deposits from the public sector only to the extent that it subscribes to government debt instruments, the assets of that institution are constrained and are thus not available for the financing of private ventures. Similarly, interlocking management and governance systems will reduce the flexibility of the financial system in meeting needs it currently does not service.

Besides examining the institutional mechanisms of the financial system, the analyst must look at the instrumental mechanisms for mobilizing financial resources. Here the questions pertain to the accessibility of institutions by households through instruments suited to household savings. For example, even a relatively sophisticated institution may be unable to mobilize the savings of low income families.

## E. HOUSING FINANCE SYSTEM

Having investigated the government's attitude and policies toward housing and the nature and structure of the financial system as a whole, the finance strategy should next provide a detailed and analytical description of the housing finance system itself. For organization purposes, the system can be broken into six sections, ranging from public, formal arrangements to private informal arrangements. In this context, "formal" refers to housing finance arrangements that operate through regular and publically accessible channels, usually including some type of financial institution. The informal sector is less readily accessible and includes individuals and institutions only tangentially in the housing and finance businesses. This division of the housing finance system is represented in Figure 3.

Figure 3

Housing Finance System Classification

| | Formal | Informal |
|---|---|---|
| Public | 1. Major Policy Agencies<br>- housing ministry<br>- finance ministry<br>2. Primary Housing Agencies<br>- housing bank<br>- secondary market<br>- provident funds<br>- government financial institutions | 5. Government ministry - financed housing for employees<br>6. Government and minicipality - financed housing |
| Private | 3. Institutions primarily concerned with housing finance<br>- building societies<br>- mortgage banks<br>4. Institutions participating in housing finance<br>- commercial banks<br>- savings banks<br>- finance companies<br>- insurance companies<br>- credit unions/cooperatives | 7. Developer or company - financed (for employees) housing<br>8. Other Schemes (money lenders, family financing, etc.) |

Beginning with the most general category, the contractor needs to identify and characterize the major instrumentality of the government concerned with housing and housing finance. For most countries, this will be the housing ministry with the cooperation of the Central Bank. The system begins here and any intervention must flow through this instrumentality. It is thus important to have a full understanding of the workings and organization of this ministry. Related to this are other government agencies which have an impact on the housing finance system, but are not concerned with that system as their major business. A clear example of this is the finance ministry, which will have some control over the funds that can and will flow into housing, but places this control within the context of the total financial needs of the country.

Below these major policy organizations are the public intermediaries that are devoted to housing finance. These include housing banks, secondary market facilities, and provident funds. In many developing areas, these institutions serve as the major suppliers of housing finance and will be the prime targets of any intervention strategy. The effectiveness of those interventions, however, will depend upon the clientele that are actually or potentially served by the government housing entities. For example, it is entirely possible that a household if it offers only accounts that carry high minimum denominations and/or long maturities.

In practical terms, the analysis of the country's financial sector requires that the analyst collect this information in a careful manner, being sure to ask the questions raised in the previous paragraphs to ensure that the correct numbers are given their correct interpretation. In addition, the collection of data must be supplemented with interviews of key figures on both the public and private sides of the financial markets to discover exactly how institutions and programs interact. Government agencies may conduct mortgage lending programs designed to aid low income households, but maintain loan terms, maturities, fees or other charges that effectively preclude low income groups from participating in the program. It is thus important for the analyst to fully ascertain the organization, application procedures, charges and foreclosure procedures of the major governmental organizations whose major business is housing finance.

In the private formal sector, it is useful for the purposes of thinking about potential interventions, to distinguish between those institutions like building societies whose primary purposes is to finance housing and those institutions like commercial banks that participate in the housing finance market without that being their major activity. For each of these types of organizations, it is necessary to determine the market they serve in terms of household income, and ascertain the terms under which they will finance housing. In many cases, commercial banks are reluctant to lend for housing except at fairly stiff terms because no secondary market facility exists that would allow them to liquify those loans if needed. These kinds of interactions are important and the analyst should take great care to investigate them.

For all of the major financial institutions primarily or substantially involved in housing finance, the analyst should describe their organizational structure, number of staff, number of branches, etc., and analyze their financial operations. For all banking-type institutions, the means of mobilizing resources should be described in detail, including types of instruments,

interest rates, terms, etc. Housing finance lending mechanisms should also be described in detail, e.g., terms, interest rates, loan-to-value ratio, security, closing procedures, etc. Delinquency experience should be examined along with procedures for foreclosure, etc. In short, the total operations of each financial institution dealing primarily in housing finance should be examined in depth; those institutions whose housing finance activities constitute only a portion of their overall operations would be covered in less detail.

For the private formal sector, it is also important to gather information on the geographic and demographic scope of the market served by institutions. The idea for any housing finance system is to provide points of access for households of all age and income types in all regions of the country. To the degree that private institutions are not doing this, they may be likely targets for intervention.

The informal sector is much less clearly defined than the formal sector. However, some studies of the housing finance systems of developing countries indicate that as much as 80 percent of all housing is financed informally, suggesting the importance of investigating this sector. Moreover, informal financing appears to be more prevalent at either end of the income spectrum, so that a full strategy for the housing finance system of a country may well be impossible without some knowledge of the informal sector. The informal sector may be looked at in two tiers. The first tier consists of company (including government agency) financed housing for employees. These arrangements are informal in the sense that they are not regular and tend to fall outside the mainstream of the financial system as a whole. However, information is likely to be available on the extent of this form of finance and the contractor needs to investigate carefully the portion of housing that is provided by employer financing.

The second tier of the informal sector is much more elusive, and the analyst can at best expect to discover only qualitative information here. This tier consists of the arrangements made within moneylenders, private contractors or family members to provide the means to build shelter. To the extent that information is available, the analyst should ascertain the financing mechanisms employed by households in the private informal sector.

This examination of the housing finance system will yield an estimate of the total housing finance provided by the system. It ought to be done for each of the last three to five years in order to determine trends in the sources of funds to financial institutions and the sources of housing finance. These estimates can then be combined with whatever information is available from the informal sector to determine the total financing that has been available for housing.

## F. SUMMARY ASSESSMENT OF CURRENT CONDITIONS

At this point it is possible to take stock of the current conditions, focussing on four key outcomes: housing quality, access to housing finance, the aggregate capital requirements (i.e., cost) of shelter over the planning horizon, and the cost to government of providing the subsidies required to raise the lowest income group to a minimal quality level. These are the outcomes that a shelter finance strategy should target on improving, the ultimate objective

being improvement of housing quality, especially for those whose current housing conditions fall below some minimal level of basic housing needs.

## III. IMPROVING THE OUTCOMES: TARGET SETTING FOR PUBLIC POLICY

Once the initial assessment is complete, it is possible to set quantitative goals. This is possible because the initial assessment both documents current conditions and gives some background on how those conditions came to rise. Regarding the housing finance strategy, those targets are set relative to the objectives of improving housing quality, improving access to housing finance, minimizing the amount of capital required to achieve any given level of housing quality (i.e., minimize total cost), minimize the cost to government, and directing any subsidies that are given to only to lowest income segment of the population. Even without the current assessment, it would be possible in qualitative terms to talk about objectives. But the current assessment allows us to go further and to add some plausible quantitiative information regarding the targets. The following sections of the guidelines deal in some detail with each of these objectives.

### A. IMPROVING HOUSING QUALITY

Housing quality standards take social norms into account, but ultimately must be determined on the basis of affordability. Always subject to intense political pressure due to their high visibility, standards in many instances are set unrealistically high, with the result that only a small proportion of the population, and often not the most needy, is subsidized. Target-setting by government for housing quality should concentrate on the lowest income groups, who presumably will have the poorest quality housing. The assessment of the building industry should provide data on alternative standards, including standards for residential infrastructure, and the cost of attaining them. Especially for the lowest income groups, infrastructure is an integral, and usually the principal, component of housing. The assessment of current conditions will aid greatly in establishing the target for housing quality, because it will provide estimates of the cost of building to different standards.

### B. IMPROVING ACCESS TO HOUSING FINANCE

An intermediate objective which furthers the ultimate goal of improving housing quality is to improve access to housing finance. To the extent that availability of financing rather than affordability per se is the binding constraint on improvement in housing quality, improving access to housing finance is an effective way to improve housing quality. By access to housing finance, we mean the availability of credit through a variety of lending instruments, in all regions of the country, and for all income groups. Improving access to housing finance does not imply providing the finance at subsidized rates, nor does it necessarily imply increasing the penetration of lending through the formal sector down through more income groups, although this may be advisable.

### C. MINIMIZING THE CAPITAL REQUIRED FOR HOUSING

The third objective of a housing finance strategy should be to minimize the amount of capital required to achieve any given level of housing quality. In

other words, this objective is to minimize the cost of housing. The opportunity cost of capital is great, both in the private sector and the public sector. A variety of measures can be taken to reduce the total cost (both private and governmental, if any) of housing. Some of these will be discussed later in the guidelines.

Cost minimization is valuable in its own right in freeing resources for other uses. But it can also lead to improved housing conditions, as residents respond to lower housing prices by increasing their consumption of housing.

## D. MINIMIZING THE COST TO GOVERNMENT

Minimizing the cost to government is an objective separate from that of minimizing the total cost. With many competing claims on stretched government financing, housing cannot receive a top priority.

Cost recovery has as its objective the minimization of government subsidies for all but the very poorest. Subsidies can take on three separate forms. The first and most obvious is a capital subsidy, whereby the government provides shelter, including land and infrastructure at a price below cost. The capital subsidies can apply both to middle class owner-occupied and rental housing, as well as to sites and services projects serving lower income households. The second form of subsidy is a financial subsidy, by which a below-market rate of interest is charged on construction loans and permanent housing loans. If housing banks sell debentures bearing below-market interest rates to government institutions and then use the funds to support below-market lending, then the government is providing an indirect financial subsidy. Some government programs may involve direct government lending at below-market rates, and these too constitute a financial subsidy. The third form of subsidy is a "non-compliance" subsidy. The least visible of the three, non-compliance subsidies can nonetheless be substantial. If the municipal or central governmental agencies charged with collecting rents, property taxes, or loan payments in practice do not enforce the repayment provisions, then a subsidy is provided to those who do not pay according to the agreed-upon schedule.

Specific quantitative objectives, must be set in groups. That is, setting a target of significantly improved housing quality may well be linked to an increase in the share of GNP going to housing. Increasing the housing quality of the very poorest families may well be linked to an increase in government subsidies in housing. There can be no single objective. Because of the inherent tradeoffs, objectives must be established as sets of targets.

## IV. POLICY OPTIONS OF THE GOVERNMENT

The next step in development of a housing finance strategy is to determine what policy options are available to the government for attainment of the objectives. As with the objectives, the policy options must ultimately be grouped together and implemented as integrated packages. However, for purposes of exposition, these options can be broken down into separate classifications and described separately. The policies can be grouped under five different headings, and we treat each in turn:

### A. MACROECONOMIC POLICIES

Tax policy can be used to steer capital into housing or alternatively to direct it elsewhere. Income-tax deductability of mortgage interest and real taxes can be powerful indirect subsidies which serve to reduce the real price of housing and steer capital into housing. This steering of capital represents a major subsidy where it is applied. A good example is a public sector pension fund whose assets are restricted to housing loans.

In recent years, the single most important barrier to provision of housing finance has been high and fluctuating interest rates. To the extent that stabilization of interest rates can be achieved by sound monetary and fiscal policy, this is perhaps the single most effective action that can be taken by the government to further the provision of housing finance.

The third macroeconomic policy option for promoting housing finance is the use of external resources. Loans in foreign denominations available for financing of programs targetting on low-income households, with emphasis on cost recovery, can be used to augment financing from domestic sources. This is a limited source, however, and emphasis should be instead on mobilizing domestic resources for financing shelter needs.

### B. FINANCIAL SYSTEM DEVELOPMENT

General development of the financial system can go a long way toward promoting the objective of improved housing at the lowest possible cost. Housing is one of the main reasons for household saving, and through appropriate financial vehicles it should be possible to mobilize those resources. Experience has shown that in all but the very poorest countries, savings can be mobilized if appropriate savings vehicles and institutions exist. One major hindrance to savings in the current inflationary setting is the absence of savings instruments offering a positive real rate of return. Providing savings opportunities that offer a positive real rate of return on the other hand precludes the possibility of on-lending of those funds at a below-market interest rate. This fact highlights the incompatibility of mobilizing domestic savings for housing investment and simultaneously financing housing at below-market interest rates.

Turning from the saver's perspective to that of the lending institution, long term lending is effectively precluded when inflation makes future rates

highly uncertain. Through insurance schemes, the government can promote adoption of alternative lending instruments that minimize the risk to the lender and also the government while at the same time making financing available to a broader segment of the population. Only a fraction of the population in most countries is served by the formal financial sector. Not only incomes, but also the difficulty or impossibility of certifying incomes for the self-employed and absence of security of tenure, has proven a hindrance to date.

In promoting alternative lending instruments, there are two basic policy actions available. The first is to reduce any regulatory impediments to development of alternative savings and lending instruments. The second is provision of deposit or loan insurance to overcome market resistance to innovative financial instruments. Separate from and broader than the question of lending instruments is that of the adequacy of the current structure of financial institutions. The housing finance industry in some developing countries has followed the continental European model of raising funds for mortgage lending through the sale of debentures in capital markets. Other countries have followed the British-U.S. approach of mobilizing deposits directly from the general public. Whichever model has been followed, are there any gaps in the system that require either new institutions to be established or existing private institution to take on substantially different or additional activities from those engaged in currently? How would these institutions be capitalized? Secondary housing finance institutions are in particular undeveloped in most countries. Secondary market institutions play a critical role in integrating the housing finance market with the nation capital markets in general. This in turn illustrates the importance of national financial system development for development of housing finance.

## C. PROMOTING THE PRIVATE CONSTRUCTION INDUSTRY

Reductions in construction costs reduce the amount of financing required to achieve a given level of housing quality, and therefore promotion of the residential construction industry should be an integral part of a housing finance strategy. "Construction industry" is defined broadly to include both formal and informal sector builders and material supplies. There should be a review of all regulatory barriers and liscensing requirements that stand in the way of development of a large, resilient building industry. Special efforts should be made to bring the informal construction industry into the mainstream. This sector accounts for the bulk of construction activity in developing countries, although its performance is largely unrecorded. Are there restrictions on materials purchases or other impediments on this sector? An important consideration is building codes. If they exist, are they set to a standard that is too high, thereby either precluding low cost affordable construction or forcing it into the informal sector?

## D. MODIFICATION OF CURRENT GOVERNMENT HOUSING PROGRAMS

Achieving the objective of minimizing the cost to the government will require a hard look at all subsidies that current assessment shows to exist under the current system. Programs should be modified as required to assure

that whatever subsidies are provided are targetted on the very lowest income families.

Subsidies can be reduced also by increasing the efficiency with which the current programs operate. Redundant or overlapping programs should be merged, and programs operating at cross-purposes should be eliminated. There should also be a separation of program financing from program operation. Finally, any separable functions of government housing programs that can be efficiently transferred to the private sector--such as loan servicing--should be so transferred.

## E. OTHER POTENTIAL POLICY ACTIONS

A number of policy actions not directly related to housing finance can nonetheless have positive effects on private housing investment. First is promotion of tenure security. Studies have shown that private investment in housing is significantly increased by security of land tenure. Improvements in coverage and efficiency of the land recordation system are a subsidy free method of stimulating private investment in housing. Not only are residents' incentives to invest increased, but from the lenders' point of view, clear land title reduces their risk in lending.

Private housing investment is also stimulated by public provision of infrastructure. This induced private investment instructures increases the total return to infrastructure investments.

Land use regulations may artificially restrict the supply of urban land available for residential development. Existing regulations should be reviewed to determine if more land can be made available for residential use and if land currently in residential use can receive higher density development without running counter to other urban development objectives.

Lastly, rent control has deleterious effects on both new construction and investment in existing rental housing. Despite the political sensitivity of rent control regulations, steps should be taken to reduce the extent of the stock subject to controls and the depth of the subsidy--i.e., the extent to which market rents exceed the controlled rates--with the ultimate objective being their removal.

## F. A POLICY STRATEGY

For the actions described above to constitute a national strategy, it is necessary to establish priorities. Not everything can be done at once.

To establish the priorities for action, it is necessary first to group the specific policy actions by how they achieve the objectives. Then it may be necessary to establish priorities for the objectives and first concentrate on implementing those policy actions that move most rapidly toward the priority objectives while minimizing the backsliding effects on the other objectives.

The policy actions can also be grouped into those that can have short term impacts and those actions that can only influence conditions over the long term. Examples of the former are some regulatory changes and changing of eligibility requirements for government housing programs. An example of the latter is development of new or substantially modified public or private sector institutions.

Short-term actions have to be screened to insure that they are consistent with the long-term objectives. For example, programs required in the short term should not be administratively housed in institutions slated for elimination over the long term.

Attempting to achieve too much over a short period can result in price increases accompanied by only minimal improvement in housing conditions as bottlenecks are incurred due to shortages of materials, skilled trades, or managerial personnel. The assessment of current conditions should provide evidence on the level of activity attainable before these bottlenecks are incurred.

Another concern is that the policy actions that get priority for attention not be chosed predominantly on the basis of their visibility. Especially in housing finance, it may be that some of the most effective actions for attaining the stated objectives are less visible to the ordinary citizen, but nonetheless achieve the most good for the most people.

## G. QUANTITATIVE IMPACTS

Estimating the quantitative impacts of the alternative policy actions is more complex and conjectural than development of the finance needs estimates. Typically, only order-of-magnitude estimates can be generated. However, even these crude estimates should provide some sense for whether planned policy actions will move to significantly close the gap between the current conditions and the policy objectives. If it appears that no set of policy actions have a reasonable chance of closing the gap, then it is necessary to rethink the objectives. Are the targets for housing quality too high? Will a greater share of GNP and/or the government budget go to housing? In general, what are the tradeoffs among the objectives?

Development of a strategy for financing regional shelter needs should be viewed as an ongoing process, subject to revision as circumstances change. At the same time, the strategy serves as a realistic framework within which project plans can be formulated and progress charted.