

**LONG-TERM CARE:
ACTUARIAL COST ESTIMATES**

A CBO Technical Analysis Paper
August 1977





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Actuarial Cost Estimates**

**The Congress of the United States
Congressional Budget Office**

PREFACE

This technical paper provides detailed information on the demand for long-term health and social services, the existing supply of those services, and the cost of selected options for increasing them. As the companion piece to Long-Term Care for the Elderly and Disabled, a Budget Issue Paper published by the Congressional Budget Office in February 1977, this paper is intended to assist the Congress further as it considers changes in current programs.

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In keeping with CBO's mandate to provide objective and non-partisan information, Long-Term Care: Actuarial Cost Estimates offers no recommendations.

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Director

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SUMMARY

Long-term care refers to health and social services provided to chronically disabled, usually elderly, persons. In 1975, federal, state, and local governments spent \$5.7 to \$5.8 billion on long-term care; of this, \$3.1 billion or 56 percent was federal spending. Private expenditures totaled \$5.9 to \$7.7 billion.

Spending on long-term care will continue to grow as a result of the aging of the population, increased use of services, and inflation. This combination of factors is expected to increase total spending from an estimated \$11.7 to \$13.4 billion in 1975 to \$25.8 to \$31.0 billion in 1980. Federal spending under existing programs would range from \$7.2 to \$7.6 billion in 1980.

Despite the anticipated increase in spending for long-term care, the need for certain services will likely exceed the available supply under current programs. CBO's Budget Issue Paper, Long-Term Care for the Elderly and Disabled (February 1977), examined the extent of need for long-term care, the degree to which the demand for services is met by current public programs, and some alternative ways of satisfying demand and organizing services. Three options were discussed:

- A. Modifying existing programs - to revise certain legal or regulatory provisions that restrict the supply of non-institutional services under the current system;
- B. Long-term care insurance - to create a long-term care entitlement that would eliminate financial need as a basis for eligibility and replace much private spending with federal spending; and
- C. Comprehensive long-term care grant - to funnel appropriated long-term care funds through a single agency that would be responsible for providing services to needy individuals.

The estimated cost of these programs ranges considerably, depending upon the eligibility criteria and the extent to which new services are made available. The first of the following tables

summarizes the total cost of long-term care under existing programs and under the three options, compared to the potential demand for services. The second table indicates the estimated incremental federal cost under each option.

ESTIMATED TOTAL COST UNDER EXISTING PROGRAMS AND UNDER OPTIONS
 COMPARED TO ESTIMATED POTENTIAL DEMAND FOR SERVICES: BY FISCAL
 YEARS, DOLLARS IN BILLIONS

	1980	1982	1985
Potential Demand	32-47	42-60	60-87
Existing Federal Programs	7-8	9-10	15-17
Option A <u>a/</u>	8-9	11-14	18-28
Option B <u>a/</u>	20-23	29-36	47-73
Option C <u>a/ b/</u>	8-9	11-14	18-28

a/ Fiscal year 1979 is the first year of operation.

b/ Minimum cost. Maximum is the same as Option B.

ESTIMATED INCREMENTAL FEDERAL COST UNDER OPTIONS A, B, AND C,
 BY FISCAL YEARS, DOLLARS IN BILLIONS

	1980	1982	1985
Option A <u>a/</u>	0.9- 1.6	1.8- 3.9	3.2-11.1
Option B	11.0-14.0	17.0-23.0	28.0-50.0
Option C <u>b/</u>	1.0- 2.0	2.0- 4.0	3.0-12.0

a/ If federal government absorbs the incremental cost of making medicated home health benefits mandatory.

b/ Minimum cost. Maximum is the same as Option B.

This paper explores potential cost and demand in greater detail. The main text discusses data sources and their inadequacy. In order to prepare the estimates of spending under current programs and under Options A and B, new data had to be generated. These are presented in detail for fiscal years 1976 through 1985. Appendix A describes the detailed specifications for the options; Appendix B presents an in-depth discussion of the methodology used to estimate the demand for and cost of institutional services, home-based services, and sheltered living.

The estimates in this paper were based on data from national disability surveys, federal programs, and special studies of specific geographic areas. Spending that would occur in the absence of any legislation was determined first, followed by the proportion of spending that would be absorbed into a new program. The absorbed or "transferred" cost formed the base for estimating the effect of changes in the services provided (the "induced" cost of the new program).

If one conclusion may be drawn from this paper, it is that much further research should be undertaken to assemble the data base necessary to prepare more precise estimates. The estimates contained here should be viewed as gross orders of magnitude rather than precise levels of expenditures.



CHAPTER I. GENERAL BACKGROUND ON ESTIMATING THE COST
 OF LONG-TERM CARE SERVICES

PURPOSE AND SCOPE OF THE COST ESTIMATES

Long-term care services are those typically needed by persons in declining health or by those suffering from chronic or terminal illnesses. ^{1/} These services include homemaker, chore, and social services; nutrition and health education; personal care aid; occupational, physical and speech therapy; and skilled nursing. Individual requirements may vary from minor personal care or homemaker services in normal housing to a full range of nursing, rehabilitative, and personal services that can be provided only in an institutional setting.

The total need for these services is growing rapidly for a number of reasons. Among these are the increasing proportion of the population living to advanced ages and the greater tendency of the elderly to live alone or in institutions, rather than with younger family members.

Few of these services are covered under private insurance policies. Coverage of long-term care under present federal programs is largely limited to nursing home care for the indigent aged and disabled and to minimal home health services. As a result, it is apparent that many of those in need of professional services either receive less-skilled care from friends and relatives or do without.

^{1/} Personal health services can be divided into: prevention of disease; diagnosis or treatment of an accident, disease, or pregnancy; and custodial care or maintenance of persons whose ability to take care of themselves has been impaired by a chronic condition or the general decline of health that accompanies aging.

The distinction between long-term care and acute care lies in whether the primary reason for the service is to diagnose or treat an illness or assist an individual whose capacity for functioning has been impaired by illness or age.

The need for long-term care and selected legislative options available to improve access to its services are discussed in a previous CBO study, Long-Term Care for the Elderly and Disabled. The following technical background paper documents the cost estimates cited in the earlier study and provides more detail on the spending estimates under present law and under Options A and B. These options are primarily concerned with three basic types of long-term care:

- o Institutional care by nursing homes or personal care facilities;
- o Sheltered living environments for persons who are not able to maintain themselves economically and safely in normal housing; and
- o Nursing, rehabilitative, therapeutic, personal, and homemaker services provided through home health agencies to persons who need such assistance to live at home or in sheltered living environments.

The decision to initiate a long-term care program must be based on an assessment of its costs and benefits, compared to those for other possible uses of limited public funds. As will be shown later, the cost of existing long-term care programs can be expected to grow rapidly in future years; thus, it is especially important to assess the long-range cost of any proposed program.

Long-term care is but one of many pressing public needs on which limited additional public funds might be spent and a commitment based on inadequate estimates could lead to future budgetary difficulties. Similarly, estimates that are too high may defer public spending for needed services that the public is willing to support. A well-considered, deliberate choice can be made only if reliable information is available as to the long-range cost of new and existing programs.

Unfortunately, the data available for assessing cost estimates for long-term care services are very limited and the accuracy of those estimates is correspondingly limited. The figures in this paper were based on existing data and are best viewed as gross estimates of magnitude rather than precise levels of expenditures. Further research is needed to assemble the type of data base from which more precise estimates can be prepared.

DATA SOURCES

Data available on the present use of long-term care services are very limited. ^{2/} The Master Facilities Inventory (MFI) maintained by the National Center for Health Statistics (NCHS) records the number of residents of nursing homes and personal care facilities and the growth in that population over time. Details concerning the characteristics of the patients and the cost of care in these facilities are also available from other NCHS surveys and from the statistical data compiled by the medicare and medicaid programs. Since the most recent detailed survey was completed, however, changes in those programs have led to substantial revisions in the care provided. In addition, the cost of care in these facilities has risen substantially since 1972, the last year for which comprehensive cost data were compiled. Moreover, very little information is available on the rate at which nursing home costs have been rising since 1972 or how costs have been affected by program changes.

Available data on other long-term care services are much less reliable than the information on institutional care. The only national data for home health services are compiled by the medicare program, which pays for approximately 35 to 45 percent of home health agency budgets. Only fragmentary data are available on the current supply of other long-term care services, such as congregate housing, foster care, boarding houses with some personal care, private nurses, and day care centers.

Documentation of the need for long-term care services is available only from a few localized studies. These studies were not designed to determine the demand for services that would materialize under a specific new program; rather, they attempted to ascertain fundamental facts about the health status and personal needs of the elderly in particular communities. How the results obtained relate to the national situation or to eligibility under a social insurance program providing long-term care services is unknown.

To provide a more accurate estimate of the cost of long-term care programs, reliable national data are needed for the following:

- o The need for each level of long-term care by elderly and disabled individuals;

^{2/} Appendix B documents the specific data sources used for the estimates in this paper.

- o The extent of long-term care services provided through sheltered living arrangements, independent practitioners, and day care centers;
- o The current rate of increase in the cost of furnishing each type of long-term care;
- o Detailed characteristics of long-term care patients not residing in nursing homes -- e.g., income, living arrangements, family composition, eligibility for public programs, health status, and measures of their capacity to take care of themselves;
- o The extent of social services currently needed and used by the elderly and disabled, and the relationship between the need and use of social and health services;
- o The relationship of family structure and living arrangements to the need and use of long-term services;
- o The effect of the availability of alternative modes of treatment and the effect of the level of cost-sharing on the substitution of one type of service for another;
- o The relationship of public processes to determine eligibility based on need to the general prevalence of need in the population; and
- o The effect of the availability of new public funds on the supply of each type of service available and on the cost of services.

Appendix B describes the methodological problems created by the absence of these critical data elements and the estimating procedures followed to overcome those difficulties. The general approach to cost estimation is described in the next section.

APPROACH TO COST ESTIMATION

Definition of Cost

The cost of a long-term care proposal can be considered from a number of different perspectives, including the following:

Impact on aggregate spending for health care services. By providing new funding sources, a new program can be expected to increase total national spending for long-term care. This aggregate national increase provides a measure of the extent to which funds that would be used to purchase other goods and services are instead diverted to the purchase of health services. 3/

Increase in spending under federal programs. A proposal may set up a new federal program through which long-term care services will be purchased. The increase in spending through these new or revised programs provides another concept of the proposal's cost.

Increase in federal outlays. The aggregate increase in federal outlays for long-term care resulting from a proposal provides still another measure. 4/

Estimates are included in this report according to each of these definitions of cost. In every case, the spending estimated to occur under a proposed program is compared with that which would occur under present law.

3/ Other aspects of this definition that must be taken into account are as follows:

(a) Some of the increase in expenditures may represent the employment of otherwise unused resources, especially manpower. An increase in spending for health may be accompanied by an increase in the gross national product, so that not all of the increase in spending for long-term care would have to be paid for through the sacrifice of other goods and services. This could well prove to be the case if personal care and homemaker services are greatly expanded, since the types of jobs created would require skills which many presently unemployed persons might supply.

(b) Some of the increase in national spending may represent inflation, especially that based on the cost of hiring skilled personnel (such as registered nurses and medical social workers) and the cost of construction (if sheltered living is greatly expanded). To the extent that this is the case, the sacrifice of other goods and services would be greater than the increase in long-term care services received.

4/ In addition to increasing federal outlays for health, a proposal may also reduce or increase the tax revenues received by the federal government. The effect of the options analyzed on federal government income was beyond the scope of this paper.

Policy Assumptions

The options formulated in Long-Term Care for the Elderly and Disabled illustrate the broad range possible in services furnished through a federal long-term care program. In presenting such options, it is appropriate to state broadly the services to be provided and the persons eligible to receive them. A cost estimate, however, must relate to a very specific set of services to be furnished to a precisely defined group of individuals.

Further, much of the cost of any approach to providing long-term care services will be determined by how new legislation is implemented. Many important decisions must be left to the government agencies responsible for translating general legislative goals into precise, legally binding regulations and administrative procedures that will be applied to specific situations involving beneficiaries or providers. Moreover, those regulations and procedures will change over time as the program develops. Budgetary pressures, other legislation, and the shifting in emphasis of future administrations will have an important bearing on program costs. All of these factors will be critical to a long-term care program, since there is such limited experience with providing these services through social insurance programs.

Preparing cost estimates involves selecting one or more of the many possible ways to legislate and implement each of the options analyzed. Appendix A describes the specific policy assumptions adopted here.

Estimates of Spending for Long-Term Care Services Under Present Law

Although it is probable that noninstitutional long-term care services will grow rapidly if a major new source of funding is provided, most of the costs of any new program will be largely determined, at least initially, by the existing supply of services. Most of the care will have to be provided through existing organizations by experienced personnel using existing facilities. Further, an expansion of services in response to new demand may be restrained by the capacity of present organizations for several years because of the following:

- o Shortage of experienced supervisory and skilled personnel;

- o Shortage of capital available to many of the experienced sponsoring organizations, such as hospitals and visiting nurse associations;
- o Delays in the construction or conversion of new facilities because of the need for licenses and approval by planning organizations, and the time required for construction;
- o The possible reluctance of some providers to grow rapidly or expand into less skilled services. For example, visiting nurse associations may not be interested in greatly expanding personal care and homemaker services, and religious organizations and charitable foundations may not wish to build new sheltered living facilities; and
- o The time required for organizations not currently involved in providing long-term care services to obtain the necessary certifications and licenses and assemble personnel.

Data and calculations on existing services are inherently more reliable than speculations on changes that may take place as a result of a new program. Consequently, the most reliable estimating approach is first to determine spending that would occur in the absence of any legislation and then to establish the proportion which will be absorbed into a new program. This absorbed or "transferred" program cost provides a base for estimating the effect of changes in the services provided -- i.e., the "induced" cost of the program. 5/

Projected Spending for Long-Term Care Services:
Fiscal Years 1979-1985

A new federal long-term care programs would necessarily take effect when, if current growth rates are sustained, the supply of services will be much higher than at present. To measure the likely impact of a new program, estimates must be prepared for years during

5/ For a more detailed discussion of the concepts of "transferred" and "induced" costs of new health insurance programs, see Gordon R. Trapnell, A Comparison of the Costs of Major National Health Insurance Proposals, August 1976, National Technical Information Service, Pub. No. PB-259-153.

which a program would actually be in operation. Since several years would be required to pass authorizing legislation and to implement a new program, the earliest year in which benefits could become effective is fiscal 1979. The estimates here were prepared on the assumption that legislation is considered during 1977, a bill passed by August 1978, and implementation begun in October 1979. Spending under the options analyzed is compared with that estimated to occur under present law during fiscal years 1979-1985.

To provide the base for these estimates, the estimated number of residents of long-term care facilities and the level of spending for each type of service in fiscal 1976 was projected to fiscal years 1979-1985. Appendix B explains the methodology followed in the estimates for services covered by the options analyzed, along with details on the economic parameters and other assumptions used in the projections.

Estimates of Transferred and Induced Costs

The principal effects of a new social insurance program paying for long-term care are to absorb the funding for a portion of the services that would otherwise be provided and to expand the demand for such services. The services absorbed or transferred to a new program can be identified by determining whether the patients already receiving long-term care through existing public or private programs would be eligible, and whether the services they receive would qualify for reimbursement under the new program. Further allowances must be made for the effect of cost sharing and any time lag between the performance of services and payment for them. If sufficient information is available concerning the nature of the services and the patients using them, transfers can be determined from current patterns of utilization and payment, as projected to the future.

Determining the change in the total services provided and the level of payment for them presents a more fundamental problem. Unlike transferred costs, these changes "induced" by a proposal cannot be determined from existing services and spending. The only completely valid basis for determining such changes is the actual experience of the new program in question.

Some elements of the new or induced costs of a proposal can be determined from existing services if adequate information is available. For example, spending for health services is increased by a new social insurance program when it absorbs and pays for a service

that would otherwise not have been covered. Either there was no bill, as in the case of charity services, or a valid bill was not paid (i.e., bad debts.)

In addition, payment for services through a government or private insurance program, as opposed to direct payment by patients, involves the added costs of a wide variety of administrative functions. These include establishing eligibility, determining the level of care to be provided, certifying the provider's qualifications to perform the services rendered, processing claims, and regulating providers. The cost of most of these functions has been documented for other health insurance programs, and extrapolations can be made for insuring long-term care services.

Interpretation of Results

Information is available on the physical and mental condition of present recipients of long-term care services and the level of care these recipients are receiving. That information is not, however, adequate to determine accurately the transfers from one service level to another that would occur under the options analyzed. Further, existing and projected spending for these services under present programs cannot be documented well enough to permit an accurate estimate of the shift in spending from one source to another. Because analytical techniques cannot overcome these basic inadequacies, the results of the estimates can be interpreted only as broad planning guides to use in formulating policies.

Because relatively reliable data on institutional care are available, a single best estimate of spending for the services in nursing homes and personal care facilities was prepared. The actual level of spending for these services could vary from that estimated by as much as 5 percent per year after 1972 (the last year for which comprehensive national cost data were available). The data for sheltered living facilities and home health services, however, were so sparse that derivation of a single best estimate of spending for these services was not feasible. However, high and low estimates were derived in order to show the range within which the actual level of spending is likely to lie. 6/

6/ The ranges do not necessarily encompass the level of spending that will occur. If they did, the spread between the low and high estimates would have been too large to be useful as a policy guide. Therefore, the ranges were constructed with the objective of assuring that it is much more likely that the actual level of spending lies within the range than outside it.

Primary emphasis was placed on obtaining the most reliable estimates of the relative cost of proposed new and existing long-term care programs. Wherever possible, common factors were used to project spending under present law and under each of the options analyzed. These factors are explicit parameters common to each projection. All parameter values have been clearly designated so that the reader can substitute others.

Appendix B describes in detail the methodology used to estimate the need, total spending, program outlays, and the federal share of program costs for those services covered under the CBO options.

CHAPTER II. SPENDING UNDER PRESENT LAW FOR LONG-TERM CARE SERVICES

ESTIMATED SOURCES AND USES OF FUNDS IN FISCAL YEAR 1976

Spending for long-term medical services in fiscal 1976 is summarized in Table 1, according to sources and uses of funds. ^{1/} The estimate of total national spending for these services is between \$18 and \$20 billion; of this, roughly 45 percent or \$8 to \$10 billion was raised by private sources. Consumers directly paid \$7 to \$9 billion; the remainder was paid by private insurance policies or philanthropic organizations.

Government programs paid an estimated \$10.5 billion for long-term care services; of this, \$5 billion was paid by the federal government and \$5.5 billion by state and local governments. Over half of all public expenditures (\$5.7 billion) was paid through the federal/state medicaid programs. State and local governments are estimated to have spent another \$2.9 billion for direct payments to providers.

An estimated \$17 to \$19 billion was spent for institutional care; of this, \$14 to \$16 billion or three-fourths, was for care in nursing homes or sheltered living facilities, and \$3 billion was for hospital care. Only an estimated \$1.1 to \$1.4 billion paid for ambulatory or home health services.

ESTIMATED SPENDING DURING FISCAL YEARS 1977-1985

Table 2 shows an estimate of the average number of residents of long-term care institutions in 1976. Projections of the average number of residents of each type of long-term care institution through 1985 are also given. The average resident total of these facilities is estimated to have been between 1.9 and 2.5 million in 1976. These numbers will grow substantially during the next decade, to 3.3 to 4.2 million by 1985.

^{1/} All figures in this chapter include custodial psychiatric care, which was excluded from the earlier budget issue paper.

TABLE 1. SOURCES AND USES OF FUNDS FOR LONG-TERM CARE SERVICES, FISCAL YEAR 1976 a/: DOLLARS IN BILLIONS

	Total	Private			
		Total	Out-of-Pocket <u>b/</u>	Insurance	Other
All Services	18.1	7.7	6.9		0.4
to		to	to		to
	20.4	9.9	8.9	0.5	0.6
Institutional Care	17.0	7.5	6.7		0.4
to		to	to		to
	18.9	9.3	8.4	0.4	0.6
Long-term hospitals <u>d/</u>	0.8	0.2	0.2	0	*
Psychiatric hospitals <u>d/</u>	2.5	0.5	0.4	0	*
Skilled nursing facilities <u>e/</u>	8.7	4.2	3.7	0.4	0.1
Intermediate care facilities	1.9	0.6	0.6	0	*
Personal care homes	1.5	1.3	1.2	0	0.2
Homes for physically handicapped	*	*	*	0	*
Homes for the blind and deaf	0.1	*	*	0	*
Drug and alcoholism facilities	0.2	0.1	*	0.1	*
Homes for mentally disturbed	0.3	0.1	0.1	0	*
Homes for mentally retarded	0.9	0.2	0.2	0	*
Other sheltered living <u>f/</u>	0.3	0.2	0.2		*
to		to	to		to
	2.2	2.1	1.9	0	0.2
Ambulatory and Home Care	1.1	0.2	0.2		
to		to	to		
	1.4	0.6	0.5	*	*
Home health agencies	0.7	0.1	0.1		
to		to	to		
	0.9	0.3	0.3	*	*
Rehabilitation agencies	0.3	*	*	*	*
Private practitioners <u>g/</u>	0.1	0.1	0.1		
to		to	to		
	0.2	0.2	0.2	0	*

* Less than \$50 million.

a/ Excludes administrative cost of insurance or government programs and social services, assistance with routine chores, food preparation, etc.

b/ Includes payments by all income maintenance programs, including supplemental security income, social security, and any state supplements.

c/ Includes premiums paid by individuals for Part B.

TABLE 1. (continued)

Total Public	Federal Outlays					State and Local Outlays		
	Total	Medi- care <u>c</u> / ^d	Medi- caid	VA	Other	Total	Medi- caid	Other
10.4 to 10.5	5.0	0.6	3.2	1.0	0.2	5.5	2.5	2.9
9.6	4.5	0.3	3.1	1.0	0.1	5.1	2.5	2.6
0.6	0.3	0	0	0.3	*	0.2	0	0.2
2.0	0.4	0	0	0.4	0.1	1.6	0	1.6
4.5	2.6	0.3	2.1	0.1	*	1.9	1.7	0.2
1.3	0.7	0	0.7	0.1	*	0.6	0.5	0.1
0.2	0.1	0	0	0.1	*	0.1	0	0.1
*	*	0	0	*	*	*	0	*
0.1	*	0	0	*	*	0.1	0	0.1
0.1	0.1	0	*	*	0.1	*	*	*
0.2	*	0	0	*	*	0.2	0	0.2
0.7	0.3	0	0.3	0	*	0.4	0.3	0.1
0.1	0	0	0	0	*	0.1	0	0.1
0.9	0.5	0.3	0.1	*	0.1	0.3	0.1	0.3
0.6	0.4	0.3	0.1	*	*	0.2	0.1	0.2
0.3	0.1	0	0	*	0.1	0.1	0	0.1
*	*	0	0	*	*	0	0	0

d/ Includes custodial services only — i.e., those not receiving active treatment to diagnose or cure an illness.

e/ Includes all patients in facilities certified as skilled nursing facilities, regardless of actual level of care received.

f/ Includes only residents not able to live independently in normal housing.

g/ Excludes services of physicians, dentists, and other practitioners who normally treat acute illness.

By far the largest number of long-term care patients reside in nursing homes. In 1976, the estimated average number of residents was 1.5 million; by 1985, this number is expected to reach 2.9 million. The lack of information on sheltered living facilities prevents the estimation of the number of residents with much precision or confidence. Between 75,000 and 635,000 persons resided in these facilities during 1976. The average number of residents in 1985 is projected at between 114,000 and 980,000.

Table 3 shows the estimated spending, under present law, for long-term care medical services during fiscal years 1977-1985. Total estimated spending for these services is expected to grow very rapidly, to \$64 to \$75 billion by fiscal year 1985. In 1985, the largest part of this spending would be for institutional services (\$59 to \$65 billion). Projected spending for custodial care in long-term and psychiatric hospitals is expected to increase to approximately \$2 billion and \$5 billion respectively by fiscal year 1985, by virtue of a projected higher treatment cost per patient. A decline in the number of patients is projected. Nursing home expenditures, on the other hand, are projected to quadruple by 1985 to \$48.6 billion, resulting from an increase in both the number of residents and the cost of care.

Although much smaller in size, estimated spending for ambulatory and home care services is expected to rise at a more rapid rate than that for institutional care. Outlays for these services are projected to be \$4 to \$10 billion by fiscal year 1985, a level up to seven times that in fiscal year 1976.

Table 4 summarizes the projected sources and uses of funds for long-term care services in fiscal year 1980. Total estimated spending for long-term care medical services is \$32 to \$36 billion. Private spending is estimated at \$15 to \$18 billion, of which \$13 to \$16 billion would be paid for directly out-of-pocket. Total public expenditures for long-term care are estimated to be \$17 to \$18 billion, of which \$8.9 to \$9.3 billion would be paid by the federal government and \$8.4 to \$8.9 billion by state and local governments.

Table 5 summarizes the estimated spending in federal programs that would occur under current law. Total outlays under federal programs are expected to triple from \$7 billion in fiscal 1977 to \$24 to \$26 billion in fiscal 1985. Estimates for 1977 medicare outlays for long-term care are \$700 to \$800 million; they are expected to reach \$2.2 to \$3.2 billion by 1985. By 1985, under the low projection, outlays would be divided about equally between skilled

TABLE 2. ESTIMATED AVERAGE NUMBER OF RESIDENTS IN LONG-TERM CARE INSTITUTIONS,
CALENDAR YEARS 1976-1985: IN THOUSANDS

	1976	1977	1978	1979	1980	1981	1982	1983	1984	1985
	2061	2186	2316	2452	2602	2762	2929	3110	3309	3517
All Institutions	to 2621	to 2772	to 2934	to 3106	to 3292	to 3483	to 3685	to 3901	to 4135	to 4383
Long-Term Hospitals <u>a/</u>	35	35	35	35	35	35	35	35	35	35
Psychiatric Hospitals <u>a/</u>	140	135	130	125	120	120	120	120	120	120
Skilled Nursing Facilities	935	1015	1095	1175	1260	1360	1460	1570	1690	1815
Intermediate Care Facilities	365	390	420	450	490	525	565	605	650	700
Personal Care Facilities	200	215	230	250	270	290	310	335	360	385
Homes for Physically Handicapped	4	4	5	5	5	5	5	5	5	5
Homes for the Blind and Deaf	21	22	22	22	23	23	23	23	24	24
Drug Addiction and Alcoholism Facilities	33	35	38	41	44	47	50	53	56	59
Homes for Mentally Disturbed	65	70	75	80	85	85	85	85	85	85
Homes for Mentally Retarded	188	186	184	183	180	178	177	175	175	175
Other Sheltered Living <u>b/</u>	75 to 635	79 to 665	82 to 700	86 to 740	90 to 780	94 to 815	99 to 855	104 to 895	109 to 935	114 to 980

a/ Includes only those not receiving active treatment to diagnose or cure an illness.

b/ Includes only residents not able to live independently in normal housing.

skilled nursing facilities and home health agencies; under the high projection, outlays for home health agencies would grow to almost twice the level of spending for skilled nursing facilities. 2/

In fiscal 1977, medicaid program outlays are estimated at \$6 billion and are anticipated at \$20.5 to \$21.6 billion by fiscal 1985. About nine-tenths of these outlays are projected to be spent to support nursing home residents. Estimated outlays for home health agency services are expected to grow from less than \$200 million in 1977 to between \$0.6 and \$1.6 billion by 1985.

Total federal outlays are estimated to be \$4.5 billion in 1977 and to reach \$14.7 to \$16.9 billion by 1985.

2/ For interpretation of the low and high projections of spending for home health agency services, see Chapter IV and Appendix B.

TABLE 3. TOTAL ESTIMATED SPENDING UNDER PRESENT LAW FOR LONG-TERM CARE SERVICES, FISCAL YEARS 1977-1985 a/: DOLLARS IN BILLIONS

	1977	1978	1979	1980	1981	1982	1983	1984	1985
All Services	21.3- 24.1	24.5- 27.7	28.0- 31.7	32.0- 36.3	36.7- 42.0	42.1- 48.4	48.3- 55.8	55.6- 64.7	63.7- 74.5
Institutional Care	20.0- 22.1	22.9- 25.3	26.0- 28.9	29.9- 32.9	34.2- 37.7	39.3- 43.1	45.0- 49.4	51.8- 56.7	59.4- 64.8
Long-Term Hospitals <u>b/</u>	0.8	0.9	1.0	1.1	1.1	1.3	1.4	1.5	1.6
Psychiatric Hospitals <u>b/</u>	2.7	2.9	3.0	3.2	3.5	3.8	4.1	4.5	4.9
Skilled Nursing Facilities	10.5	12.2	14.2	16.5	19.2	22.3	25.8	30.1	34.9
Intermediate Care Facilities	2.3	2.7	3.1	3.6	4.2	4.8	5.6	6.5	7.5
Personal Care Homes	1.8	2.1	2.5	2.9	3.4	3.9	4.6	5.4	6.2
Homes for Physically Handicapped	*	*	*	*	*	*	*	*	*
Homes for Blind and Deaf	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.1
Drug and Alcoholism Facilities	0.2	0.2	0.3	0.3	0.3	0.4	0.4	0.5	0.5
Homes for Mentally Disturbed	0.4	0.4	0.5	0.6	0.7	0.8	0.9	1.0	1.1
Homes for Mentally Retarded	0.9	1.0	1.1	1.2	1.3	1.4	1.5	1.6	1.7
Other Sheltered Living <u>c/</u>	0.3- 2.5	0.3- 2.8	0.4- 3.1	0.4- 3.5	0.5- 4.0	0.5- 4.4	0.6- 4.9	0.7- 5.5	0.7- 6.2
Ambulatory and Home Care	1.4- 1.9	1.6- 2.3	1.9- 2.9	2.2- 3.5	2.5- 4.3	2.9- 5.3	3.3- 6.5	3.7- 8.0	4.3- 9.8
Home Health Agencies	0.9- 1.3	1.1- 1.7	1.4- 2.2	1.6- 2.7	1.8- 3.4	2.0- 4.3	2.4- 5.4	2.8- 6.8	3.2- 8.6
Rehabilitation Agencies	0.3	0.4	0.4	0.5	0.5	0.6	0.7	0.7	0.8
Private Practitioners <u>d/</u>	0.1- 0.2	0.1- 0.3	0.1- 0.3	0.2- 0.3	0.2- 0.3	0.2- 0.4	0.2- 0.4	0.2- 0.4	0.2- 0.5

* Less than \$50 million.

a/ Excludes administrative cost of insurance or public programs and social services, assistance with routine chores, food preparation, etc.

b/ Includes only those not receiving active treatment to diagnose or cure an illness.

c/ Includes only those not capable of independent living.

d/ Excludes services of physicians and dentists.

TABLE 4. TOTAL ESTIMATED SPENDING FOR LONG-TERM HEALTH CARE SERVICES, FISCAL YEAR 1980
UNDER PRESENT LAW a/: DOLLARS IN BILLIONS

	Total	Private			Total Public	
		Total	Out-of- Pocket <u>b/</u>	Insur- ance		Other
All Services	32.0	14.7	13.1	0.9	0.8	17.4
	to	to	to	to	to	to
	36.4	18.3	16.2	1.0	1.3	18.2
Institutional Care	29.8	14.0	12.5		0.7	15.8
	to	to	to		to	to
	32.9	17.0	15.5	0.8	1.1	15.9
Long-Term Hospitals <u>d/</u>	1.0	0.3	0.3	0	*	0.8
Psychiatric Hospitals <u>d/</u>	3.2	0.7	0.7	0	*	2.5
Skilled Nursing Facilities <u>e/</u>	16.5	8.4	7.5	0.8	0.1	8.1
Intermediate Care Facilities	3.6	1.1	1.0	0	0.1	2.5
Personal Care Homes	2.9	2.7	2.3	0	0.4	0.2
Homes for Physically Handicapped	*	*	*	0	*	*
Homes for the Blind	0.1	*	*	0	*	0.1
Drug and Alcoholism Facilities	0.3	0.1	0.1	*	*	0.2
Mentally Disturbed	0.6	0.1	0.1	*	*	0.4
Mentally Retarded	1.2	0.3	0.3	*	*	0.9
Other Sheltered Living <u>f/</u>	0.4	0.4	0.3		0.1	0.1
	to	to	to		to	to
	3.5	3.4	2.9	0	0.5	0.2
Ambulatory and Home Care	2.2	0.7	0.6			1.5
	to	to	to			to
	3.5	1.3	1.1	0.1	0.1	2.4
Home Health Agencies	1.6	0.4	0.3		*	1.1
	to	to	to		to	to
	2.7	0.9	0.7	0.1	0.1	1.9
Rehabilitation Agencies	0.5	0.1	0.1	*	*	0.4
Private Practitioners <u>g/</u>	0.2	0.2	0.2			
	to	to	to			
	0.3	0.3	0.3	*	*	*

* Less than \$50 million.

a/ Excludes administrative cost of insurance or government programs and social services, assistance with routine chores, food preparation, etc.

b/ Includes payments by all income maintenance programs, including supplemental security income, social security, and any state supplements.

c/ Includes premiums paid by individuals.

TABLE 4. (continued)

Total	Federal Outlays				State and Local Outlays		
	Medi-care <u>c</u> /	Medi-caid	VA	Other	Total	Medi-caid	Other
8.9	1.1	5.8			8.4	4.6	3.9
to	to	to			to	to	to
9.3	1.4	5.9	1.6	0.4	8.9	4.6	4.3
					7.8		3.3
8.0	0.6	5.7	1.6	0.2	7.9	4.5	3.5
to	to	to	to	to	to	to	to
0.5	0	0	0.5	*	0.3	0	0.3
0.7	0		0.6	0.1	1.9	0	1.9
4.7	0.6	4.0	0.1	*	3.4	3.1	0.3
1.5	0	1.2	0.3	*	1.0	1.0	0.1
0.1	0	0	0.1	*	0.1	0	0.1
*	0	0	*	*	*	0	*
*	0	0	*	*	0.1	0	0.1
0.1	0	*	*	0.1	0.1	0	0.1
*	0	0	*	*	0.4	0	0.4
0.5	0	0.5	0	*	0.5	0.4	0.1
					0.1		0.1
					to		to
0	0	0	0	0	0.2	0	0.2
1.0	0.6	0.1			0.6		0.5
to	to	to			to		to
1.3	0.8	0.2	*	0.2	1.0	0.1	0.8
0.7	0.6	0.1			0.4	0.1	0.3
to	to	to			to	to	to
1.0	0.8	0.2	*	*	0.8	0.2	0.6
0.2	0	0	*	0.2	0.2	0	0.2
*	0	0	*	*	*	0	*

d/ Includes custodial services only -- i.e., those not receiving active treatment to diagnose or cure an illness.

e/ Includes all patients in facilities certified as skilled nursing facilities, regardless of actual level of care received.

f/ Includes only residents not able to live independently in normal housing.

g/ Excludes services of physicians, dentists, and other practitioners who normally treat acute illness.

TABLE 5. ESTIMATED SPENDING UNDER PRESENT FEDERAL PROGRAMS FOR SELECTED LONG-TERM CARE SERVICES, FISCAL YEARS 1977-1985: DOLLARS IN BILLIONS

	1977	1978	1979	1980	1981	1982	1983	1984	1985
Program Outlays	7.1-7.3	8.4-8.5	9.7-10.0	11.3-11.8	13.2-13.8	15.3-16.2	17.7-19.0	20.6-22.3	23.9-26.1
Medicare	0.7-0.8	0.9	1.0-1.2	1.1-1.5	1.3-1.7	1.5-2.0	1.6-2.4	1.9-2.8	2.2-3.2
Skilled Nursing Facilities	0.4	0.4	0.5	0.6	0.6	0.7	0.8	0.9	1.0
Home Health Services	0.4	0.4-0.5	0.5-0.7	0.7-1.0	0.7-1.2	0.7-1.2	0.8-1.5	1.0-1.8	1.1-2.1
Administrative Expenses	*	*	*	* - 0.1	* - 0.1	* - 0.1	* - 0.1	0.1-0.1	0.1-0.1
Medicaid	6.0-6.1	7.1-7.2	8.3-8.4	9.6-9.8	11.2-11.5	13.0-13.4	15.2-15.7	17.7-18.5	20.5-21.6
Skilled Nursing Facilities	4.5	5.3	6.1	7.1	8.2	9.6	11.1	13.0	15.1
Intermediate Care Facilities	1.4	1.6	1.9	2.2	2.5	3.0	3.4	4.0	4.6
Home Health Services	0.1-0.2	0.2	0.2-0.3	0.2-0.4	0.3-0.5	0.3-0.7	0.4-0.9	0.5-1.2	0.6-1.6
Administrative Expenses	0.1	0.1	0.1	0.2	0.2	0.2	0.2-0.3	0.3	0.3-0.4
Other Civilian Programs	0.3	0.4	0.4-0.5	0.5	0.6	0.7-0.8	0.9	1.0-1.1	1.2
Skilled Nursing Facilities	0.1	0.1	0.1	0.1	0.2	0.2	0.2	0.3	0.3
Intermediate Care Facilities	0.2	0.2	0.2	0.3	0.3	0.4	0.5	0.6	0.7
Personal Care Facilities	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.2	0.2
Home Health Services	*	*	*	*	*	*	*	*	*
Federal Outlays	4.5-4.6	5.3-5.4	6.1-6.4	7.2-7.6	8.3-8.9	9.6-10.4	11.0-12.2	12.9-14.3	14.7-16.9
Medicare	0.7-0.8	0.9-1.0	1.0-1.2	1.2-1.5	1.3-1.7	1.5-2.0	1.6-2.4	1.9-2.8	2.2-3.2
Medicaid	3.4	4.0-4.1	4.7	5.5-5.6	6.3-6.5	7.3-7.5	8.5-8.8	9.9-10.4	11.5-12.2
Other Civilian Programs	0.3	0.4	0.4-0.5	0.5	0.6	0.7-0.8	0.9	1.0-1.1	1.0-1.2

* Less Than \$50 million.

Option A expands the services of home health agencies covered by medicare and medicaid. Under this option, for example, the medicare program includes homemaker and rehabilitative therapy services. In addition, a patient could qualify to have services reimbursed if an injury or illness led to a physical state in which supervised home health aide services were necessary for independent living, or if the patient needed rehabilitative therapy to perform such basic tasks as walking and bathing. Homemaker and personal care services would be reimbursed when performed under the general supervision of a professional nurse. (In contrast, current regulations permit payment for home health aide services only in conjunction with a visit by a nurse, physical therapist, or speech therapist.) Reimbursement would also be made for services of proprietary and single service agencies, as well as those of nonprofit organizations.

State medicaid programs would be required to include all services covered by medicare, as well as counseling by medical social workers or any other service necessary to maintain a patient at home rather than in an institution, if that is more economical. Such services would be available to any person eligible for medicaid who needed home health care to delay or avoid institutional care.

Table 6 summarizes estimates of Option A costs. The most comprehensive measure of these costs is their estimated effect on total national spending for home health services. Such spending under Option A is estimated at \$1.5 to \$2.4 billion in fiscal 1979 and is projected to reach between \$6 and \$18 billion by fiscal 1985. The increase in spending over that which would occur under present law is estimated at \$3 to \$9 billion by 1985.

Estimated spending through federal programs under Option A is \$1.6 to \$2.8 billion in fiscal 1980 and between \$5 and \$15 billion by fiscal 1985. 1/ Most of this latter amount, \$4 to \$12 billion,

1/ Because of the lag between the date on which services are rendered and that on which payment for them is made, only 75 percent of the new services incurred in fiscal 1979 would actually be paid for in 1976. In interpreting these estimates, the limitations of the data should be taken into consideration. (See Chapter I and Appendix B for a discussion of these limitations.)

TABLE 6. ESTIMATED EFFECT OF OPTION A ON SPENDING FOR HOME HEALTH SERVICES, FISCAL YEARS 1979-1985:
DOLLARS IN BILLIONS

	1979	1980	1981	1982	1983	1984	1985
<u>National Spending</u>							
Under Present Law	1.4-2.2	1.6-2.7	1.8-3.4	2.1-4.3	2.4-5.4	2.8-6.8	3.2-8.6
Under Option A	1.5-2.4	2.0-3.4	2.5-4.9	3.2-6.9	4.2-9.8	4.9-13.8	5.7-17.8
Increase	0.1-0.2	0.4-0.7	0.9-1.5	1.1-2.6	1.8-4.4	2.1-7.0	2.5-9.2
<u>Federal Program Outlays</u>							
Under Present Law	0.7-1.0	0.8-1.3	0.9-1.6	1.1-2.0	1.3-2.4	1.4-3.0	1.7-3.8
Medicare	0.5-0.7	0.6-0.8	0.7-1.0	0.7-1.2	0.8-1.5	1.0-1.8	1.1-2.1
Medicaid	0.2-0.3	0.2-0.4	0.3-0.5	0.3-0.7	0.4-0.9	0.5-1.2	0.6-1.6
Other Civilian Programs	*	*	*	*	*	*	* - 0.1
Under Option A	1.2-1.8	1.6-2.8	2.1-4.1	2.8-5.8	3.5-8.3	4.5-11.7	4.7-14.8
Medicare	0.9-1.4	1.3-2.2	1.7-3.2	2.2-4.6	2.8-6.5	3.6-9.2	3.7-11.7
Medicaid	0.3-0.4	0.4-0.6	0.4-0.8	0.6-1.2	0.8-1.8	0.9-2.4	1.0-3.1
Other Civilian Programs	*	*	*	*	*	*	*
Increase	0.4-0.8	0.8-1.5	1.3-2.5	1.7-3.9	2.3-5.9	3.0-8.7	3.1-11.1
<u>Federal Outlays:</u>							
Under Present Law	0.6-0.9	0.7-1.1	0.8-1.4	0.9-1.6	1.0-2.0	1.3-2.5	1.4-3.1
Under Option A	1.0-1.6	1.5-2.6	1.9-3.7	2.5-5.3	3.2-7.5	4.1-10.6	4.3-13.5
Increase	0.4-0.7	0.8-1.5	1.1-2.3	1.6-3.7	2.2-5.5	2.8-8.1	3.0-10.4

* Less than \$50 million.

is expected to be paid through the medicare program. Option A would result in increased spending through federal programs of \$0.8 to \$1.5 billion in 1980 and \$3 to \$11 billion in 1985. The federal share of the outlays under federal programs is over 90 percent.

The rapid spending increase for home health agency services, as projected under Option A, is primarily the result of the disequilibrium believed to exist between the need for services that Option A would pay for and the supply of services estimated under current law. According to these projections, the disequilibrium would disappear by fiscal 1984, and thereafter the rate of increase in spending for home health services is projected to be the same as under present law.

Option B would provide a comprehensive set of long-term care services through the Option A changes in medicare, as well as a new federal long-term care program. The new program would explicitly replace the federal/state medicaid program and create an entitlement to most long-term care services needed by elderly and disabled persons who are not able to take care of themselves. Through the program, most appropriately placed residents of skilled nursing, intermediate care, and personal care facilities would be eligible for reimbursement for the full cost of such services, less the applicable copayments. Residents of sheltered living facilities whose physical or mental condition renders it uneconomical or impossible for them to live independently would also be eligible for full payment of the reasonable and necessary costs of the facilities, less the applicable copayments. The program would pay for most skilled home health, personal, and homemaker services provided to qualified persons through home health agencies.

To qualify, patients must need the services to (1) diagnose or treat an injury or illness, (2) to stabilize a medical condition or slow the deterioration of health, (3) to preserve, maintain, or restore the ability to perform basic activities of daily living, or (4) to prevent or delay institutionalization.

The pattern of copayments is designed to reduce financial incentives favoring institutional care over sheltered living or home care, and to provide incentives for obtaining help from friends and relatives rather than through formal personal care and homemaker services. Low-income patients would receive a copayment allowance. This could be used either to pay the copayments or be retained by the patient if alternatives to formal care are used.

As noted earlier, Option B would create a potential demand for sheltered living and home-based services that appears to be far greater than the services projected to be available. This excess demand is expected to cause a rapid increase in the supply of sheltered living facilities and home health services.

Table 7 summarizes the estimated effect of Option B on spending in fiscal years 1979-1985 for those long-term care services covered. Total national spending for these services is estimated to be \$22 to \$26 billion in 1979, and \$62 to \$94 billion by 1985. The increase in spending over that estimated to occur under present law is expected to range between \$10 to \$31 billion by 1985; only a small part of this increase is attributable to institutional care.

Total spending for nursing home care is expected to drop below that projected under present law, as a result of the availability of attractive alternatives. ^{1/} Part of the reduction, however, would occur as a result of the conversion of some nursing homes to personal care facilities, which are also eligible for reimbursement through the program. Estimated spending for services in personal care homes is projected to rise more rapidly under the new program than under present law.

The growth of expenditures for sheltered living facilities will probably be quite rapid compared to projections under present law. In 1985, national spending is estimated to be \$2 to \$6 billion higher than that projected under present law. Estimated spending for home health agency services would increase even more rapidly than that projected to occur under Option A. By 1985, the additional spending over present law is estimated to be between \$6 and \$24 billion.

Outlays under all federal programs are estimated at \$20 to \$23 billion in 1980 and \$47 to \$73 billion by 1985. The major portion of these expenditures would be for nursing home and personal care facility services: \$18 billion in 1980 and \$37 billion in 1985. Spending for sheltered living facilities is estimated at \$0.2 to \$1.8 billion in 1980 and \$2 to \$7 billion by 1985. Home health services spending is estimated to reach \$2 to \$3 billion in 1980 and \$8 to \$27 billion by 1985.

^{1/} For a discussion of the incentives for elderly and disabled persons in poor physical condition to remain at home, live in sheltered living facilities, or enter institutions, see Congressional Budget Office, Long-Term Care for the Elderly and Disabled, February 1977.

TABLE 7. ESTIMATED EFFECT OF OPTION B ON SPENDING FOR SELECTED LONG-TERM CARE SERVICES, FISCAL YEARS 1979-1985: DOLLARS IN BILLIONS

	1979	1980	1981	1982	1983	1984	1985
<u>National Spending</u>							
Option B	22.0-25.8	26.5-31.5	31.8-38.9	37.9-48.4	44.6-59.8	52.6-74.7	62.4-94.4
Nursing Homes and Personal Care Facilities	20.0	23.9	28.3	33.2	38.1	43.7	50.1
Sheltered Living Facilities	0.4-3.2	0.4-3.8	0.6-4.7	0.8-6.2	1.3-7.9	1.9-9.8	2.9-11.9
Home Health Services	1.6-2.6	2.2-3.8	2.9-5.9	3.9-9.0	5.2-13.8	7.0-21.2	9.4-32.4
<u>Increase Over Present Law</u>	<u>0.6-0.7</u>	<u>1.6-2.4</u>	<u>2.8-4.9</u>	<u>4.3-8.7</u>	<u>5.6-13.4</u>	<u>7.3-20.5</u>	<u>9.9-31.2</u>
Nursing Homes and Personal Care Facilities	0.3	1.0	1.6	2.2	2.1	1.8	1.5
Sheltered Living Facilities	*	* -0.3	0.1-0.8	0.3-1.8	0.7-2.9	1.3-4.3	2.2-5.8
Home Health Services	0.3-0.4	0.6-1.1	1.1-2.5	1.8-4.7	2.8-8.4	4.2-14.4	6.2-23.9
<u>Outlays Under Federal Programs</u>							
Option B	13.1-15.4	20.0-23.1	23.7-28.7	28.7-36.2	35.8-47.2	39.9-57.1	47.3-72.9
Nursing Home and Personal Care Facilities	11.6	17.6	20.6	24.5	30.1	32.3	36.9
Sheltered Living Facilities	0.1-1.3	0.2-1.8	0.2-2.5	0.4-3.4	0.7-4.5	1.1-5.7	1.7-7.1
Home Health Services	1.1-2.1	1.7-3.1	2.3-4.8	3.1-7.4	4.2-11.5	5.6-17.7	7.6-27.1
Administrative Expenses	0.3-0.4	0.5-0.6	0.6-0.8	0.7-0.9	0.8-1.1	0.9-1.4	1.1-1.8
<u>Increase Over Present Law</u>	<u>6.8-10.3</u>	<u>12.7-15.4</u>	<u>15.2-19.4</u>	<u>18.7-25.6</u>	<u>24.5-34.6</u>	<u>26.7-42.3</u>	<u>32.1-55.8</u>
Nursing Home and Personal Care Facilities	6.2	11.3	13.3	16.1	20.3	20.9	23.8
Sheltered Living Facilities	0.1-1.3	0.2-1.8	0.2-2.5	0.3-3.4	0.7-4.5	1.1-5.7	1.7-7.1
Home Health Services	0.4-1.1	0.9-1.9	1.4-3.2	2.0-5.5	3.0-9.0	4.2-14.6	5.9-23.3
Administrative Expenses	0.1-1.7	0.2-0.3	0.3-0.4	0.3-0.6	0.5-0.8	0.5-1.1	0.7-1.6
<u>Federal Outlays</u>							
Under Option B	11.9-14.1	18.2-21.1	21.5-26.1	26.1-33.2	30.7-41.3	36.3-52.6	43.0-67.2
Increase Over Present Law	5.8-8.9	11.0-13.5	13.2-17.4	16.5-22.9	19.7-29.2	20.2-38.4	28.3-50.3

* Less than \$50 million.

The estimated increase in spending through federal programs over that projected under present law ranges from \$13 to \$15 billion in 1980 to \$32 to \$56 billion in 1985. A substantial part of that increase would be the result of the absorption by federal programs of a large proportion of all spending for care in nursing homes and personal care facilities. Outlays for residents of these facilities are estimated at \$11 billion in 1980 and \$24 billion by 1985. Large increases are also attributable to increased utilization of sheltered living and home health agency services.

Total federal outlays for all these services are estimated at \$18 to \$21 billion in 1980 and \$43 to \$67 billion by 1985. This would be an increase in spending over that estimated under present law of \$11 to \$13 billion in 1980 and \$28 to \$50 billion in 1985.

NEED FOR LONG-TERM CARE SERVICES

According to the estimates, spending for sheltered living facilities and home health agency services would be increasing rapidly throughout the years 1979-1985 and beyond. Even at the projected level of spending for 1985, the need for these services would still greatly exceed the available supply. Further, the projected need for such services would also continue to increase more rapidly than the total population by virtue of the continued aging of the population.

Table 8 compares estimates of the need for services that would qualify for reimbursement under Option B with the services projected to be available. The projection of need excludes services that would not be reimbursed under federal programs because either (1) the patient receiving the services was not eligible for the program as an elderly or disabled person, (2) the physical condition of the patient was not sufficiently severe, (3) the provider did not meet the standards set by the program, or (4) the service itself did not qualify. Such nonqualifying services are estimated to constitute from 5 to 10 percent of the spending projected under present law.

Table 8 also shows the outlays under federal programs that would occur if all the services projected to be needed were actually supplied and used. The outlays differ from the estimated need by the cost sharing that the patients are required to pay and by the lag between the times when services are performed and payment for them is made.

TABLE 8. NEED FOR LONG-TERM CARE SERVICES COVERED BY OPTION B, COMPARED TO SUPPLY UNDER PRESENT LAW a/:
BY FISCAL YEARS, DOLLARS IN BILLIONS

	1979	1980	1981	1982	1983	1984	1985
<u>Services Needed:</u>							
<u>Total Spending</u>	37.4-52.6	42.8-59.9	48.8-68.0	55.4-77.1	62.3-86.5	70.0-97.2	78.7-109.1
Nursing and Personal Care Facilities <u>b/</u>	20.0	23.9	28.3	33.2	38.1	43.7	50.1
Sheltered Living Facilities	6.9-9.0	7.6-10.0	8.4-11.1	9.3-12.4	10.3-13.7	11.4-15.3	12.6-17.0
Home Health Services	10.5-23.6	11.3-26.0	12.1-28.6	12.9-31.5	13.9-34.7	14.9-38.2	16.0-42.0
<u>Paid for by Federal Programs (Option B)</u>	28.5-41.9	32.4-47.4	36.7-53.7	42.1-61.2	49.3-70.8	53.5-77.6	59.8-87.0
Nursing and Personal Care Facilities <u>b/</u>	15.0	17.6	20.6	24.5	30.1	32.5	36.9
Sheltered Living Facilities	5.0-6.6	5.6-7.4	6.2-8.3	6.9-9.3	7.7-10.4	8.6-11.6	9.6-13.0
Home Health Services	8.5-20.3	9.2-22.4	9.9-24.8	10.7-27.4	11.5-30.3	12.4-33.5	13.3-37.1
<u>Projected Under Present Law:</u>							
<u>National Spending</u>	21.5-25.0	25.0-29.2	29.0-34.0	33.6-39.7	39.0-46.3	45.4-54.2	52.5-63.4
Nursing and Personal Care Facilities <u>b/</u>	19.7	23.0	26.7	31.0	36.0	41.9	48.6
Sheltered Living Facilities	0.4-3.1	0.4-3.5	0.5-4.0	0.5-4.4	0.6-4.9	0.7-5.5	0.7-6.2
Home Health Services	1.4-2.2	1.6-2.7	1.8-3.4	2.0-4.3	2.4-5.4	2.8-6.8	3.2-8.6

a/ Based on adequate supply of available services being fully utilized.

b/ Includes skilled nursing, intermediate care, personal care, and domiciliary care facilities.

The total cost for qualified services needed is estimated at \$37 to \$53 billion in 1979, and could range between \$79 and \$109 billion by 1985, as a result of the increased cost of providing services and the growth of the aged population. Institutional care in nursing homes and personal care facilities is estimated to be \$20 billion in 1979 and to reach \$50 billion in 1985. ^{2/} The need for sheltered living facilities is estimated to be \$7 to \$9 billion in 1979 and \$13 to \$17 billion by 1985. The need for home health agency services is projected at \$11 to \$24 billion in 1979 and \$16 to \$42 billion by 1985.

The potential outlays under federal programs for these services, i.e., medicare and a new long-term care program, are gauged at \$29 to \$42 billion in 1979 and \$60 to \$87 billion by 1985. In contrast, total spending for all persons for the same services under present law is projected to be \$22 to \$25 billion in 1979 and \$53 to \$63 billion by 1985. Since 5 to 10 percent of these services would not qualify under Option B, as mentioned above, the unmet need is estimated to be \$18 to \$29 billion in 1979 and \$31 to \$59 billion by 1985.

^{2/} The need for institutional facilities is projected to be that estimated to be provided under Option B. Although there is some evidence that the need for these facilities is somewhat less than projected, it is very unlikely that there would be an actual movement of residents from these facilities. However, the growth rate in the average number of nursing home residents is projected to be substantially less under Option B than under present law, because of the availability of alternative levels of care.

APPENDIX A. POLICY ASSUMPTIONS ABOUT BENEFITS IN LONG-TERM
CARE OPTIONS

OPTION A: MODIFICATION OF MEDICARE AND MEDICAID
HOME HEALTH SERVICES

Option A would expand the home health agency services paid for by the medicare and medicaid programs. The general goal of the modification to the medicare program is to cover most home health services that are medically required to diagnose or treat an injury or illness, i.e., "acute" home health care. Medicaid would be altered by requiring all state programs to include acute home health services. Such services would be expanded to include those required to maintain a sick or incapacitated patient at home instead of in an institution, when it is more economical or medically desirable to do so.

The Social Security Act is assumed to be amended specifically as follows:

1. Title XVIII (medicare program), requirements for coverage under Part B
 - a. Homebound requirement

Change the requirement that patient be "homebound" to "essentially bedridden or homebound and such that considerations of health and economy make delivery of health services in the home more practical than in another setting." 1/

1/ The legislative report would have to include a number of examples of how the relative weight of economy and health considerations should be assessed. These would serve as guidelines for drafting regulations.

b. Need for skilled services

Expand the definition of skilled services to include: 2/

- o "Supervision by an R.N. or other appropriate skilled person of home health aides whose services are required by a patient to live independently."
- o "Restorative or rehabilitative therapy necessary to enable patients to perform basic tasks of daily living." 3/

c. Covered services

Expand coverage of home health services to include:

- o "Provision of a dietetic plan."

2/ Under present law, three sets of conditions must be met in order for payment to be made for home health agency services:

- (1) The patient must need "skilled" services on an "intermittent" basis.
- (2) The principal service furnished must be "skilled."
- (3) The home health agency furnishing the service must meet standards set by the Social Security Administration and enforced by state agencies.

Currently, skilled services are defined to be nursing by an R.N. or L.P.N., or therapy by a speech or physical therapist. Other services such as those provided by home health aides, occupational therapists, and medical social workers are covered only if they are incidental to the provision of a skilled service.

3/ These rehabilitative services are generally referred to as "occupational therapy."

- o "Periodic visits by a home health aide employed by an approved home health agency between visits by a supervising nurse, when certified by a physician as necessary to prevent or delay institutionalization of the patient or when certified by the supervising nurse as necessary to prevent the need for more frequent visits by a skilled nurse." 4/
- o "Restorative or rehabilitative therapy furnished by employees of a home health agency, which, on the basis of quantitative studies conducted by the Secretary, can be expected to enable patients to perform basic tasks of daily living."

d. Frequency of care required

Drop requirement that need for skilled care be "part-time or intermittent."

e. Quality and eligibility

Require the administrative agency to have a program of inspection conducted by professional personnel employed by the Part B carriers. The carriers would be directed to design the pattern of inspection visits so as to minimize overall costs of the program. If the review determined that services were unnecessary, inappropriate or too frequent, the level of reimbursement to the agency could be reduced to the level corresponding to appropriate care. Alternatively, the administrative agency could consider delegating its inspection responsibilities to peer review organizations if there was substantial evidence that such review furthered the objectives of efficient and effective care.

f. Proprietary agencies

Allow reimbursement of services provided by proprietary agencies, if standards determined by the Secretary are met.

4/ Thus there would be reimbursement for household services essential to providing health care in the home, regardless of whether such tasks add to the overall time spent in the home. Patients must still need such services as the result of an accident or illness.

g. One-service agencies

Allow reimbursement of services provided by agencies offering only skilled nursing if there is a scarcity of other skilled practitioners in the area served.

h. Eligible providers

An eligible provider must be primarily an agency delivering physician-supervised skilled nursing and allied home health services to persons suffering from illness or accidents.

2. Title XIX (medicaid program)

a. Covered home health services would have to include all that are certified by a physician as necessary to: diagnose and/or treat an injury or illness; stabilize a patient's medical condition or slow the deterioration of health; or prevent or delay the need for institutionalization. Services could be limited to essentially bedridden or home-bound persons unable to perform basic activities of daily living and for whom considerations of health and economy make delivery of services in the home more practical than in another setting.

b. Covered services would include those covered under Title XVIII, plus the following:

- o "Counseling by a medical social worker."
- o "Homemaker services, when the patient is terminally ill or when such services are determined by the administrative agency to be necessary to prevent or delay institutionalization."

3. Financing

a. Medicare services

Two methods of financing Option A amendments to medicare were considered:

- o Continue present cost-sharing and financial arrangements. Since there would not be any increase in the Part B premium rate, all increased outlays would be paid for by general revenues.
- o Combine Part A and Part B home health services into a new Part C. Part C would make no distinction between posthospital and other services, have no deductible, and require a uniform \$2 copayment per visit for all covered services. The copayment amount is assumed to be a fixed percentage of the "Inpatient Deductible," and thus would be adjusted upward after 1978 with Part A copayments. All persons covered under Part A would also be covered under Part C. A payroll tax increase and an increase in the Part A premium (for persons not eligible for social security) would be required.

b. Medicaid services

Two alternatives for financing the medicaid amendments in Option A were considered:

- o Continue current financing arrangements and matching formula. The federal government would pay from 50 to 85 percent (average of 56 percent) of increased outlays, depending on state per capita income.
- o Adjust matching percentages for reimbursing states so that the cost of the new benefits is in effect borne by the federal government. One way to do this would be to raise the basic sharing percentages above the current 50 to 85 percent. Alternatively, the matching formula could be changed to provide each state with a flat amount estimated to be equal to the state share of the average cost of the new benefit. This could be based on the number of aged and disabled persons below the poverty line in that state and the estimated average per capita cost of the home care benefits.

All other outlays through medicaid programs, including any difference between the flat amount and the actual cost of the program, would be matched on the present basis. Some states would receive amounts above the extra

cost of the new benefits; others would receive less, depending on how their programs were administered. States would continue to pay approximately 44 percent of any new or increased outlays that resulted from any other change in a medicaid program.

In all cases, the amendments are assumed to be effective as of October 1, 1978.

OPTION B: LONG TERM CARE ON A SOCIAL INSURANCE BASIS

Option B would provide a broad range of medical and social services to all persons who, as a result of a medical condition, require assistance to live in an independent setting or to prevent or delay the need for institutional care.

1. To be eligible for a service, a patient must meet the following conditions:
 - a. The medical condition must be such that the services in question are needed to do the following:
 - o Diagnose or treat an injury or illness.
 - o Stabilize a patient's medical condition or slow the deterioration of health.
 - o Preserve, maintain, or restore a patient's ability to perform basic activities of daily living (e.g., walking, bathing, eating, etc.).
 - o Prevent or delay institutionalization or movement to a more expensive level of care.
 - o Provide early detection among high-risk population groups (e.g., persons of advanced age) of degenerative conditions for which, on the basis of quantitative studies, treatment may be expected to control or reduce disease progression.
 - b. The provider and the setting in which the services are performed are the most economical in view of the patient's medical condition.

c. Payment for skilled nursing facilities, intermediate care facilities, and personal care homes would require a finding that either the patient cannot maintain himself in a lower cost setting, or that such a setting would not be economical or would result in significant deterioration in the patient's health.

Findings would be based on the current capacity of the patient for basic activities of daily living, as specified in regulations set by the Department of HEW. The information used as a basis for such findings of need would be developed by an R.N. employed by an independent agency acting on behalf of HEW. ^{5/} The criteria would include the physical condition of a patient, the capacity for personal support from a spouse or other individual, and the patient's capacity for independent living.

d. Payment for homemaker services would be made only for those services which meet the following criteria:

- o The patient's medical condition is determined by an R.N. employed by an independent agency acting on behalf of HEW to require homemaker services to prevent or delay institutionalization.
- o A plan is developed by the agency for periodic homemaker support, and reviewed periodically.

2. All persons found to be in need of care would have to be served at the lowest level of care assessed to be appropriate for their medical condition. Funds would have to be made available to meet this level of need, at least to the extent that resources are available.

If sufficient services are not available to serve all eligible persons needing care, the independent administering agencies would determine priorities and certify only those individuals who are most in need. Priority rules for provision of services would not be a major feature of the program after adequate resources were developed.

3. A resources development fund would receive appropriations equal to 2 percent of operating funds in order to assist communities in planning and developing adequate resources to furnish needed care.

^{5/} Long-term care centers, as specified in Option C, would be an example of such an agency.

4. All aged persons and recipients of supplemental security income (SSI) or social security for disabled persons would be eligible (if found to meet the eligibility criteria as to physical condition described above).

5. The following specific copayments are assumed:

- a. The copayment for a skilled nursing facility and an intermediate care facility would be the basic SSI payment for a single individual without other income (\$168/month from July 1976 through July 1977), expressed as a daily rate (\$5.52/day).
- b. The copayment for personal care or domiciliary care homes would be 75 percent of that for skilled nursing facilities (\$4.14/day).
- c. The copayment for sheltered living would be 50 percent of the copayment for skilled nursing facilities (\$2.76/day).
- d. The copayment per visit for home health services (including services furnished to residents of sheltered living facilities, domiciliary care, and personal care homes) would also be 50 percent of the copayment for skilled nursing facilities. A maximum of seven copayments would be payable in any week.

6. All residents of sheltered living facilities and those not living in institutions who are eligible for SSI and certified to need services would receive a special copayment allowance, as follows:

- a. Those certified to need intensive nursing care would receive a copayment allowance equal to 6.5 times the applicable copayment each week.
- b. Those certified to need intermediate nursing care would receive a copayment allowance equal to 3 times the applicable copayment amount each week.
- c. Those certified to need personal care would receive a copayment allowance equal to the applicable copayment amount each week.

The amount of the allowance is not based on whether a patient is actually living independently, is in a sheltered living facility, or is confined in an institution, provided that an assessment of need has been made.

7. All persons could, at their option, supplement program payments with private funds. In such cases no public funds would be allowed to cover the added cost of the elective living arrangement over the cost of the certified level of care.

8. The effective date of coverage is assumed to be October 1, 1978.

9. No benefits are assumed to be paid for residents of facilities for drug addicts, alcoholics, the mentally disturbed, or the mentally retarded, or those in state and local government facilities for the physically handicapped, the blind, and the deaf.

10. Home health services are assumed to be paid for only if provided through an agency meeting the requirements of the medicare program (as modified by Option A).

APPENDIX B. ESTIMATES OF NEED AND SPENDING FOR LONG-TERM
CARE SERVICES

NEED FOR LONG-TERM CARE

Two of the options analyzed by the Congressional Budget Office would fundamentally change the financing of long-term care in the United States. Under Option B, all elderly and disabled persons who have a substantial need for long-term care would be entitled to an array of services. Under Option C, they would be eligible for those services that could be paid for within the resources allocated to the program. In either case, funds would very likely become available to pay for many services that are currently beyond the financial means of many aged and disabled persons who appear to need them. This unmet need is especially great for home health services and those provided by sheltered living facilities.

The need for long-term care services has been assessed in a number of studies. The relevant data from the most germane of these is summarized below.

- a. Percentage of persons over age 65 in Monroe County, N.Y., receiving and needing long-term care in 1964: 1/

	<u>Use</u>	<u>Need</u>
Intensive nursing care	0.4	0.3
Institutional nursing care	2.6	2.7
Congregate living	1.6	5.9
Public health nursing at home	<u>2.4</u>	<u>6.7</u>
Total	7.0	15.6

1/ Robert L. Berg, et al., "Assessing the Health Care Needs of the Aged," Health Services Research, Spring 1970.

- b. Percentage of persons over age 65 in the Minneapolis region in 1974, who need the following 2/:

Intensive home health care	1 - 3
Intermediate home health care	7 - 12
Personal care and chore support	<u>20</u>
Total	28 - 35

- c. Percentage of aged persons in the U.S. in 1972 who 3/:

Need assisted living and have severe limitations in physical or emotional performance	5.7
Need mobility and personal care assistance	<u>11.1</u>
Total	16.8

- d. Percentage of aged in the U.S. in 1972 who are 4/:

Confined to home	5.2
Need help in getting around	<u>6.7</u>
Total	11.9

The different definitions of long-term care used in these studies and the varying objectives and methodologies followed in assessing need make it difficult to compare these sets of data. Also, those studies directed to the problem of determining long-term care

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- 2/ Jay Greenberg, "The Costs of In Home Services," in A Planning Study of Services to Noninstitutional Older Persons in Minnesota, Governor's Council on Aging, State of Minnesota, Minneapolis, Minn. 1974.
- 3/ Nagi, Saad Z., "An Epidemiology of Disability Among Adults in the United States," Milbank Memorial Fund Quarterly, Fall 1976.
- 4/ U.S. Department of Health, Education, and Welfare, National Center for Health Statistics, Limitations of Activities and Mobility Due to Chronic Conditions, United States - 1972, Series 10, Number 96, Washington, D. C., U.S. Government Printing Office, November 1974.

needs (e.g., the Monroe County and Minneapolis surveys) analyze the situation in relatively small areas of the country where conditions may not be typical. The only study based on clinical evidence, that in Monroe County, N.Y., was completed in 1964. 5/

Comprehensive national data are available only for the number of persons disabled or homebound and limited in mobility. 6/ 7/ It is not clear how the responses given in these national surveys relate to the examination process followed in Monroe County. Further, the procedures that would be followed in determining eligibility under a public program may produce very different results from those found by either a survey or a clinical examination procedure. Thus, a precise estimate of the need for long-term care or the volume of services that would materialize under a national program based on need is beyond the limits of the data available.

The information available is adequate, however, to form the basis for order-of-magnitude estimates of the long-term care services needed. To indicate the uncertainty surrounding any estimate of the need for these services, only broad ranges are given. In view of the limitations of the data available, it is quite possible that the actual need could be beyond the ranges given.

The Elderly

Based on data listed above, the following assumptions were adopted with respect to the proportions of the elderly who needed

5/ A follow-up study in 1970 indicated the same general level of need for services and documented a major shift to a larger proportion of persons receiving the necessary level of care, perhaps as a result of the 1964 study.

6/ The number of disabled persons in the U.S. has been estimated by the Bureau of the Census and the Office of Research and Statistics of the Social Security Administration. The primary objective of these studies, however, was to determine the capacity to earn a living rather than to perform basic daily activities.

7/ For a discussion of the relationship between these definitions and the need for long-term care, see Congressional Budget Office, Long-Term Care for the Elderly and Disabled, February 1977.

at least the specified level of long-term care services in fiscal 1976 (cumulative by level of care):

	<u>Percentage</u>
Skilled nursing facilities	0.4 <u>8/</u> - 2.3 <u>9/</u>
Intermediate care facilities	3.5 <u>8/</u> - 5.0 <u>10/</u>
Personal care homes and sheltered living facilities	10.0 <u>8/</u> - 12.5 <u>11/</u>
Intensive nursing at home or in sheltered living facilities	10.5 <u>12/</u> - 14.0 <u>12/</u>
Intermediate nursing, personal care and homemaker services at home or in sheltered living facilities	16.5 <u>8/</u> - 21.5 <u>13/</u>

8/ Data from Berg et al. for Monroe County, N.Y., op. cit., projected for changes in the size and demographic composition of the elderly population from 1964 to 1976. (See p. 51 for a description of the technique used.)

9/ Based on current use of these facilities and the ratio of medicaid patients who receive skilled nursing and intermediate care in nursing homes.

10/ Based on current use of these facilities.

11/ Estimated as 125 percent of low estimate. The average of the high and low estimates approximately matches the sum of 5.1 percent now in institutions and the 5.7 percent of the noninstitutionalized population found by Nagi to need assisted living and to have severe limitations in physical or emotional performance.

12/ Data from Greenberg, op. cit., for the Minneapolis region, assuming that half of the noninstitutionalized elderly needing intensive nursing are in sheltered living facilities.

13/ Based on total of 16.8 percent of noninstitutionalized elderly found by Nagi to need personal care and mobility assistance and the 5 percent who are institutionalized.

These ranges are, at best, gross approximations of the proportions of persons who would qualify for a public program that funded all necessary services. The latter would have to be determined through a set of legally consistent criteria and procedures that assured uniform and equitable administration. The data are adequate, however, to demonstrate that, with the exception of institutional nursing facilities, far more persons would qualify for benefits than there are facilities and personnel to provide them. Hence, at least in the short run, the cost of the program would be determined almost entirely by the supply of available facilities. 14/

The projected number of elderly residents of institutional facilities, however, exceeds even the high estimate of their need for this type of care. Part of the reason for this phenomenon may be the absence of alternatives to institutional care. Part of the explanation may also be other sociological or preference factors not currently understood. An attempt in Monroe County to move many patients to a lower level of care proved unsuccessful for reasons not among the criteria used in assessing patient needs. For most residents, the facilities constituted their only home and their advanced age precluded adjustment to an alternative environment.

A public program must inevitably be sensitive to the perceived needs of patients as well as to purely clinical evidence. Thus, the "need" for institutional care, as determined by a public program, may turn out to be somewhat higher than that found by a survey based on clinical evidence alone.

In view of the limitations of the clinical criteria, the "need" for skilled nursing facilities, intermediate care facilities, and personal care facilities was estimated to be that which would presumably occur under a social insurance program that paid for the cost of care needed in these facilities (e.g., Option B).

14/ The cost estimates are based on this assumption.

To reflect these considerations, the number of persons needing each level of long term care was adjusted as follows:

- a. The number of persons "needing" each level of institutional care was projected to be the number of persons estimated to use these facilities under Option B. 15/
- b. The number of persons "needing" either institutional or sheltered living facilities was increased by half of the difference between the projected need (based on the percentages shown earlier) and the projected use estimated under Option B. This adjustment allows for those persons who are presently confined in institutions but who do not meet the clinical definition of need even for sheltered living. These are assumed to be eligible for continued institutional care under other criteria appropriate for a public program. 16/
- c. The number of persons needing at least sheltered living, or at least the intermediate level of home health care, was projected to 1980 and 1985, based on the change in size and age composition of the population.
- d. The number of persons needing each specific level of care was obtained by subtracting those found to need a more intensive level of care.

Table B-1 summarizes the estimated number of aged persons needing each level of care.

15/ The projection of the number of persons receiving institutional care under Option B is described in the next section of this appendix.

16/ Half of those who are projected to be residents of institutional facilities under Option B, but who would not meet the clinical criteria for need for institutional care, are assumed to meet the clinical criteria for sheltered living facilities. The rest are assumed to meet the criteria for intensive or intermediate home health care.

TABLE B-1. ELDERLY AND DISABLED PERSONS NEEDING LONG-TERM CARE IN 1975, 1980, AND 1985 BY LEVEL OF CARE REQUIRED: NUMBERS IN THOUSANDS

	1975	1980	1985
<u>Elderly</u>			
Institutional nursing facilities	1160	1530	1800
Personal care or sheltered living facilities	1300-1690	1420-1860	1530-2050
Intensive home nursing care	120- 350	130- 380	140- 410
Intermediate home health care	<u>1180-1750</u>	<u>1280-1900</u>	<u>1380-2030</u>
All levels of care	3760-4950	4360-5670	4850-6290
<u>Disabled</u>			
Institutional nursing facilities	140	170	200
Personal care or sheltered living facilities	195-250	210-280	230-310
Intensive home nursing care	20- 50	20- 55	20- 60
Intermediate home health care	<u>180-260</u>	<u>190-285</u>	<u>210-300</u>
All levels of care	535-700	590-790	660-870
<u>Total Elderly and Disabled</u>			
Institutional nursing facilities	1300	1700	2000
Personal care or sheltered living facilities	1495-1940	1630-2140	1760-2360
Intensive home nursing care	140- 400	150- 435	160- 470
Intermediate home health care	<u>1360-2010</u>	<u>1470-2185</u>	<u>1590-2330</u>
All levels of care	4295-5650	4950-6460	5510-7160

The Disabled

The need for long-term care services among persons under age 65 was only assessed for those eligible for Option B. However, such persons are believed to constitute most nonaged persons who need long-term care.

Eligibility under Option B for persons under age 65 depends on their receiving disability insurance (DI) payments or supplementary security income (SSI) payments and meeting program requirements for the level of care needed. The number of DI and SSI recipients was projected using the assumptions in the actuarial appendix of the 1976 Annual Report of the Board of Trustees of the Federal OASDI Trust Funds:

	(in thousands)		
	<u>1975</u>	<u>1980</u>	<u>1985</u>
DI recipients	2365	3085	4035
SSI recipients not eligible for social security	1325	2000	2550
All disabled recipients	3690	5085	6585

The need for long-term care services was based on the fact that DI recipients constitute 7.2 percent of persons eligible for medicare but use 7.7 percent of the home health agency services reimbursed by the program. Thus, it is estimated that the disabled, who constitute 14 percent of those who would be covered by Option B, would use 15 percent of home health agency services.

The same proportion was assumed to apply to sheltered living facilities. This proportion was assumed to hold in later years despite the increasing proportion of disabled, since such an increase is attributed to changing eligibility standards for the DI and SSI programs rather than to a higher proportion of persons under age 65 who need nursing, personal care, or homemaker services.

Table B-1 summarizes the number of disabled persons eligible for Option B who are expected to need long-term care services. The table also shows the totals of aged and disabled persons estimated to need long-term care.

SPENDING FOR NURSING HOMES

Current spending for nursing homes was obtained by deriving for each type of home separate estimates of the average number of residents during each year, and the average cost of care per day per resident. The resulting estimates were projected to fiscal 1976 and subsequent years from the last year for which data was available. 17/ Estimates for fiscal 1976 were reconciled with data from the medicare, medicaid, and the Veterans Administration programs to establish the primary government payment channels. The outlays of these programs were also projected to future years.

Number of Residents of Nursing and Personal Care Facilities

The Master Facility Inventory (MFI) 18/ maintains data on the average number of residents in each of four levels of nursing home care: 19/

17/ All estimates were prepared on the basis of two key economic assumptions:

<u>Fiscal Year</u>	<u>Percentage Increase in</u>	
	<u>Consumer Price Index</u>	<u>Average Wage Rate</u>
1977	5.6	7.5
1978	5.8	7.5
1979 and later	6.0	7.5

- 18/ National Center for Health Statistics:
1963 - "Development and Maintenance of a National Inventory of Hospitals and Institutions." Vital and Health Statistics. PHS Pub. No. 1000-Series 1, No. 3. Washington, D.C., U.S. Government Printing Office, February 1965.
1967 - "Inpatient Health Facilities as Reported from the 1967 MFI Survey." Vital and Health Statistics. Series 14, No. 4, DHEW Pub. No. (HSM) 72-1065. Health Services and Mental Health Administration, Washington, D.C., U.S. Government Printing Office, December 1972.

(footnotes 18 and 19 continued on page 50)

- o Nursing care home
- o Personal care homes with nursing
- o Personal care homes without nursing 20/
- o Domiciliary care homes 20/

18/ (continued)

- 1969 - "Inpatient Health Facilities as Reported by the 1969 MFI Survey." Vital and Health Statistics. Series 14, No. 6, DHEW Pub. No. (HSM) 73-1801. Health Services and Mental Health Administration, Washington, D. C., U.S. Government Printing Office, December 1972.
- 1971 - "Inpatient Health Facilities as Reported by the 1971 MFI Survey." Vital and Health Statistics. Series 14, No. 12, DHEW Pub. No. (HRA) 74-1807. Health Resources Administration, Washington, D. C., U.S. Government Printing Office, March 1974.
- 1973 - "Inpatient Health Facilities as Reported by the 1973 MFI Survey." Vital and Health Statistics. Series 14, No. 16, DHEW Pub. No. (HRA) 76-1811. Health Resources Administration, Washington, D. C., U.S. Government Printing Office, May 1976.

19/ For a thorough exposition of the criteria defining each of these types of facilities, see p. 57 of the 1973 MFI Survey. The reader is cautioned that the definitions of these types of facilities are not consistent with those for "skilled nursing facility" and "intermediate care facility," as used by the medicare and medicaid programs.

20/ These categories have nearly disappeared during the last few years as a result of medicaid regulations. In order to obtain reimbursement for residents, most of these facilities added nursing personnel and other improvements required to qualify as intermediate care or skilled nursing facilities.

A large part of the increase in the number of nursing home residents appears to be the result of increases in the population age groups that are the primary users of these facilities. For example, only 0.03 percent of persons under age 65 are residents of nursing homes, while 26.2 percent of those over age 85 reside in these facilities. Thus, the more rapid increase in the population of these higher age groups over that of the general population would appear to explain a substantial part of the recent increases in the number of nursing home residents. Further, growth of these higher age groups during the next decade is expected to be much larger than the growth of the general population.

Population increases for older persons can be projected with a high degree of reliability, using known mortality and net emigration rates. The population growth experienced from 1965-1975 and that anticipated from 1975-1985 are summarized in the following table: 21/

<u>Age</u>	<u>Population (in millions)</u>			<u>Percentage Increase</u>	
	<u>1965</u>	<u>1975</u>	<u>1985</u>	<u>1965-1975</u>	<u>1975-1985</u>
Total	202.9	222.6	239.1	9.7	7.4
Under age 65	184.1	199.8	212.3	8.5	6.3
Age 65 and older	18.8	22.8	26.8	21.3	17.5
65-74	12.1	13.9	16.2	14.9	16.5
75-84	5.6	7.0	8.3	25.0	18.6
85 and over	1.1	1.9	2.3	72.7	21.1

21/ Actuarial Study No. 74, Office of the Actuary, Social Security Administration, June 1975.

To allow for the effect of these predictable demographic changes on the number of residents, the rate of increase of nursing home use was broken down to that based on demographic factors 22/ and that based on all other socioeconomic factors. These would include the breakdown of multigeneration families, the increased income of the elderly, and the growth of public programs supporting institutional care for the elderly. 23/

The 1973-1974 National Nursing Home Survey (NNHS) gathered data on the age distribution of residents of nursing homes and personal care homes with nursing, which constituted 99.2 percent of all nursing home residents in the 1973 MFI survey. 24/ The NNHS age distributions were applied to the 1973 MFI estimates of similar populations to obtain estimates of the number of residents in each age group. 25/ These were divided by the Social Security Actuary's estimate of the population by age group to obtain the following usage rates:

22/ It would also have been desirable to take into account the proportions in each age group who are living with a spouse, with their families, with friends, or alone and the sex of those living alone. Each of these characteristics is correlated with the use of institutional care. Unfortunately, the data necessary for this analysis were not available.

23/ For a more thorough discussion of these factors see Burton Dunlop, Determinants of Long-Term Care Facility Utilization by the Elderly: An Empirical Analysis, Working Paper 963-35, Washington, D.C., The Urban Institute, revised March 1, 1976.

24/ The NNHS excluded the following nursing homes, which were included in the 1973 MFI survey: those which opened after 1972, and those classified as either personal care homes without nursing or domiciliary homes in the 1971 MFI. (Some of the latter homes upgraded their level of services to include nursing care.)

25/ This was necessary because the NNHS survey results were reported for a universe of 1,074 thousand residents, whereas the MFI, from which the NNHS sample was drawn, reported 1,188 thousand residents in 1973 in the types of facilities sampled.

<u>Age</u>	<u>Under 55</u>	<u>55-64</u>	<u>65-74</u>	<u>75-84</u>	<u>85 and over</u>
Residents per 1,000:	0.32	3.45	13.58	61.50	262.10

The usage rates, applied to the Social Security Administration estimates of the U.S. population, produce the following sequence of "expected residents," based on changes in the size and demographic composition of the population:

	(in thousands)						
<u>Calendar Year</u>	<u>1967</u>	<u>1968</u>	<u>1969</u>	<u>1970</u>	<u>1971</u>	<u>1972</u>	<u>1973</u>
Expected residents	986	1022	1060	1099	1128	1158	1188
Actual residents (MFI) <u>26/</u>	696	743	793	889	996	1088	1188
Ratio of actual/ expected	0.706	0.727	0.748	0.809	0.883	0.940	1.000

The difference between this demographically adjusted "expected resident" series and the actual number of residents shows the trend toward increasing use of nursing homes. This social and economic trend was measured by the rate of change in the ratio of actual residents to expected residents. This ratio was derived separately for nursing care homes, for personal care homes with nursing, and for other homes. For the first category, there was an average annual increase in the ratio of 6.54 percent. 27/ This rate of increase was

26/ Intermediate years were interpolated.

27/ The trend was taken over the years 1967-1973 only, as the 1963 data appear to be incomplete. In addition, 1973 residents were adjusted to counteract the effects of shifts to higher levels of care which took place between 1971 and 1973 in response to HEW regulations requiring higher standards for participation in the medicaid program.

projected to continue from 1973-1985. Thus, $D_y = 365 \times P_y \times R_y$

where: D_y is the resident days in year y,

P_y is the expected residents in year y, and

R_y is the ratio of actual to "expected" residents
in year y. 28/

When this technique was applied to personal care and other homes, there did not appear to be any nondemographic trend other than changes in the level of care in existing facilities. Therefore, the numbers of residents in these homes were projected beyond 1973 by assuming that the upward shift in the level of care will continue at a reduced rate for two years and then disappear. After 1975, R_y was assumed to remain constant.

Table B-2 shows the projection of residents for each type of facility in the MFI.

TABLE B-2. AVERAGE NUMBER OF RESIDENTS OF NURSING HOMES BY TYPE OF HOME a/, CALENDAR YEARS 1973-1985

Calendar Year	Nursing Care Home	Personal Care with Nursing	Personal Care Home	Domiciliary Care Home	All Homes
1973 actual	1012	177	8	1	1198
1974 est.	1105	180	6	1	1292
1975	1209	184	6	1	1400
1976	1311	187	6	1	1505
1977	1422	191	6	1	1620
1978	1543	194	7	1	1745
1979	1669	198	7	1	1875
1980	1811	201	7	1	2020
1981	1961	205	8	1	2175
1982	2118	208	8	1	2335
1983	2289	211	8	2	2510
1984	2475	214	9	2	2700
1985	2670	219	9	2	2900

a/ Definitions are those used by the MFI, National Center for Health Statistics.

28/ For nursing care homes, $R_y = R_{73} (1.0654)^{y-73}$

Conversion to Federal Program Elements

The distinctions used in the MFI to classify nursing homes do not relate to factors that would be used to determine services covered under a social insurance program. Such programs necessarily use contractual definitions and administrative procedures which can be applied uniformly throughout the country to obtain consistent determinations of the services eligible for reimbursement. Medicare and medicaid use legal definitions that relate to the facility and the personnel employed there, the condition of the patient, and the services that the patient is actually receiving.

Facilities qualify as either skilled nursing or intermediate care facilities by meeting certification standards set by HEW and administered by state authorities. Physicians certify whether patients require and are receiving care appropriate for a skilled nursing or intermediate care facility. Private insurance policies which cover skilled nursing facility services also use definitions similar to those of medicare. It is therefore highly probable that the Congress will rely on the experience gained from these programs in setting criteria for services covered in a new long-term care program. Consequently, modifications of the medicare and medicaid definitions were used as the basis for cost estimates of the CBO options.

To obtain a suitable basis for preparing cost estimates, the residents of all nursing homes included in the MFI were reclassified in terms of the following:

- o Skilled nursing facilities (SNF): those certified as such under either the medicare or medicaid programs.
- o Intermediate care facilities (ICF): those certified as ICFs by a state medicaid program but not certified as SNFs by either medicare or medicaid.
- o Personal care facilities (PCF): those included in the MFI which are not certified as either SNFs or ICFs by medicare and medicaid. Such facilities can be further divided into those with nursing and those without nursing. 29/

29/ Although the distinction between personal care facilities with and without nursing is important, it was disregarded because the extent of nursing services available or furnished is not documented, and only a small proportion of residents were in facilities that reported themselves as not providing nursing.

The NNHS collected data on the number of residents in facilities at each certification level. The proportions in the NNHS were applied to the projected average number of residents in nursing care homes and personal care homes with nursing (as defined by the MFI) in each year. Residents of uncertified homes were grouped with residents of personal care homes without nursing and domiciliary care homes (referred to as personal care homes). Data from the NNHS and the estimated residents in fiscal 1974 are as follows.

<u>Certification</u>	<u>Proportion of Residents (NNHS) ^{30/}</u>	<u>Residents in Fiscal 1974 (MFI)</u>
SNF only	0.405	501
SNF and ICF	0.245	303
ICF only	0.220	272
<u>No Certification</u>	<u>0.130</u>	<u>161</u>
All Residents	1.000	1237

Only limited data are available on the extent of care that would meet the medicare and medicaid level of care certification requirements. Some data can be obtained directly from the programs themselves; however, medicare only covers short periods of post-hospital confinement, and medicaid only covers the low-income aged and disabled. No reliable information is available on the level of care furnished to other patients. 31/

30/ Unpublished data from the National Center for Health Statistics.

31/ The NNHS does classify patients according to levels of care as follows: 41.0 percent in "intensive nursing care," 9.8 percent in "limited nursing care," 32.3 percent in "routine nursing care," 16.0 percent in "personal nursing care," and 0.9 percent receiving no nursing. The residents found in these classes, however, do not match those eligible for SNF and ICF care under medicare and medicaid.

Source of Payment	Proportion of Residents (NNHS) ^{30/}	Distribution of Residents (MFI) in Fiscal 1974 (in thousands)	
		Applying NNHS Proportions	Actual Program Data
		Medicare	0.012
Medicaid	0.504	623	726 ^{33/}
Assistance payments	0.104	129	n/a
Private or other funds	<u>0.380</u>	<u>470</u>	<u>n/a</u>
All Residents	1.000	1237	1237

Nursing home residents were classified according to the highest level of certification of the facility in which they resided and the primary source of funding. Data from the medicare and medicaid programs were used where available; otherwise, NNHS distributions were used. Table B-3 shows the results for fiscal years 1974-1976.

The number of residents supported by medicare were taken from the Social Security Administration projections. ^{34/} The proportions of other residents in each of the groups (by level of certification/source of funds) were projected to remain the same in future years. Actually, this is rather unlikely, given the history of frequent changes in public policy. The direction of recent change, however, has been toward upgrading the status of nursing homes. Beginning with the medicare and medicaid programs, and in subsequent revisions of the Social Security Act, federally supported payments have acted as an incentive to add skilled services, initiate medical records systems, establish relationships with pharmacies to supervise the administration of medicines, and make other improvements in the level of care. Evidence now indicates that many residents do not need the level of care provided by the facilities in which they reside. Thus, a change in policy to reverse this trend would appear as likely as a continuation of the trend. ^{35/}

^{32/} Data from the Office of the Actuary, Social Security Administration.

^{33/} Data from the National Center for Social Statistics.

^{34/} McKusick and Harris, op. cit.

^{35/} See the discussion of this issue in the Congressional Budget Office paper, Long-Term Care for the Elderly and Disabled.

TABLE B-3. ESTIMATED RESIDENTS OF NURSING AND PERSONAL CARE FACILITIES, FISCAL YEARS 1974-1976, BY LEVEL OF FACILITY CERTIFICATION AND PRINCIPAL SOURCE OF PAYMENT

Certification	Source of Funds	Residents (in thousands)		
		Fiscal 1974	Fiscal 1975	Fiscal 1976
Skilled nursing facility	Total	<u>804</u>	<u>858</u>	<u>913</u>
	Medicare	23	26	29
	Medicare as SNF <u>a/</u>	348	395	395
	Medicaid as ICF <u>b/</u>	147	198	204
	Private and other funds	286	239	285
Intermediate care facility	Total	<u>272</u>	<u>308</u>	<u>350</u>
	Medicaid as ICF <u>b/</u>	231	262	300
	Private and other funds <u>c/</u>	41	46	50
None, nursing care	Total	<u>161</u>	<u>173</u>	<u>185</u>
	Assistance <u>d/</u>	64	70	75
	Private and other funds	97	103	110
None, no nursing care		<u>8</u>	<u>7</u>	<u>7</u>
All residents		1245	1346	1455

a/ McKusick and Harris, "Medicare Benefit Estimates, Fiscal Year 1978 Budget Assumptions," Office of the Actuary, Social Security Administration.

b/ Data from the National Center for Social Statistics.

c/ Assumed to be 15 percent of residents of facilities certified only as ICFs.

d/ Assumed to be half of all persons reporting assistance as their primary source of funds.

There also has been a trend toward publicly financing a greater proportion of care. For example, following the creation of the ICF benefit in 1972, the proportion of nursing home care paid for by medicaid increased from approximately 37 percent in 1973 to 41 percent in 1976. Since spending is projected under present law, no allowance is made for further federal initiatives. However, part of the past increase in medicaid outlays apparently resulted from the conversion of facilities supported by state and local funds to ICFs so that more than half of the cost of supporting residents of these facilities could be shifted to the federal government. It is not known whether this type of conversion has run its course.

On the other hand, the growth of the cost of publicly supported nursing home care has led to increasing scrutiny of these programs. The financial condition of many state and local governments makes the continued appropriation of larger sums each year to support the expansion of medicaid very difficult. Consequently, many states are aggressively seeking ways to reduce program costs. Some may refuse to approve rate increases required to maintain the present level of services. Others may not increase the income levels used to determine medicaid eligibility as rapidly as beneficiary income increases, thus effectively reducing the number of persons eligible. Further, the federal government has become more active in reviewing medicaid determinations in an attempt to eliminate ineligible persons and reduce the number receiving institutional care. In addition, the gradual expansion of home health services and social services projected under present law may enable more persons to avoid institutionalization.

Thus, although change appears certain, its direction is not clear. In view of this uncertainty and the fact that patterns of institutionalization shift slowly, the proportions of SNF and ICF residents estimated to be supported primarily by medicaid funds are projected to be at the fiscal 1976 level in all subsequent years.

Spending for Nursing and Personal Care Facilities Under Present Law

Data on the average cost of care in nursing homes is available from the 1972 NNHS. Some detailed information is also available on the variation in cost according to the facilities' certification. Unfortunately, this data relate to facilities and not to the level of care received by individual patients. The same facility may be certified as both an SNF and an ICF and may have some patients receiving SNF care, some receiving ICF care, and some receiving only

personal care. Trend information is scanty. The principal data available as to the cost of nursing home care is as follows:

- o Charges per month per resident in nursing homes and personal care homes with nursing.

July 1969	\$335	<u>36/</u>
January 1974	\$487	<u>37/</u>

- o Cost per resident by certification of facilities, as reported to NNHS:

Average cost per day in calendar year 1972:

All levels	\$16.44
Certified for medicare or medicaid as SNF <u>38/</u>	20.47
Certified for medicaid as ICF only	11.95
Not certified for medicare or medicaid	14.06

- o Full-time nurses and employees per residents of facilities with nursing, as reported to the MFI:

<u>Calendar Year</u>	<u>Nurses</u>	<u>Employees</u> <u>39/</u>
1967	0.096	0.635
1969	0.100	0.646
1971	0.094	0.661
1973	0.085	0.635

36/ Estimated from MFI from 1969 survey by increasing the average of facility model charges by the ratio in the 1972 NNHS of (a) average cost per resident (averaged over residents) to (b) the average over facilities of average resident cost.

37/ NNHS average charge per resident per month, excluding life care and nonpaying residents.

38/ Those certified for medicaid but not medicare had an average cost of \$15.83, and included 27 percent of residents surveyed.

39/ Based on nursing care homes only.

- o Medicare days reimbursed, reasonable cost per day, and total payment: 40/

<u>Fiscal Year</u>	<u>Days (Millions)</u>	<u>Cost/Day</u>	<u>Reasonable Costs (Millions)</u>
1974	8.4	\$30.00	\$252
1975	9.4	33.55	315
1976	10.5	35.80	375

- o Medicaid days reimbursed, reimbursement per day, and total payments: 41/

	<u>1973</u>	<u>1974</u>	<u>1975</u>	<u>1976</u>
Skilled nursing facilities:				
Days *	125	127	144 <u>42/</u>	144 <u>42/</u>
Reimbursement/day	\$15.63	\$15.80	\$17.22 <u>42/</u>	\$18.77 <u>42/</u>
Outlays *	\$1,959	\$2,002	\$2,490	\$2,694
Intermediate care facilities:				
Days *	90	138	168 <u>42/</u>	184 <u>42/</u>
Reimbursement/day	\$ 9.92	\$10.02	\$10.92 <u>42/</u>	\$11.90 <u>42/</u>
Outlays *	\$ 895	\$1,381	\$1,835	\$2,192
Facilities for mentally retarded:				
Days *	9	12	20	29
Reimbursement/day	\$18.13	\$16.92	\$18.44	\$20.10
Outlays *	\$ 165	\$ 203	\$ 360	\$ 573

* in millions

40/ McKusick and Harris, *ibid.* The estimated reimbursement per day is divided by 0.84 to allow for cost sharing, final settlements, and the lag in payments to providers.

41/ Data from National Center for Social Statistics adjusted to equal program outlays through 1976.

42/ Based on assumption that medicaid reimbursement increased by 9 percent per patient day in fiscal 1974-1976 period.

To estimate the total spending for each group of residents (by certification of facility and source of funds), the data from the NNHS was adjusted for an estimated variation in cost by principal source of payment and projected to fiscal 1976. Each cost was also increased by 1.5 percent to allow for the profit margin of proprietary homes and the retention margin of nonprofit facilities. Since the composition of each group is estimated to have changed somewhat from fiscal 1974 to fiscal 1976, the total cost for all homes was projected independently. Adjustments for principal source of funds and retention are summarized below.

	<u>1972 Data</u>	<u>Adjusted Data 43/</u>
Skilled nursing facility residents:		
Medicare patient	No data	--
Medicaid, reimbursed as SNF	\$20.47	\$20.80 <u>44/</u>
Medicaid, reimbursed as ICF	20.47	15.60 <u>44/</u>
Private patient	20.47	22.45 <u>44/</u>
Intermediate care facility residents:		
Medicaid patient	11.95	11.55 <u>45/</u>
Private patient	11.95	14.45 <u>45/</u>
Residents of personal care facilities with nursing:		
Assistance recipient	14.06	13.45 <u>46/</u>
Private payment	14.06	17.50 <u>46/</u>
Residents of personal care facilities without nursing:		
	No data	11.40 <u>47/</u>
All nursing home residents:	16.44	16.70

43/ Includes 1.5 percent margin for profit (or nonprofit retention).

44/ Based on two assumptions: cost for SNF patients is 33 percent higher than for ICF patients; and cost for private patients is 20 percent higher than for medicaid patients.

45/ Based on assumption that cost of private patients is 25 percent higher than for medicaid patients.

46/ Based on assumption that cost of private patients is 30 percent higher than for medicaid patients.

47/ Equals 80 percent of cost for personal care facilities with nursing.

To estimate spending in fiscal 1976, it is necessary to project these costs for the three-and-a-half year period from calendar 1972 to fiscal 1976. Charge data from the 1969 MFI and 1974 NNHS provide the only information on cost trends. The rate of increase in charges compared to the average increases in wage rates and inflation during the same period is as follows:

	<u>Percent</u>
Annual increase in average charge rates	8.7
Average increase in wage rate <u>48/</u>	7.0
Average increase in Consumer Price Index	5.5

Unfortunately, these figures are not directly comparable and can only be used as a guide to the general magnitude of the increase in nursing home costs. The data for 1969 were an average of the usual charges of the facilities surveyed. Although data were available from the NNHS on the difference between the mean cost averaged over both residents and facilities, the adjustment made, based on the ratio of these means, is not a precise correction. Further, the sampling frame for the NNHS excluded those personal care homes and domiciliary homes which were upgraded to ICFs after 1972. Similarly, the trend in the average for all nursing homes reflects the changing composition of the homes, as well as cost increases among a stable inventory of homes.

The number of nurses and employees per patient day during 1967-1973 does not demonstrate a substantial trend toward the use of more resources. 49/ Thus, it is reasonable to hypothesize that the increase in costs per day were comparable to the increase in personnel salaries and fringe benefits.

48/ Average compensation per man-hour in private nonfarm employment.

49/ This finding contrasts sharply with data for hospitals, where personnel per patient day have been increasing at an annual rate of 3 percent or more for a decade.

Finally, reimbursement rates in medicaid programs barely increased from calendar 1972 to fiscal 1974. There are a number of possible explanations for this situation. The rapidly changing composition of the homes certified by medicaid as SNFs and ICFs would appear to be the most important reason. However, financial pressure from state medicaid agencies, in the form of a refusal to increase payment rates per day, also may have been a contributing factor. Financial pressure on state governments may continue to reduce moderately the rate of increase in reimbursements to nursing homes for medicaid patients. 50/

Giving some weight to each of the factors discussed above, the following assumptions were adopted regarding the cost increase in care after 1972:

<u>Primary Source of Payments</u>	<u>Calendar 1972 to Fiscal 1974</u>	<u>Fiscal 1974 and Beyond</u>
Medicaid	Half increase in wage rate <u>51/</u>	Increase in wage rate <u>52/</u>
Public assistance	Increase in wage rate	Increase in wage rate
Private or other funds	Increase in wage rate plus 1.5 percent	Increase in wage rate plus 1.5 percent
All residents <u>53/</u>	Increase in wage rate plus 0.5 percent	Increase in wage rate plus 0.5 percent

50/ Current regulations, however, require medicaid programs to reimburse SNFs and ICFs on a cost-related basis. If fully implemented, this could lead to a sharp increase in spending for medicaid nursing home care.

51/ The average wage rate increase from 1972 to fiscal 1974 was 8.4 percent.

52/ The average wage rate increase from fiscal 1974 to fiscal 1976 was 9.2 percent.

53/ Approximately 31 percent of patients rely primarily on private or other funds.

These assumed rates of increase produce estimates of average spending in fiscal 1976 for the level of care/source of funds groups that do not add to the estimated total spending for all nursing homes. This results from the shift in residents from private to public sources of funds and the change in certification status following the initiation of the medicaid ICF benefit. Because estimates of the increase in spending per day for all residents of nursing homes are independent of the shift in classification and status within the existing facilities, estimates of spending per day by subgroups were increased to agree with the projected total for all homes. Table B-4 summarizes the results, together with the estimates of total spending for services performed in fiscal 1976.

Spending for nursing home care was also projected beyond fiscal 1976, using the assumptions listed above. The cost for publicly supported patients was thus estimated to increase at a rate of 7.5 percent per year and privately supported patients at a rate of 9.0 percent per year. Table B-5 summarizes the resulting projections, while Table B-6 summarizes outlays under both federal programs and federal outlays. The latter estimates were adjusted to a cash basis, assuming an average lag of 60 days between services provided and related reimbursement. ^{54/} Further, the proportion of service costs for medicaid eligibles paid for by the program was projected to increase by 0.5 percent per year.

Finally, estimates are needed for the distribution of the cost not met by federal programs. The data required are the proportions of SNF care paid by private insurance and philanthropic contributions, and that paid directly by state and local governments to support facilities. The rest of the cost would be paid out-of-pocket. The results for fiscal years 1976 and 1980 are shown in Tables 1 and 4 of the main text. ^{55/}

^{54/} Medicare final settlement payments were assumed to have the effect of delaying payments an additional month.

^{55/} Data for these estimates were derived from unpublished results used in Gordon R. Trapnell, "A Cost Comparison of Major National Health Insurance Proposals," National Technical Information Service, September 1976.

TABLE B-4. ESTIMATED SPENDING INCURRED FOR NURSING HOME AND PERSONAL CARE FACILITIES, FISCAL YEAR 1976 a/

	Average Patients (Millions)	Cost per Day <u>b/</u>	Spending <u>b/</u> (Millions)	Federal Programs <u>c/</u> (Millions)
Skilled Nursing Facilities <u>d/</u>	<u>913</u>		\$ <u>8,705</u>	\$ <u>4,250</u>
Medicare	28	\$36.20	370	310
Medicaid, as SNF Patient	395	25.60	3,690	2,750
Medicaid, as ICF Patient	204	19.25	1,435	1,070
Private or Other Funds	286	30.75	3,210	120
Intermediate Care Facilities <u>e/</u>	<u>350</u>		<u>1,915</u>	<u>1,225</u>
Medicaid (as ICF Patient)	300	\$14.20	1,555	1,165
Private or Other Funds	50	19.80	360	60
Personal Care Facilities with Nursing <u>f/</u>	<u>185</u>		<u>1,445</u>	<u>70</u>
Assistance Recipients	75	\$17.60	480	0
Private or Other Funds	110	24.00	965	70
Personal Care Facilities without Nursing <u>g/</u>	7	\$14.10	35	10
Total	1,455	\$22.80	\$12,100	\$ 5,555

a/ Includes all spending for services provided in fiscal year 1976, regardless of when paid.

b/ Includes 1.5 percent allowance for profit or retention by nonprofit facility.

c/ Total program outlays incurred, including final settlement payments, for services provided in fiscal year 1976. Excludes administrative expenses.

d/ Facilities certified as SNFs by medicare or medicaid.

e/ Facilities certified as ICFs by medicaid, but not certified as SNFs.

f/ Facilities included in the MFI as nursing care or personal care homes with nursing, but not certified as SNFs or ICFs.

g/ Facilities included in the MFI as personal care homes without nursing, or domiciliary care homes.

TABLE B-5. SPENDING FOR NURSING AND PERSONAL CARE FACILITIES, FISCAL YEARS 1977-1985, BY FACILITY CERTIFICATION AND PRINCIPAL SOURCE OF PAYMENT UNDER PRESENT LAW: DOLLARS IN MILLIONS

	1977	1978	1979	1980	1981	1982	1983	1984	1985
<u>All Nursing and Personal Care Facilities</u>	14,520	16,975	19,730	22,970	26,700	31,010	36,010	41,940	48,620
<u>Skilled Nursing Facilities a/</u>	10,470	12,195	14,180	16,500	19,180	22,270	25,840	30,070	34,870
Medicare	435	505	580	690	790	880	960	1,070	1,200
Medicaid, as SNF	4,420	5,120	5,920	6,850	7,920	9,160	10,590	12,280	14,190
Medicaid, as ICF	1,715	1,990	2,300	2,660	3,080	3,560	4,120	4,770	5,510
Private or Other Funds	3,900	4,580	5,380	6,300	7,390	8,670	10,170	11,950	13,970
<u>Intermediate Care Facilities b/</u>	2,290	2,670	3,100	3,600	4,160	4,830	5,610	6,520	7,530
Medicaid, as ICF	1,850	2,150	2,490	2,890	3,330	3,850	4,460	5,170	5,970
Private or Other Funds	440	520	610	710	830	980	1,150	1,350	1,560
<u>Personal Care Facilities c/</u>	1,760	2,110	2,450	2,870	3,360	3,910	4,560	5,350	6,220
Assistance Recipients	560	690	790	920	1,070	1,230	1,430	1,650	1,900
Private or Other Funds	1,200	1,420	1,660	1,950	2,290	2,680	3,130	3,700	4,320

a/ Includes all facilities certified as SNFs for either medicare or medicaid.

b/ Includes all facilities certified as ICFs for medicaid, but not certified as SNFs for medicare or medicaid.

c/ Includes all facilities included in the National Center for Health Statistics MFI that are not certified as skilled nursing or intermediate care facilities for medicare or medicaid.

TABLE B-6. FEDERAL PROGRAM OUTLAYS FOR NURSING AND PERSONAL CARE FACILITIES, FISCAL YEARS 1977-1985: DOLLARS IN MILLIONS

	1977	1978	1979	1980	1981	1982	1983	1984	1985
Program Outlays:	6,545	7,630	8,860	10,330	11,990	13,925	16,145	18,770	21,775
<u>Skilled nursing Facilities a/</u>	4,940	5,750	6,685	7,790	9,045	10,495	12,150	14,120	16,370
Medicare	355	410	475	565	645	720	785	870	980
Medicaid	4,510	5,250	6,100	7,090	8,240	9,580	11,130	12,970	15,060
VA	75	90	110	135	160	195	235	280	330
<u>Intermediate Care Facilities b/</u>	1,520	1,790	2,075	2,430	2,825	3,300	3,855	4,500	5,240
Medicaid	1,360	1,600	1,850	2,160	2,500	2,910	3,390	3,940	4,575
VA	160	190	225	270	325	390	465	560	665
<u>Personal Care Facilities c/</u>	85	90	100	110	120	130	140	150	165
VA	85	90	100	110	120	130	140	150	165
Federal Outlays:	3,955	4,620	5,380	6,300	7,300	8,460	9,785	11,370	13,180
<u>Skilled Nursing Facilities a/</u>	2,950	3,450	4,025	4,700	5,445	6,300	7,270	8,430	9,770
Medicare	355	410	475	565	645	720	785	870	980
Medicaid	2,520	2,950	3,440	4,000	4,640	5,385	6,250	7,280	8,460
VA	75	90	110	135	160	195	235	280	330
<u>Intermediate Care Facilities b/</u>	920	1,080	1,255	1,490	1,735	2,030	2,375	2,790	3,245
Medicaid	760	890	1,030	1,220	1,410	1,640	1,910	2,230	2,580
VA	160	190	225	270	325	390	465	560	665
<u>Personal Care Facilities c/</u>	85	90	100	110	120	130	140	150	165
VA	85	90	100	110	120	130	140	150	165

a/ Includes all facilities certified as SNFs for either medicare or medicaid.

b/ Includes all facilities certified as ICFs for medicaid, but not certified as SNFs for medicare or medicaid.

c/ Includes all facilities included in the National Center for Health Statistics' MFI that are not certified as skilled nursing facilities or intermediate care facilities for medicare or medicaid.

Effect of Option A on Spending for Institutional Care

Option A has no direct effect on payments for institutional services. The increased funding of home health care, however, may lead to a larger proportion of aged and disabled persons remaining at home in future years. The institutional population changes very slowly, however, and is not likely to be so strongly affected by Option A that a substantial reduction in institutional services would occur. Hence, no change in spending for institutional services was attributed to Option A.

Effect of Option B on Spending for Institutional Care

Option B would directly absorb most spending for nursing homes into a new federal long-term care program. All aged and disabled persons entitled to social security or supplemental security income benefits who need institutional care would be eligible. Many persons who are not now residents of nursing homes would be eligible for such care and could be expected to seek admission.

On the other hand, Option B would greatly expand other alternatives to institutional care. The anticipated rapid growth of sheltered living facilities and home health services under Option B should reduce the number of persons seeking institutional care. ^{56/} Further, the availability of realistic alternatives should lead to stricter decisions by utilization review committees and regulatory bodies. In the long run, a lower number of residents should reduce the number of new facilities constructed. Also, the availability of funding for alternate modes of care may lead many facilities to lower the level of care provided from skilled or intermediate care to personal care. It is noteworthy that the rate of increase in the number of days of skilled nursing care paid for through medicaid fell substantially after the intermediate care benefit began.

^{56/} A limited discussion of the available studies concerning the effect of the availability of alternative modes of care on the use of institutional facilities appears in Long-Term Care for the Elderly and Disabled, Congressional Budget Office, February 1977, Appendix C. Additional evidence is available from the experience of the medicare and medicaid programs.

Although no conclusive data is available, the weight of evidence appears to support the hypothesis that adequate funding of home care and sheltered living will reduce the rate of growth in the number of persons seeking institutional nursing care. 57/ Such changes take place slowly, however, so that only a relatively small reduction in the rate could be expected to occur in the period 1979-1985. Further, the absolute number of residents in all levels of nursing and sheltered facilities would still be expected to increase.

The estimates of the cost of Option B are prepared under the assumption that the non-demographic component of the rate of increase in new SNF and ICF facilities is reduced from 6.5 percent to 3.0 percent per year. 58/ The overall rate of increase in the number of residents is thus assumed to fall from an average of 7.5 percent per year to 4.6 percent. Personal care facilities, however, are assumed to increase at an annual rate that is 5 percent higher than that estimated to occur under present law. Part of this increase would result from the conversion of facilities currently certified as ICFs or SNFs. Under these assumptions, the total number of residents of nursing and personal care facilities is estimated to be 2.7 million in 1985, 7 percent less than projected under present law.

The average cost of care for residents who are supported under present law by the Veterans Administration, private or other funds is assumed to be unaffected by the proposal. The cost differential between publicly and privately funded SNF care, however, will be approximately cut in half over a three-and-a half year period after the beginning of the program in October 1978. 59/ This would raise

57/ The best parallels to this situation are found in the experience of medicare with extended care facility benefits, similar private insurance coverage, and the medicaid ICF benefit. The consensus of opinion among social security actuaries and those who set rates for group insurance policies is that the availability of skilled nursing facility care reduced the use of hospitals (although not by enough to pay for the skilled nursing facility care). The evidence from the medicaid program appears to show a substantial reduction in SNF use after the ICF benefit began as illustrated by the data cited previously.

58/ The demographic component would not be affected.

59/ This differential was assumed to be 20 percent for SNFs, 25 percent for ICFs, and 30 percent for PCFs in fiscal 1976, and to grow by 1.5 percent per year thereafter.

the cost of publicly supported facilities 25 percent by 1983. Further, the cost per day for all patients is assumed to increase at an annual rate 1.5 percent higher than the increase in average wages after fiscal 1982.

The cost per day under these assumptions is approximately 15 percent higher by 1985 than projected under present law. 60/ Total spending for nursing and personal care facilities is projected to be \$50.1 billion in fiscal 1985, only 3 percent higher than projected under present law. The small increase results primarily from the assumed lower rate of construction of new nursing homes and the assumed conversion of some SNFs and ICFs to personal care facilities. Table B-7 summarizes the projections of national spending for nursing and personal care facilities.

Table B-7 also summarizes outlays under federal programs and the federal share of the program costs. 61/ Outlays under the new long-term care program were estimated to include the following items, less the applicable copayments:

- o All spending for residents supported by public funds.
- o 85 percent of spending for private SNF and ICF patients. 62/
- o 50 percent of spending for current private ICF residents and all spending for the residents of new facilities assumed to be established or transferred from SNF or ICF status as a result of the proposal.

60/ The quality of care that could be furnished to persons currently supported by public funds would be substantially improved as a result of higher average spending per resident.

61/ The 85 percent factor allows for:

- o Coverage of 90 percent of residents supported primarily by private, Veterans Administration, or other funds.
- o Payment for 95 percent of the cost of care for these persons, after excluding outlays not reimbursed as necessary expenditures.

62/ Outlays are shown on a cash or actual payment basis. Payment is assumed to be two months after the date that services are provided.

TABLE B-7. SPENDING UNDER OPTION B FOR NURSING AND PERSONAL CARE FACILITIES, FISCAL YEARS 1979-1985, BY PRINCIPAL SOURCE OF PAYMENT: DOLLARS IN MILLIONS

	1979	1980	1981	1982	1983	1984	1985
<u>National Spending a/</u>	<u>20,040</u>	<u>23,930</u>	<u>28,280</u>	<u>33,240</u>	<u>38,070</u>	<u>43,720</u>	<u>50,070</u>
Medicare	580	690	790	880	960	1,070	1,200
Long-Term Care Program	17,730	21,220	25,150	29,650	33,980	39,030	44,670
Private or Other Funds	1,730	2,020	2,340	2,710	3,130	3,620	4,200
<u>Outlays Under Federal Programs b/</u>	<u>11,585</u>	<u>17,625</u>	<u>20,640</u>	<u>24,510</u>	<u>30,065</u>	<u>32,250</u>	<u>36,940</u>
Medicare	475	565	645	720	785	870	980
Long-Term Care Program	10,920	16,800	19,690	23,430	28,860	30,890	35,380
VA	190	260	305	360	420	490	580
<u>Federal Outlays b/</u>	<u>10,495</u>	<u>15,945</u>	<u>18,670</u>	<u>22,160</u>	<u>25,375</u>	<u>29,160</u>	<u>33,410</u>
Medicare	475	565	645	720	785	870	980
Long-Term Care Program	9,830	15,120	17,720	21,080	24,170	27,800	31,850
VA	190	260	305	360	420	490	580
Increase in Federal Outlays Due to Option B <u>b/</u>	5,115	9,645	11,370	13,700	15,590	17,790	20,220

a/ Incurred basis.

b/ Cash outlays, as used in federal budget accounts.

SPENDING FOR SHELTERED LIVING FACILITIES

Residents of Sheltered Living Facilities Receiving Long-Term Care

Sheltered living facilities provide an environment that enables persons who would have difficulty living independently to avoid or delay confinement in institutions. The facilities vary greatly in the degree of support provided to residents. At one extreme are simple apartments with access to special services for disabled persons. At the other extreme are facilities that resemble domiciliary homes, with common meals and personal services available on a routine basis. The facilities include congregate housing, foster homes, boarding homes with personal care furnished on a regular basis, as well as many other forms.

Long-term care in these facilities can be considered to be whatever support is required by residents that is not available in normal housing. Many residents are fully capable of living alone in ordinary housing, however, and have chosen to live in sheltered facilities for social reasons or in anticipation of declining health. ^{63/} Such persons cannot be considered recipients of long-term care services. Estimates of spending for long-term care must be limited to those persons who cannot live independently, or who can be maintained at home only at a substantially higher cost. ^{64/}

A more important question from the viewpoint of developing cost estimates is: which residents would qualify for payments under a long-term care program. Eligibility for payment for sheltered living facilities would depend on the physical condition and needs of residents. These in turn are likely to be designated in terms of specific physical dysfunctions, illnesses, disabilities, and inability to perform activities necessary for self-maintenance. Whether individual aged or disabled persons qualified under these criteria

^{63/} For example, many retirement communities offer congregate facilities. Many residents, while perhaps choosing the community in anticipation of future declining health, have no current need for these facilities.

^{64/} For a discussion of the comparative economies of institutional care and home care, see Greenberg, op. cit.

would have to be determined by trained medical personnel following procedures set forth in detailed regulations issued by an administering agency. The group of individuals found to be eligible would not be expected to coincide with those who presently reside in sheltered living facilities.

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Under the federal supplemental security income (SSI) program, which makes payments to eligible aged, blind, and disabled persons, states may supplement federal payments. Currently, 16 states make payments for residents of some sheltered living or personal care facilities. ^{65/} The number of recipients of supplemental payments and the cost of their care provide a basis for estimating the total number of persons in the U.S. who would be found to need sheltered living facilities under a national program.

The types of facilities eligible and the criteria that residents must meet to qualify for payment varies among the 16 states providing some form of supplement. Only those programs in California, New York, Michigan, Massachusetts, and Hawaii, which cover most forms of sheltered living and personal care facilities, however, can be used to

^{65/} The rigor of the procedures followed in these states to determine eligibility is not documented. Although the number of residents of facilities in these states is used as a basis of an estimate of "qualified" residents, an adjustment is introduced in the cost estimates to allow for more thorough and consistent administration in a national social insurance program. (For example, note the difference between the procedures used by the medicare and medicaid programs to determine persons eligible for SNF services.)

estimate the full cost of this type of care. In 1976, these states supported an average of 92,500 SSI recipients in facilities not certified as hospitals, skilled nursing facilities, or intermediate care facilities. 66/

Unfortunately, little data are available on the proportion of all residents of sheltered living and personal care facilities who are eligible for SSI payments and the proportion of these residents that are in the five states with comprehensive programs. With respect to the latter question, data from the MFI show that 35 percent of personal care homes and domiciliary homes are in these states. If the same proportion of residents of sheltered living facilities who could qualify under a long-term care program are in these states, there would be 265,000 qualified residents nationally.

A more tenuous assumption is required to estimate what proportion of the residents in these facilities are eligible for SSI. Approximately 10 percent of the aged and 30 percent of the disabled are eligible for SSI. 67/ A somewhat larger proportion of persons in sheltered living facilities should be eligible for SSI as a result of the higher average age of residents. The proportions of all aged and disabled eligible for SSI would appear to provide a lower bound for an estimate of the proportion of residents of sheltered living and personal care facilities who are both eligible for SSI and qualified to receive benefits under the long-term care program.

According to the NNHS, 40 percent of the residents of personal care facilities depend on assistance payments as their principal source of funds. The high average cost of personal care facilities, however, would suggest that the proportion of residents of sheltered living facilities relying on assistance payments would be lower.

66/ Social Security Bulletin data from the Office of Research and Statistics of the Social Security Administration. The figure includes residents of facilities not classified here as sheltered living facilities, such as state facilities for the physically handicapped, blind and deaf, and facilities for drug addicts, alcoholics, mentally disturbed, and mentally retarded (other than facilities certified as ICFs under the medicaid program).

67/ Data for the aged compiled from Table M-23 of the Social Security Bulletin.

Estimates were derived using a range of 25 percent to 50 percent. The numbers of persons in sheltered living facilities which would meet the specifications for Option B was then estimated to be:

All facilities	<u>500,000 to 1,060,000</u>
Personal care facilities	192,000
Facilities for physically handicapped	4,000
Homes for blind and deaf	22,000
Facilities for drug addicts and alcoholics	33,000
Homes for mentally disturbed	65,000
Homes for mentally retarded, not certified as ICFs	109,000
Other sheltered living facilities <u>68/</u>	75,000 to 635,000

Estimates of the number of qualified residents of sheltered living facilities were projected to years beyond 1976 at a rate equal to the sum of the increase in the number of "expected residents" or nursing homes and half of the increase in utilization. 69/ Table B-8 shows the resulting estimates of the number of residents.

68/ These estimates must be regarded only as very crude orders of magnitude. In addition to the uncertainties discussed in the text, it is not clear whether all the other types of institutions (assumed excluded from Option B) are included in the gross estimates for all facilities or whether it is practical to exclude them from a major long-term care program. More uncertainty is introduced by likely differences in procedures used to determine residents eligible under a national social insurance program from those used at the state level.

69/ The level of accuracy would not be materially improved by "high" and "low" rates of growth.

TABLE B-8. USE AND SPENDING FOR SHELTERED LIVING FACILITIES, FISCAL YEARS 1977-1985

	1977	1978	1979	1980	1981	1982	1983	1984	1985
<u>Low estimate:</u>									
Average residents (thousands)	78	83	86	91	95	100	105	110	115
Spending (millions)	\$300	\$330	\$370	\$415	\$465	\$520	\$585	\$650	\$730
<u>High estimate:</u>									
Average residents (thousands)	660	695	730	770	805	845	885	925	970
Spending (millions)	\$2490	\$2790	\$3130	\$3500	\$3930	\$4400	\$4920	\$5510	\$6170

Spending by Residents of Sheltered Living Facilities for Long-Term Care Under Present Law

The average cost of care in 1976 was estimated as follows:

Average monthly combined payment in five state SSI supplement programs 70/ \$ 231.60

Adjustments for (multiply by the following factors):

Lower average cost in other states 71/ 0.84
 Private income and social security 72/ 1.50
 Higher average cost of private facilities 73/ 1.10-1.15
 Exclusion of specialized facilities for drug addicts, etc. 74/ 0.83-0.92

Adjusted monthly payment 75/ \$266.43-\$308.74

70/ Data from the Office of Research and Statistics of the Social Security Administration.

71/ The average cost in facilities outside of the five states used as a basis for the cost estimate is assumed to be 75 percent of the cost in those states.

Footnotes 72, 73, 74, and 75 on page 78.

Since the estimates can at best reflect only the general order of magnitude of spending, projections were prepared on the basis of the average of high and low costs, \$288 per month. The cost per month was assumed to increase by 6.75 percent per year after fiscal 1976, the average of the rates of increase assumed for wages and prices. Table B-8 shows the resulting estimates of spending for these facilities.

Footnotes from page 77

72/ Based on an assumed average of \$100 of social security and other income counted in calculating SSI payments and supplements.

73/ Based on the assumption that the accommodations of private patients cost 20 percent more than those of SSI recipients. (Factor varies according to whether 50 percent or 75 percent are assumed to rely primarily on private funds.)

74/ Based on the assumption that the cost of specialized facilities is 20 percent higher. These relationships, applied to the average costs derived previously for SNFs and ICFs, produce estimates of \$239 and \$339 respectively.

75/ The Monroe County Study found the following relationships among daily costs of institutional long-term care in 1964:

Intensive nursing	\$18.64
Institutional nursing	15.21
Congregate housing	7.97

The Monroe County data was derived only from small samples of facilities which provided a uniform level of service meeting the quality standards set for that study. Such prototype facilities cannot be compared with the wide range of facilities certified as SNFs and ICFs. Similarly, the data for congregate housing excludes less expensive boarding house and foster care. The Monroe County data can be regarded as rough confirmation of the general level of the results obtained above. The wide margin of difference, however, is further indication of the limits on the accuracy that can be attributed to the estimates. Health Care of Aged Study, Part II; University of Rochester School of Medicine and Dentistry, 1968.

Spending for Sheltered Living Facilities Under Option B

Option B would be the first comprehensive program that would pay for the cost of congregate housing. This new federal program could change the pattern of living arrangements in the United States. Its impact could well be similar to the shift in patterns caused by the coverage of nursing home care under the medicaid program.

If all persons physically qualified for the program became residents of sheltered living facilities, program outlays would be as follows in fiscal years 1980 and 1985:

	<u>1976</u>	<u>1980</u>	<u>1985</u>
Average number qualified for sheltered living support (in thousands)	1510-1560	1620-2130	1750-2350
Average cost per month	\$288	\$391	\$595
Total cost of care (in millions)	\$5200-6700	\$7600-10,000	\$12,600-17,000
Copayments (in millions)	\$77	\$97	\$130
Average program outlays (in millions) <u>76/</u>	\$3700-4800	\$5600-7400	\$9600-13,000

A comparison of these estimates of the need or potential need for sheltered living facilities with the supply as projected under present law makes it evident that the outlays of the new long-term care program would initially be restricted by the number of facilities available. Further, not all persons whose physical condition meets the requirements of the program will necessarily seek such care. Many would prefer to remain in private housing. Moreover, not all of the residents currently projected under present law would meet the eligibility criteria. 77/

76/ Adjusted to cash outlay basis.

77/ See Appendix A of this report. These criteria were designed to be more restrictive than used in the five states which currently have programs supplementing SSI payments for residents of sheltered living facilities. That stricter standards would be used is an assumption that may or may not prove appropriate.

Time will be required to build new facilities or convert existing facilities to congregate housing. The change in living patterns from private to congregate living will probably also take some years to materialize. A substantial increase, however, can be expected in the growth rate of new construction and conversions. Further, it is reasonable to project these increases to be in proportion to the gap between the estimated supply and the need for these facilities. Hence, the growth rate of the supply of facilities is projected to be low under the low estimate of shortage in supply (i.e., high estimate of existing capacity and vice versa. The rate of increase in ICFs after the 1972 amendments to the Social Security Act and the growth rate of home health agency services since 1965 can be used as rough base for these estimates. Such projections are more of the nature of scenarios, however, than estimates.

These limitations as well as those mentioned earlier should be carefully considered, however, in any use made of the data for sheltered living facilities in this paper.

The following assumptions were used to obtain estimates of the cost of Option B:

<u>Assumption</u>	<u>Percentage Growth Under Low Projection</u>	<u>Percentage Growth Under High Projection</u>
1. Growth rate of new facilities:		
1980	10	10
1981	20	15
1982	30	20
1983	40	*
1984	40	*
1985	40	*

* same number of additional new facilities as in 1982.

2. Proportion of residents eligible:

Facilities projected under present law:	50	75
New facilities re- sulting from program:	100	100

3. Increase in the cost of facilities over that projected under present law

2 percent/year

2 percent/year

Table B-9 summarizes the cost projections under these assumptions. The reader is cautioned that these estimates are at best crude orders of magnitude, and not forecasts.

TABLE B-9. USE AND SPENDING FOR SHELTERED LIVING FACILITIES UNDER OPTION B, FISCAL YEARS 1979-1985

	1979	1980	1981	1982	1983	1984	1985
<u>National Use and Spending:</u>							
<u>Low Estimate:</u>							
Average Residents (thousands)	86	95	115	150	205	290	405
Spending (millions)	\$ 375	\$ 445	\$ 585	\$ 825	\$1,250	\$1,900	\$2,890
<u>High Estimate:</u>							
Average Residents (thousands)	735	805	925	1,115	1,300	1,485	1,670
Spending (millions)	\$3,160	\$3,780	\$4,740	\$6,185	\$7,860	\$9,760	\$11,930
<u>Reimbursed Through Long-Term Care Program:</u>							
<u>Low Estimate:</u>							
Average Beneficiaries (thousands)	43	50	67	99	155	235	350
Spending (millions)	\$ 110	\$ 165	\$ 235	\$ 385	\$ 650	\$1,090	\$1,745
<u>High Estimate:</u>							
Average Beneficiaries (thousands)	515	575	690	865	1,035	1,210	1,380
Spending (millions)	\$1,335	\$1,845	\$2,455	\$3,370	\$4,465	\$5,740	\$7,140
<u>Incremental Federal Outlays:</u>							
Low Estimate (millions)	\$ 100	\$ 150	\$ 210	\$ 345	\$ 585	\$ 980	\$1,570
High Estimate (millions)	1,200	1,660	2,210	3,030	4,020	5,170	6,430

HOME HEALTH SERVICES

Spending for home health services was estimated from the data submitted by home health agencies that participate in the medicare and medicaid programs. The data submitted to the Social Security Administration (SSA) to document the reasonable costs of services furnished were projected to fiscal 1976 from the most recent period for which audited cost reports were available. Because of the rapid rate of increase in spending for home health services and the uncertainties created by recent changes in medicare payment policies, alternate low and high rates of increase were adopted in projecting future spending for these services.

Use and Spending for Home Health Agency Services Under Present Law

The principal sources of data to estimate use and spending for home health services are the following:

- o Cost reports submitted to SSA by home health agencies participating in medicare to document the reasonable cost of services reimbursed.
- o Bills submitted to SSA as a basis for interim payments by medicare.
- o Inventories of personnel of home health agencies reported to SSA.
- o Data compiled by the Council of Home Health Agencies and Community Health Services as to the average cost per service.
- o Veterans Administration and medicaid program data.

The most reliable data on the total spending by home health agency services are the audited cost reports submitted by participating agencies to SSA. These reports document the full reasonable cost of all services furnished by the agencies as well as that portion of services paid by medicare. Unfortunately, a number of years are required to complete the processing of these reports, so that the most recent complete data are several years old. 78/ The rapid rate

78/ For example, only 695 cost reports have been processed for 1972, when 2,500 agencies were participating.

of growth in spending for these services makes use of old data inadvisable. Reasonable current estimates can be obtained, however, by multiplying the ratio of total reasonable costs to interim payments, for those agencies that have completed cost reports, by the total interim payments for bills submitted by all agencies for the same period. For recent years, this ratio has been as follows: 79/

	<u>1972</u>	<u>1973</u>	<u>1974</u>	<u>1975</u>
Number reporting agencies:	695	990	785	90
Reasonable costs of reporting agencies (thousands):	\$78,900	\$124,600	\$94,800	\$13,250
Interim payments to reporting agencies (thousands):	33,000	45,900	42,450	5,950
After adjustment for coinsurance change <u>80/</u> :	34,600	46,955	42,450	5,950
Ratio of interim medicare outlays to reasonable cost:	0.439	0.377	0.448	0.449

These ratios are biased by the following factors:

o Only 30 to 40 percent of participating home health agencies have reported for the years 1972-1974, and only 4 percent for 1975. The importance of the final settlements to an agency is in proportion to the relative number of medicare eligibles served. 81/ Thus, those agencies that provide a relatively large proportion of services to persons eligible for medicare can be expected to complete forms for final settlements earlier, biasing the ratios upward.

79/ Data compiled by the Office of the Actuary, SSA.

80/ The 1972 amendments eliminated the coinsurance on Part A services, effective in July 1973.

81/ Interim payment rates are set in a manner that assures that most final settlements with home health agencies will be positive. Otherwise, some agencies could have difficulty in finding cash for refunds.

o Regulations on the level of care were changed after the 1972 amendments in order to increase the proportion of services paid for through the program. The principal impact of these changes occurred after 1974.

Both of these biases tend to overstate the proportion paid for by medicare, so a ratio of 45 percent would appear to be a reasonable upper bound. The ratio for 1973 (40 percent) suggests that 35 percent might be a reasonable lower bound. Estimates prepared for fiscal 1976 follow:

	<u>Low Estimate</u>	<u>High Estimate</u>
Medicare payments to home health agencies, cash outlays <u>82/</u>	\$285 million	\$285 million
Interim payments by medicare, cash outlays <u>83/</u>	270 million	270 million
Interim payments by medicare, incurred basis <u>84/</u>	285 million	285 million
Proportion paid for by medicare	0.45	0.35
Reasonable cost of agencies participating in medicare	\$635 million	\$815 million
Spending in agencies not participating in medicare	30 million	110 million
Estimated spending incurred for home health agencies	665 million	925 million

82/ McKusick and Harris, *ibid.*

83/ Based on an estimated ratio of reasonable cost to interim payments of 1.055.

84/ Based on an assumption of an average lag in payment of two months.

Thus, spending for services of home health agencies was estimated to have been in the range of \$665 to \$925 million in fiscal 1976. The services provided were distributed as follows: 85/

Type of Service	<u>Visits 86/</u> (million)	<u>Low Estimate</u> <u>Cost/Visit 87/</u>	<u>Spending</u> (million)	<u>Visits 86/</u> (million)	<u>High Estimate</u> <u>Cost/Visit</u>	<u>Spending</u> (million)
Skilled nursing	28.2	\$17.87	\$504	32.1	\$21.85 <u>88/</u>	\$702
Physical therapy	3.6	17.45	62	4.1	21.35	86
Speech therapy	0.7	18.75	14	0.8	22.90	19
Medical social worker	1.1	21.65	24	1.3	26.50	33
Occupational therapist	0.8	18.35	14	0.8	22.50	19
Home health aide	8.7	5.40	47	9.9	6.65	66
All services	43.1	\$15.44	\$665	49.0	\$18.87	\$925

85/ Principal assumptions:

	<u>Low Estimate</u>	<u>High Estimate</u>
Increase in personnel, calendar 1974 to fiscal 1976 *	40 percent	60 percent
Visits per year by skilled personnel	1175	1175
Hours per year charged for home health aides	1410	1410
Increase in charges, calendar 1975 to fiscal 1976 +	5.5 percent	5.5 percent

* Visits reimbursed by medicare increased by 62 percent in this period.

+ The interim reimbursement per visit paid for by medicare increased by 11 percent in this period.

86/ The estimated visits were adjusted to reflect the agencies that obtain physical, speech, and occupational therapy through sub-contracts rather than furnishing these services directly. Additional adjustments were made for those associations which furnish only one service.

Footnotes 87 and 88 on page 86.

Spending for Home Health Agency Services
in Fiscal Years 1977-1985

Spending for home health services has been rising very rapidly since 1966, the year these services were first funded through the medicare and medicaid programs. Reimbursements through medicare have risen from \$60 million in calendar year 1968 to \$285 million in calendar year 1976, an average annual rate of increase of 21.5 percent. From 1972 to 1976, medicare outlays increased by 45 percent per year. This rapid recent growth in medicare outlays partly reflects changes in the proportion of services paid for by medicare as well as increases in total services. ^{89/} Spending through medicaid programs has also increased rapidly, from \$8 million in calendar year 1968 to \$112 million in calendar year 1975. Since 1972 the average rate of increase has been 66 percent per year. Again, changes in the state programs appear to have been the cause of a major part of these increases, but not all of them.

Footnotes from page 85

^{87/} Based on assumption that the average cost per visit for all agencies was 5.5 percent lower than for those who report to the Council of Home Health Agencies and Community Health Services.

^{88/} Based on assumption that the average cost for a nursing visit was the same as for the medicare program. (See McKusick and Harris, *ibid.*)

^{89/} For example, the agencies that have filed final cost reports with SSA show that the proportion of services for medicare recipients has increased only moderately during 1972-1975, as follows:

	<u>1972</u>	<u>1973</u>	<u>1974</u>	<u>1975</u>
(percent)	44	38	45	45

Thus the rate of total spending must be increasing at a rate only moderately below that for medicare payments.

Projecting spending for home health agency services raises the question of how long such a rapid rate of growth can be sustained. If the recent rates of increase are compounded through fiscal year 1985, spending for these services would increase by 35 times, to \$23 to \$33 billion. This would appear to be an unlikely prospect, and demonstrates that caution and judgment must be incorporated into any projection of spending for home health agency services.

A number of factors would appear to have contributed to the past increase in spending for home health agency services. The most important of these are: (1) the rising proportion of aged in the population; (2) the increasing tendency of older Americans to live alone; (3) a movement by many community hospitals and some Blue Cross plans in the direction of providing home nursing care, in order to make earlier discharge of certain patients feasible; and (4) the funding available from the medicare and medicaid programs.

These also appear to be major factors leading to the growth in the utilization of nursing homes. The overall rate of increase, however, was lower than that for home health agency services. This indicates that other factors must be found to explain the particularly rapid rate of increase in home health services. It may be that the demand for home health services is very large compared to the services available, and that many who want help and are able to pay for it are not being served. The rapid rate of increase could be an adjustment process through which the supply of services expands in response to an excess demand toward an equilibrium. In this case, one would expect the supply to continue to increase as long as it is profitable to the suppliers. Alternatively, while many might theoretically need home health services, this need may not have been translated into excess demand because they have no money with which to purchase services. In this case, supply would not continue to expand unless a supplemental source of funding were available, and then it would increase only at the rate at which funds became available. In either case, institutional constraints such as the availability of personnel, the needs of sponsoring hospitals for working capital, and state licensing requirements may have restrained and may continue to restrain the growth in the supply of home health services.

Unfortunately, there is insufficient data to determine whether the rate of expansion of the supply of services is an adjustment to excess demand, perhaps restrained by institutional factors, or whether it is determined by the growth in funds available to pay for cost sharing and services not covered by medicare and medicaid. The

assumption of an excess potential demand and a rapidly growing actual demand appears to be the most reasonable explanation for the rapid growth in home health services. The rate of growth of these services is also probably determined by supply factors. The projections in this paper are based on the assumption that the past and expected rate of growth is determined both by institutional factors limiting the rate of growth and the increase in the supply of new funds to pay for services not paid for by medicare, medicaid, and private insurance.

The "present law" projections of services in 1977-1985 are based on a continuation of the estimated underlying pattern of growth and exclude that part of recent growth attributed to program changes. ^{90/} The rate of growth is assumed to be higher than this trend through 1979, however, as a result of a continuing response to changes in the medicare and medicaid programs prior to fiscal 1977. Due to the degree of uncertainty with respect to the relative role of these factors in past increases, alternative high and low growth rates were adopted.

The assumptions used to project the annual rate of growth of home health agency services are as follows:

	<u>Low Estimate</u> (percent)	<u>High Estimate</u> (percent)
Cost per service:	7.5 ^{91/}	9.5 ^{92/}
Growth in services:		
Fiscal 1976-1977	20	25
1977-1978	15	20
1978-1979	10	17.5
After 1979	7.5	17.5

^{90/} Regulations have the force of law and hence the "present law" projections are based on the assumption that regulations are not significantly changed during the projection period.

^{91/} Based on the assumption that a higher rate of increase in personnel costs for home health agencies will be offset by a more rapid rate of increase in the services of less skilled personnel.

^{92/} Based on the assumption that the skill mix in agency personnel will not change substantially.

Table B-10 shows the resulting estimates of spending for these services in fiscal years 1977-1985. It is hoped, but not certain, that the actual growth in services will fall within these ranges.

The services paid for by the Medicare and Medicaid programs were estimated to increase as follows:

Period	Medicare		Medicaid	
	Low Estimate (percent)	High Estimate (percent)	Low Estimate (percent)	High Estimate (percent)
Fiscal 1976-1977	12.5	25	15	30
1977-1978	10	20	12.5	25
1978-1979	7.5	17.5	10	20
1979-1980	5	15	10	20
1980-1981	5	12.5	10	20
After 1981	5	10	10	20

The cost per service in these programs was assumed to increase at the same rate as that of all services. Similar assumptions were used to project spending by the Veterans Administration for home health agency services.

Potential Demand for Home Health Agency Services

The most detailed data available on the need for home health services were compiled for the Minneapolis region. ^{93/} This study specified three levels of need as follows:

"Home health group" - Persons needing "intensive care as a result of functional or mobility problems" (estimated to constitute 1 to 3 percent of the aged).

"Homemaker group" - Persons who can take care of themselves in most ways but who need assistance to get out and need "regular, moderate aid" (estimated at 7 to 12 percent of the aged).

"Chore group" - Persons who need assistance in housekeeping and home maintenance and repairs, but not nursing or personal care services (estimated to be 20 percent of the aged).

^{93/} Jay Greenberg, "The Costs of In Home Services," in Nancy Anderson, A Planning Study of Services to Noninstitutionalized Older Persons in Minnesota, Governor's Council on Aging, State of Minnesota, Minneapolis, Minnesota, 1974.

TABLE B-10. ESTIMATED SPENDING FOR HOME HEALTH AGENCY SERVICES, FISCAL YEARS 1977-1985
 UNDER PRESENT LAW: DOLLARS IN MILLIONS

	1977	1978	1979	1980	1981	1982	1983	1984	1985
<u>National Spending:</u>									
Low Estimate	925	1,140	1,350	1,560	1,810	2,090	2,410	2,790	3,220
High Estimate	1,330	1,710	2,160	2,710	3,410	4,300	5,400	6,800	8,560
<u>Outlays Under Federal Programs:</u>									
<u>Low Estimate:</u>	<u>511</u>	<u>612</u>	<u>718</u>	<u>820</u>	<u>952</u>	<u>1,099</u>	<u>1,267</u>	<u>1,466</u>	<u>1,695</u>
Medicare	360	430	500	570	650	745	850	975	1,110
Medicaid	145	175	210	240	290	340	400	470	560
VA	6	7	8	10	12	14	17	21	25
<u>High Estimate:</u>	<u>582</u>	<u>769</u>	<u>997</u>	<u>1,255</u>	<u>1,580</u>	<u>1,956</u>	<u>2,445</u>	<u>3,055</u>	<u>3,810</u>
Medicare	400	525	675	840	1,030	1,230	1,480	1,780	2,140
Medicaid	175	235	310	400	530	700	930	1,230	1,610
VA	7	9	12	15	20	26	35	45	60
<u>Federal Outlays:</u>									
<u>Low Estimate:</u>	<u>446</u>	<u>537</u>	<u>628</u>	<u>720</u>	<u>822</u>	<u>949</u>	<u>1,087</u>	<u>1,256</u>	<u>1,445</u>
Medicare	360	430	500	570	650	745	850	975	1,110
Medicaid	80	100	120	140	160	190	220	260	310
VA	6	7	8	10	12	14	17	21	25
<u>High Estimate:</u>	<u>507</u>	<u>694</u>	<u>857</u>	<u>1,080</u>	<u>1,350</u>	<u>1,646</u>	<u>2,035</u>	<u>2,515</u>	<u>3,100</u>
Medicare	400	525	675	840	1,030	1,230	1,480	1,780	2,140
Medicaid	100	160	170	220	300	390	520	690	900
VA	7	9	12	15	20	26	35	45	60

For each group the level of assistance needed was assessed as follows (in hours of service per week):

	<u>Home Health</u> <u>Group</u>	<u>Homemaker</u> <u>Group</u>	<u>Chore</u> <u>Group</u>	<u>Weight</u> <u>94/</u>
Skilled nursing	2.0	0	0	1.00
Personal care	10.0	4.0	0	.30
Home management	2.0	1.0	0	1.05
Housekeeping	4.0	4.0	2.0	.30
Home maintenance	0.5	0.5	0.5	.30
Total	<u>18.5</u>	<u>9.5</u>	<u>2.5</u>	
Weighted Total	8.5	3.6	0.8	

Thus the 1 to 3 percent of the noninstitutional population needing "intensive care as a result of functional or mobility problems" was estimated to need 18.5 hours of care per week, which would cost as much as 8.5 hours of nursing care. 95/ Similarly, the "homemaker group" requiring personal care and homemaker services to live independently were found to need 9.5 hours of care per week, which would cost as much as 3.6 hours of nursing care.

These estimates provide the basis for an order-of-magnitude estimate of the potential cost of home health services under Option B. Not all services found to be needed according to the criteria used in the Minneapolis region survey, however, would qualify for reimbursement. The level of care requirements would exclude some of the therapy, personal care, and homemaker services needed. The proportions of services assumed to qualify for payment were: 96/

94/ Ratio of cost per service as reported by the Council of Home Health Agencies and Community Health Agencies.

95/ A visit by a skilled nurse or other skilled practitioner is assumed to be equivalent to an hour of nursing time.

96/ See the policy assumptions in Appendix A for the level of care assumed to be equivalent to an hour of nursing time.

	<u>Intensive Need (Percentage)</u>	<u>Intermediate Need (Percentage)</u>
Skilled nursing	100	100
Physical therapy	100	90-100
Speech therapy	100	90-100
Occupational therapy	90-100	75-90
Personal care	90-100	75-90
Home management	90-100	65-75
Housekeeping	90-100	65-75
Home maintenance	0	0

Under these assumptions, the potential outlays under Option B for home health services (if an adequate supply of services were available and fully utilized) were estimated as follows:

	<u>1976</u>	<u>1980</u>	<u>1985</u>
Average number qualified for intensive home services (thousands) <u>97/</u>	240-700	250-760	280-820
Average number qualified for intermediate home services (thousands) <u>97/</u>	2,750-3,650	3,000-4,000	3,230-4,330
Average qualified units per week	3.0-3.5	3.0-3.5	3.0-3.5
Average cost of nursing visit	\$17.85-21.85	\$24.30-32.10	\$34.90-50.60
Services needed (millions)	\$7,800 to \$16,400	\$11,300 to \$26,000	\$16,000 to \$42,000
Proportion paid by program	0.82-0.88	0.83-0.89	0.84-0.91
Program outlays (millions) <u>98/</u>	\$6,250-14,000	\$9,100-22,300	\$13,200-37,000

97/ Residents in personal care facilities were not assumed to need personal care, home management, or homemaker services.

98/ Total spending for home health services would exceed outlays under Option B due to cost-sharing, the lag in payment, and services not eligible for reimbursement (as a result of eligibility determinations, the level of care requirements, the definition of covered services.)

A similar analysis using the specifications for coverage in Option A leads to the following estimates of spending for home health agency services that would be paid for through the medicare and medicaid programs:

	<u>1976</u>	<u>1980</u>	<u>1985</u>
Average units needed per week	1.0-1.5	1.0-1.5	1.0-1.5
Services needed (millions)	\$2600-7000	\$3800-11,000	\$5400-18,200
Proportion of covered services paid	0.95 percent	0.96 percent	0.97 percent
Program outlays (millions)	\$2400-6600	\$3500-10,500	\$5000-17,000

Spending for Home Health Services Under Option A

Option A expands the coverage of home health services in the medicare program to include homemaker and rehabilitative therapy services in their own right rather than as incidental to skilled services. The condition of the patient required for services to be reimbursed is also liberalized.

State medicaid programs would be required to include all services covered by medicare. In addition, counseling by medical social workers would be a covered service and the condition of the patient required for homemaker services would be liberalized further, to include any terminally ill patient for whom homemaker services would delay the need for institutional care. Funds to pay the full cost of services needed by low income disabled and aged would thus be available throughout the country.

Option A would make most of the home health services needed by the "intensive" need group eligible for reimbursement through medicare and medicaid, and a large proportion of those needed by low income persons in the "intermediate" need group eligible for payment through medicaid. Funding would be available, however, to pay for far more health services than could be supplied by the personnel projected to be available in 1979, the first year of the program.

As discussed in the previous section, if an adequate supply of home health personnel were available and utilized, spending under the program would be on the order of \$3 to \$10 billion, and the supply of services substantially higher than this. The total supply projected to be available would be \$1 to \$2 billion. Thus, the increase in national spending and federal outlays for home health services under Option A would be determined primarily by the rate of expansion of the supply of services available during the first years of the program. The assumptions used to project national spending and federal outlays under Option A are summarized below.

	<u>Low Estimate</u> <u>(Percentage)</u>	<u>High Estimate</u> <u>(Percentage)</u>
o National Spending for Home Health Agency Services:		
Increase in cost per service <u>99/</u>	7.5	9.5
Increase in services provided:		
1977-1978	15.0	20.0
1978-1979	17.5	25.0
After 1979 <u>100/</u>	20.0	30.0
o Proportion of services projected to exist under present law assumed to qualify for reimbursement by the medicare and medicaid programs under Option A:		

99/ These assumptions are the same as those used in the projections of spending under present law. It is assumed that a more rapid increase in the number of nonskilled personnel, which tends to lower the average cost per visit, is offset by a higher rate of increase in wages and fringe benefits paid to personnel as a result of the increased demand for their services.

100/ These rates are assumed until the services furnished exceed the potential demand calculated earlier. Thereafter, rates of increase are assumed to fall to those used in the projections under present law.

	<u>Medicare 101/</u>	<u>Medicaid 102/</u>	<u>Total</u>
Skilled nursing	0.75	0.15	0.90
Physical therapy	0.65	0.10	0.75
Speech therapy	0.65	0.10	0.75
Medical social services	0.20	0.33	0.53
Occupational therapy	0.30	0.33	0.63
Home health aides	0.30	0.33	0.63
All services	<u>0.68</u>	<u>0.17</u>	<u>0.85</u>

- o Proportion of new services induced by Option A assumed to qualify for reimbursement by the medicare and medicaid programs:

	<u>Medicare</u>	<u>Medicaid</u>	<u>Total</u>
1979	0.730	0.230	0.960
1980	0.720	0.235	0.955
1981	0.710	0.240	0.950
1985	0.670	0.260	0.930

Table B-11 summarizes the projections of national spending and of Option A outlays under federal programs. These projections reflect all the uncertainties inherent in the information available, especially with respect to the effect of providing new funds based on the rate of increase in the supply of services. They must therefore be regarded as plausible scenarios rather than projections or forecasts. It is hoped that they will indicate the rough order of magnitude of the cost of a federal program implementing the objectives of Option A, and serve as a caution that much further research may be necessary to determine accurately the cost of such new initiatives in long-term care. 103/

101/ Includes the proportion of the cost of services not paid by medicare due to cost sharing.

102/ Excludes cost sharing paid under medicaid for services covered by medicare.

Footnote 103 on page 97.

TABLE B-11. ESTIMATED SPENDING FOR HOME HEALTH AGENCY SERVICES UNDER OPTION A, FISCAL YEARS 1977-1985: DOLLARS IN MILLIONS

	1977	1978	1979	1980	1981	1982	1983	1984	1985
National Spending:									
Low Estimate	925	1,170	1,510	1,950	2,510	3,240	4,170	4,890	5,650
High Estimate	1,330	1,750	2,390	3,400	4,850	6,900	9,820	13,840	17,800
Outlays Under Federal Programs:									
Low Estimate:	511	637	1,157	1,645	2,126	2,757	3,548	4,460	4,753
Medicare	360	450	900	1,280	1,680	2,180	2,770	3,550	3,700
Medicaid	145	180	250	360	440	570	770	900	1,040
VA	6	7	7	5	6	7	8	10	13
High Estimate:	582	799	1,757	2,828	4,070	5,843	8,328	11,683	14,870
Medicare	400	550	1,360	2,240	3,220	4,600	6,520	9,220	11,700
Medicaid	175	240	390	580	840	1,230	1,790	2,440	3,140
VA	7	9	7	8	10	13	18	23	30
Federal Outlays:									
Low Estimate:	446	557	1,047	1,505	1,936	2,507	3,208	4,060	4,293
Medicare	360	450	900	1,300	1,680	2,180	2,770	3,550	3,700
Medicaid	80	100	140	200	250	320	430	500	580
VA	6	7	7	5	6	7	8	10	13
High Estimate:	507	689	1,587	2,573	3,700	5,302	7,538	10,613	13,470
Medicare	400	550	1,360	2,240	3,220	4,600	6,520	9,220	11,680
Medicaid	100	130	220	325	470	689	1,000	1,370	1,760
VA	7	9	7	8	10	13	18	23	30

The low estimate assumes that the rate of increase in home health services experienced since 1966 is sustained through 1983, when the supply of services would approach the low estimate of the projected need. The high estimate assumes that the rate of increase experienced since 1972 is maintained through 1984 when the supply of services would reach the high estimate of the projected need.

Spending for Home Health Services Under Option B

Option B would cover nearly all home health services presently provided to elderly or disabled persons eligible for social security or supplemental security income. Most skilled, personal care, and homemaker services would be covered if provided to persons who qualify for benefits on the basis of their physical condition.

As noted earlier, Option B would create a potential demand for services that is many times greater than the services projected to be available. The increase in national spending and federal outlays for home health services under Option B would thus depend primarily on the rate of expansion of the services available. The assumptions used to project the cost of Option B are summarized below.

Footnote from page 95:

103/ These projections also indicate the need for expanded data collection and research on (1) the need and potential demand for home health services; (2) the effect of administrative mechanisms set up to determine the needs of specific beneficiaries; (3) the causes of the rapid increases in spending for these services; (4) the effect of making more funds available on the rate of growth in the supply of services; (5) the substitution of home health services for sheltered living or institutional care; and (6) the effect of different modes of organization of services on the level and effectiveness of care provided.

	<u>Low Estimate</u> <u>(Percentage)</u>	<u>High Estimate</u> <u>(Percentage)</u>
o National Spending for Home Health Agency Services:		
Increase in cost per service	7.5	9.5
Increase in services provided		
1977-1978	17.5	25.0
1978-1979	22.5	30.0
1979-1980	25.0	35.0
After 1980	25.0	40.0

- o Proportion of services projected to exist under present law which qualify for reimbursement under Option B: 104/

	<u>Low Estimate</u>	<u>High Estimate</u>
Skilled nursing	0.90	0.95
Physical therapy	0.85	0.90
Speech therapy	0.85	0.90
Medical social services	0.75	0.85
Occupational therapy	0.85	0.90
Home health aides	0.80	0.90
All services	<u>0.89</u>	<u>0.94</u>

- o Proportion of new services induced by Option B assumed to qualify for reimbursement: 105/

	<u>Low Estimate</u>	<u>High Estimate</u>
1980	0.95	0.99
1981	0.94	0.98
1982	0.94	0.97
1985	0.90	0.94

104/ The low estimates are based on the assumption that 10 percent of home health agency services under present law are provided to persons who are not eligible for medicare or medicaid; the high estimates assumed 5 percent.

105/ Includes the proportion of services paid for through the medicare program, and that not paid because of cost sharing.

Table B-12 summarizes the projections of national spending and of outlays under federal programs. As in the case of the projections prepared for spending under Option A, it is hoped only to indicate the gross order of magnitude of a new federal program implementing the objectives of Option B. The principal conclusion that should be drawn from these projections is that the cost of such a program is likely to be very large and that much further research is needed before its implications can be assessed accurately.

The low estimate is based on the assumption that spending for home health services will increase at a rate equal to the lower estimate of the increase that has taken place since 1972. The high estimate is based on the assumption that the rate of increase will be at the highest level estimated to have occurred. In neither projection does the supply of services reach the level of estimated potential demand. Thus, the program is not expected to be stable by 1985.

TABLE B-12. ESTIMATED SPENDING FOR HOME HEALTH AGENCY SERVICES UNDER OPTION B, FISCAL YEARS 1977-1985: DOLLARS IN MILLIONS

	1977	1978	1979	1980	1981	1982	1983	1984	1985
<u>National Spending:</u>									
Low Estimate	925	1,200	1,600	2,160	2,900	3,890	5,220	7,020	9,440
High Estimate	1,330	1,820	2,590	3,830	5,870	9,000	13,800	21,160	32,430
<u>Outlays Under Federal Programs:</u>									
Low Estimate:	511	637	1,111	1,711	2,313	3,118	4,222	5,626	7,632
Medicare	360	450	900	1,300	1,680	2,160	2,770	3,550	3,700
Medicaid	145	180	50	10	12	17	20	24	29
New program	--	--	160	400	620	940	1,430	2,050	3,900
VA	6	7	1	1	1	1	2	2	3
High Estimate:	582	799	2,132	3,123	4,829	7,440	11,452	17,669	27,142
Medicare	400	550	1,360	2,240	3,220	4,600	6,520	9,220	11,700
Medicaid	175	240	80	20	25	35	45	60	80
New program	--	--	690	860	1,580	2,800	4,880	8,380	15,350
VA	7	9	2	3	4	5	7	9	12
<u>Federal Outlays:</u>									
Low Estimate:	446	562	1,090	1,667	2,245	3,016	4,070	5,410	7,229
Medicare	360	450	900	1,300	1,680	2,160	2,770	3,550	3,700
Medicaid	80	105	45	6	7	10	11	13	16
New program	--	--	144	360	557	845	1,287	1,845	3,510
VA	6	7	1	1	1	1	2	2	3
High Estimate:	507	724	2,052	3,029	4,660	7,145	10,945	16,805	25,592
Medicare	400	550	1,360	2,240	3,220	4,600	6,520	9,220	11,700
Medicaid	100	165	70	11	14	20	25	34	45
New program	--	--	620	775	1,422	2,520	4,393	7,542	13,815
VA	7	9	2	3	4	5	7	9	12