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ABSTRACT

This report summarizes existing data on persons with disabilities in narrative and tabular form. The first section considers definition and measurement of disability including such topics as activity limitation, functional limitation, special population groups and measures, chronic conditions, work disability, federal benefit programs, and state level data. Interpretations and limitations of the data are briefly identified next. The third section presents information on prevalence and characteristics of persons with disabilities. Discussion and statistics are presented for such areas as general measures of disability, disability status of special population groups, and disability and health care status. Work disability is specifically addressed in the fourth section, which provides information on characteristics of persons with a work disability, labor force participation, health insurance coverage, and occupational injuries and illnesses. The section on disability in long-term care facilities considers nursing home residents, mental health facilities and organizations, and facilities for the mentally retarded. The last chapter covers federal benefit programs including special education, Social Security Disability Insurance, Supplemental Security Income, state vocational rehabilitation programs, and disabled veterans. Forty-five detailed tables complete the report. A summary of the Americans with Disabilities Act is appended. (105 reference notes) (DB)

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# DIGEST OF DATA ON PERSONS WITH DISABILITIES 1992

National Institute on Disability  
and Rehabilitation Research

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By design, this document draws from many sources of published data and narrative explanations issued by federal statistical agencies and other sources on the subject of disability. Many authors of these publications gave freely of their time to help identify the most relevant information for the *Digest*, and this document benefits immeasurably from the support of these individuals. In particular, Gerry Hendershot, John Gary Collins, Peter Ries, and Joan Van Nostrand of the National Center for Health Statistics helped select from among the myriad of National Health Interview Survey and National Nursing Home Survey data and reconcile the variations in disability measures these and other sources provide. John McNeil of the U.S. Census Bureau assembled the latest published statistics from the Survey of Income and Program Participation and the Current Population Survey, covering many aspects of disability, especially related to work. Conceptual guidance, data, and the benefit of review were provided by Mitchell LaPlante, who directs the disability statistics program at the University of California, San Francisco. The references for the introduction, tables, and the highlights and explanatory notes accompanying each table are further acknowledgement of the considerable contribution made by the many researchers and writers in the field of disability statistics. Charlene Cloey, Sharon Jones, and Jaci Weller worked diligently, devoting many hours to the preparation of the manuscript. Finally, Sean Sweeney, the project officer from the National Institute on Disability and Rehabilitation Research (NIDRR), provided the initiative and guidance essential for the development of this publication. Following Department of Education specifications for this document, three previous NIDRR publications served as format models. These were the 1984 version of the *Digest* by the same title, *Data on Disability from the National Health Interview Survey, 1983-1985*, and the *Chartbook on Disability in the United States*.<sup>1</sup>

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<sup>1</sup>Mathematica Policy Research, *Digest of Data on Persons with Disabilities* (U.S. Department of Education, 1984); LaPlante, Mitchell P., *Data on Disability from the National Health Interview Survey, 1983-1985*. An InfoUse Report (National Institute on Disability and Rehabilitation Research, 1988); Kraus, Lewis E. and Stoddard, Susan, *Chartbook on Disability in the United States*. An InfoUse Report (National Institute on Disability and Rehabilitation Research, 1989).

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## INTRODUCTION

According to the National Center for Health Statistics, over 34 million Americans, more than 14 percent of the civilian non-institutionalized population, are limited in their activity due to long-term disability.<sup>1</sup> Approximately 2 million more persons live in a variety of long-term care institutional settings, including 1.5 million in nursing and related-care homes<sup>2</sup> and nearly a quarter million, each, in mental health<sup>3</sup> and mental retardation facilities.<sup>4</sup> These figures, however, only begin to convey information about the number and condition of persons with disabilities, given the myriad, often conflicting, array of information available on this segment of the population.

To put these figures in perspective, the *Digest* presents data from a variety of sources as an introductory reference on the definition, measurement, prevalence, and characteristics of persons with disabilities in the United States. The purpose of this report is to foster a conceptual understanding of this complex subject and present information in tables and accompanying narrative which describe various aspects of disability. While the main purpose of the *Digest* is the direct presentation of statistical information, narrative accompaniment provides assistance in data interpretation. To ensure objectivity, this publication contains only data and explanations issued by federal statistical agencies, unless otherwise noted.

The *Digest* consists of an introductory section which first presents definitions and measures of disability, then summarizes prevalence figures according to the various national surveys and federal programs serving persons with disabilities. This is followed by a series of tables, with accompanying highlights and explanatory notes on the data, providing detailed information in this regard. A references section at the end of this introduction lists sources for securing additional information on the subject of disability.

### Definition and Measurement of Disability

The World Health Organization defines disability as "any restriction or lack (resulting from an impairment) of ability to perform an activity in the manner, or in the range, considered normal."<sup>5</sup> This means that, apart from its underlying origins and ultimate effects, disability is a limitation in life activities, such as working and living independently, caused by impairments or other chronic conditions, such as blindness or arthritis. Disability involves many areas of functioning, such as physical (e.g., walking), emotional (e.g., personal relationships), and mental (e.g., problem solving).<sup>6</sup> Although acute conditions, those of a short duration, do cause disabilities, the existing literature on this subject focuses almost exclusively on limitations related to long term, or chronic conditions. Accordingly, the terminology, definitions, and data in this publication do so as well, unless otherwise stated. The rationale is that acute conditions, while having an immediate effect, do not usually require prolonged behavioral or social adaptations.<sup>7</sup>

Although there is considerable agreement on the meaning of chronic conditions, such as the International Classification of Diseases, ninth revision (ICD-9)<sup>8</sup>, there is wide variation on how best to describe and measure the disabling effects these conditions have on individuals.<sup>9</sup> In a digest of data, a definition of disability is most useful if it can be quantified and related to the accompanying prevalence statistics. Realistically, a single meaning and measure of disability cannot fit the range of data from the multiple surveys and other sources this report includes.

While the terminology and measures, below, show that definitional complexities and inconsistencies do exist, they also illustrate the multi-dimensional nature of disability and the corresponding need for separate statistics on the various types of limitation.<sup>10</sup> For example, a person with no limitation in the ability to work may nonetheless be limited in performing activities of daily living at home, such as dressing and bathing.<sup>11</sup> The subject of disability has many facets, and for this reason the readers should select particular tables for reference based on their specific information requirements. A major objective of this publication, therefore, is to present a broad perspective and assist in selecting from among the various sources of information.

Definitional differences aside, the focus of many disability studies is on describing the various types of limitations which are caused by chronic health conditions, as opposed to the conditions themselves. Rather than treating disability as a disorder in need of correction, this approach considers the functional capacity and needs of the individuals involved. This non-medical perspective on disability has gained wide acceptance in the professional community, notwithstanding the clear benefits of treatment, health promotion, disease prevention, and the use of such technology as medical device implants and assistive devices.

An emphasis on limitation in specific activities such as eating or walking, in conjunction with the chronic health conditions involved, also helps decision makers and others use data to identify service requirements and other forms of intervention which could help address the needs of persons with disabilities.<sup>12</sup> Indeed, the entire *Independent Living* movement, which has significantly influenced public policy in this regard, focuses on ways to enable persons with disabilities to fully participate all aspects of society, through rehabilitation training, appropriate services, and the elimination of physical and attitudinal barriers.<sup>13</sup>

As summarized in the Appendix, the *Americans with Disabilities Act* is another example of this focus on functioning and the participation of persons with limitations in the mainstream of society. In this regard, the law requires reasonable accommodation by employers; access to public and private services such as transportation, telecommunications, restaurants, motels, and shopping establishments; and discourages discrimination against persons with disabilities.

Yet the individual chronic conditions which cause disability are of genuine interest to the reader, given that services and products, such as those for the visually impaired, are often designed specifically for them. This is especially true for physical versus mental health conditions. For this reason, the prevalence of specific chronic health conditions is presented in many of the tables, along with the nature and severity of the limitations they cause. However, chronic conditions, alone, are not good measures of disability because many produce little if any limitation.

**Activity Limitation**

The National Center for Health Statistics (NCHS), from which this *Digest* draws most of its information, uses the concept of *activity limitation* to measure disability, which it defines as "long-term reduction in activity resulting from chronic disease or impairment."<sup>14</sup> In its annual National Health Interview Survey (NHIS), NCHS describes a limitation in terms of the *major activity* it considers usual for one's age group: 1) ordinary play for children under 5 years of age, 2) attending school for those 5-17 years of age, 3) working or keeping house for persons 18-69 years of age, and 4) capacity for independent living (e.g., the ability to bathe, shop, dress, eat, and otherwise care for oneself without the assistance of another person) for persons after age 69.<sup>15</sup> NCHS determines the severity of the disability

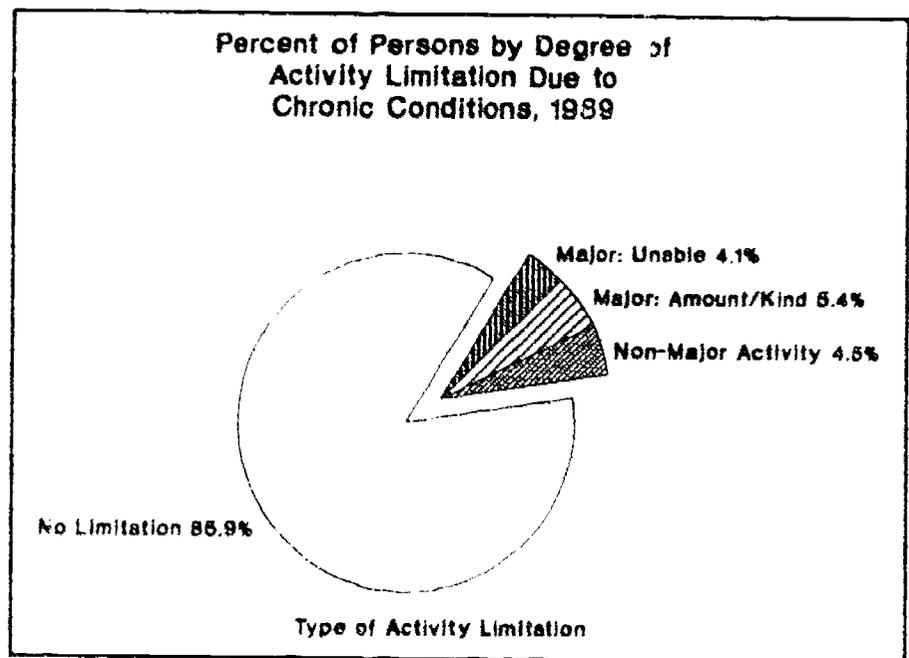


Figure 1

Source: National Center for Health Statistics, 1989 National Health Interview Survey. *Vital and Health Statistics*, Series 10, No. 176, Table 68.

by asking respondents whether they are 1) unable to perform their major activity, or, if they can, whether they are 2) limited in the amount or kind of major activity, the former defined as severe.

If persons are not limited in their major activity, NCHS asks if they are limited in other ways, which it also calls *non-major* or *outside* activity. Normally, non-major activities are less challenging than major ones, and these other activities include social, civic or recreational endeavors. However, for those 18-69 years of age who keep house, and persons 70 years of age and over, measures of outside activity also include the ability to work, reversing the relative challenge of major and outside activity, especially for those 70 years of age and over. This issue is important in understanding the tables of NCHS activity limitation figures for various age groups.

Using this definitional schema, NCHS estimates that 14.1 percent of the U.S. population have an *activity limitation*, as Figure 1, above, shows. This includes 4.1 percent who are unable to carry on their major activity at all, 5.4 percent who are limited in the amount or kind of major activity, and 4.5 percent who are limited but not in their major activity (the total figure is affected by rounding).

### Functional Limitation

The Census Bureau provides another measure of disability through the 1984 Survey of Income and Program Participation (SIPP).<sup>16</sup> This study of non-institutionalized persons 15 years of age and older collected information about a person's ability to perform nine sensory and physical activities, including:

1. seeing words and letters in ordinary newspaper print even when wearing glasses or contact lenses;
2. hearing what is said in a normal conversation;
3. having speech understood;
4. lifting and carrying a full bag of groceries (10 lbs.);
5. walking three city blocks (1/4 mile);
6. walking up a flight of stairs without resting;
7. getting around outside the house by yourself;
8. getting around inside the house by yourself; and
9. getting into and out of bed by yourself.

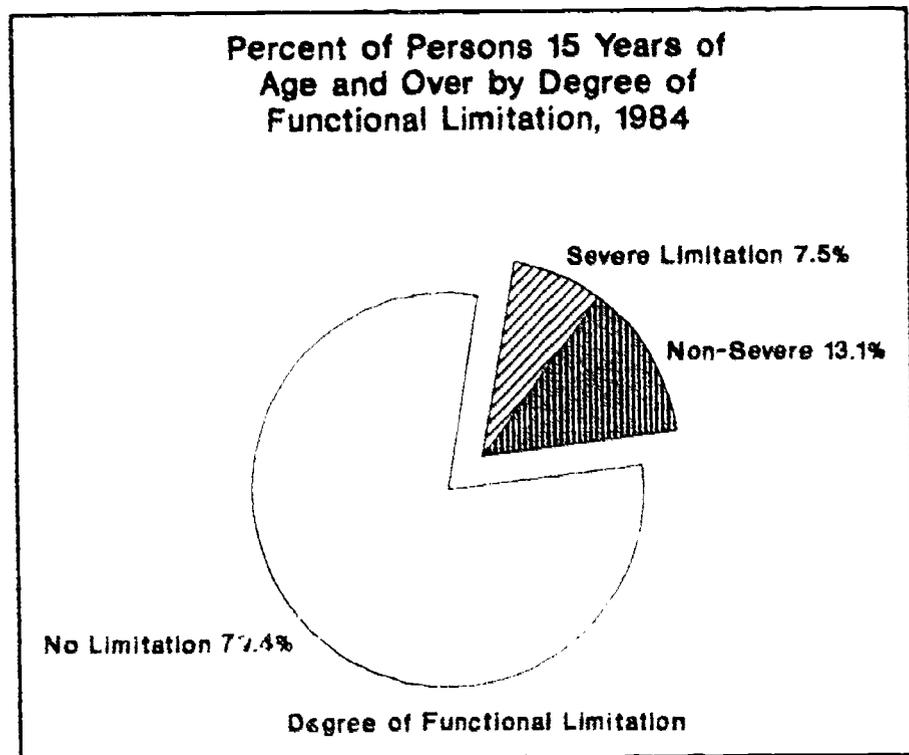


Figure 2

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation. Current Population Reports, Series P-70, No. 8, Table C.

Except for having speech understood, respondents also reported on the severity of their difficulty by indicating 1) if they had difficulty and 2) if they were unable to do the activity at all or without the assistance of another person, the latter defined as severe.

From this household survey, the Census Bureau estimates that 20.6 percent of the population, or 37.3 million persons 15 years of age and older, had a *functional limitation*, i.e., difficulty performing one or more of the specific activities, including 7.5 percent with a severe one (see Figure 2, above). This leaves a residual category of 13.1 percent with a non-severe functional limitation. Unlike the NHIS where the definition of limitation varied based on one's age and major activity, the 1984 SIPP measured functional limitation using the same definitional criteria for all respondents.

**Need for Assistance in Activities of Daily Living (ADL) and Instrumental Activities of Daily Living (IADL)**

One important distinction in the measurement of disability is the extent to which an individual requires the assistance of another person to perform basic life activities (*personal assistance*), such as dressing, eating, personal hygiene and getting around outside the home. To a much greater extent than the activity limitation and functional limitation definitions, the need for personal assistance is an effective measure and valuable predictor of a person's ability to live independently in the community.<sup>17</sup>

As one example of this disability measure, the Census Bureau's 1986 SIPP asked persons 15 years of age and over if they required the help of another person to carry on the following activities due to a health condition that had lasted or was expected to last three months or longer:

1. taking care of personal needs such as dressing, eating or personal hygiene;
2. getting around outside the household;
3. doing light housework such as washing dishes, straightening up or light cleaning;
4. preparing meals; and
5. keeping track of bills and/or money.

In this case, by measuring the extent to which respondents needed the help of other persons in performing one or more of the above activities, the Census Bureau estimates that 4.4 percent of the population, or 8.2 million persons 15 and older required personal assistance (see Figure 3).

Another way of measuring disability in this context is the extent to which persons need assistance with multiple activities. Of the 8.2 million persons requiring the help of others with one or more activities, over one-quarter needed personal assistance with one activity, nearly three-quarters needed help with two or more activities, and

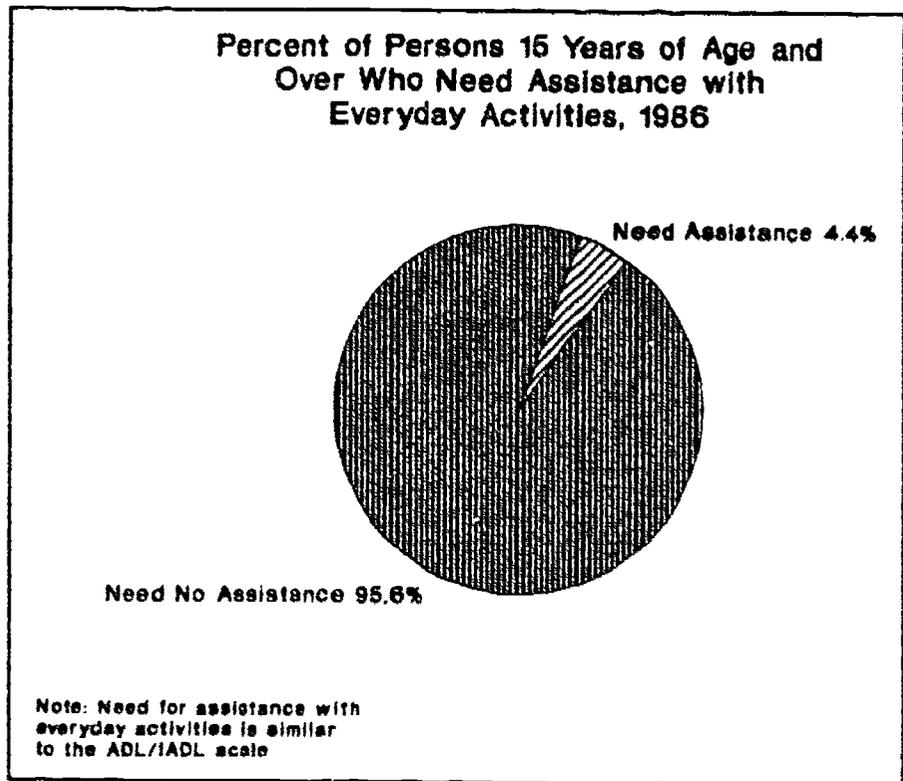


Figure 3

Source: U.S. Bureau of the Census, 1986 Survey of Income and Program Participation. Current Population Reports, Series P-70, No. 19, Table A.

over half needed help with three or more activities (see Figure 4, below).

The disability measures in the 1986 SIPP are similar to two other frequently used indicators of need for assistance - limitation in *Activities of Daily Living (ADL)* and *Instrumental Activities of Daily Living (IADL)*. ADL include the basic tasks of 1) bathing, 2) dressing, 3) using the toilet, 4) transferring (in and out of bed or chair), 5) continence, and 6) eating; IADL go beyond ADL in level of complexity and include 1) handling personal finances, 2) meal preparation, 3) shopping, 4) traveling, 5) doing housework, 6) using the telephone and 7) taking medications.<sup>18</sup>

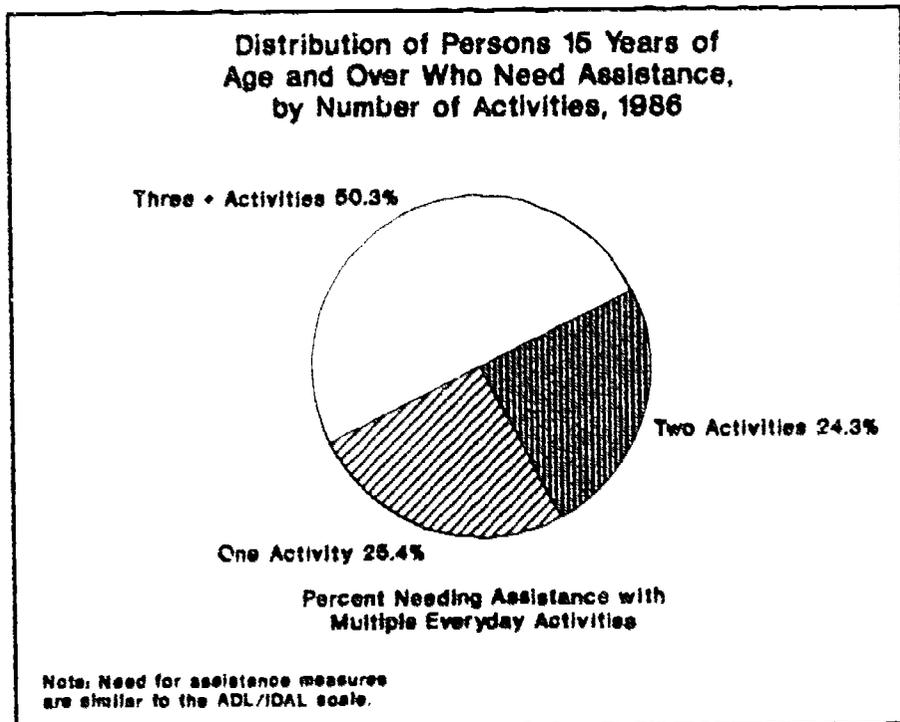


Figure 4

Source: U.S. Bureau of the Census, 1986 Survey of Income and Program Participation. *Current Population Reports*, Series P-70, No. 19, Figure 1.

The mobility activities of walking and going outside are also considered by disability statisticians to be activities of daily living (ADL).<sup>19</sup> However,

because persons are better able to overcome a mobility limitation than other ADL difficulties, through the use of assistive devices such as walkers, canes and wheelchairs, they do not fit the hierarchical pattern of the other six activities in terms of severity and the need for assistance from others.<sup>20</sup> For this reason, disability reports often present limitation in mobility activities separately (see Table 5).

The ADL scale represents a more basic level of functioning than the IADL, and, therefore, constitutes the most severe of the two measures.<sup>21</sup> For this reason, many persons with an ADL limitation also have an IADL limitation as well.

Unlike activity limitation and functional limitation, as defined above, which are very broad measures unique to the two surveys which use them, many studies assess the need for ADL and IADL assistance, albeit using different activity lists. These studies include other components of the annual NHIS,<sup>22</sup> the NHIS 1984 Supplement on Aging (SOA) (Figure 7) and 1979-1980 NHIS Home Care Supplement,<sup>23</sup> 1982 and 1984 National Long-Term Care Survey,<sup>24</sup> National Medical Expenditure Survey (NMES) 1987 household (Table 5) and institutional components (Table 33), and the 1985 National Nursing Home Survey (NNHS) (Table 26), among others.

Many professionals in the disability statistics arena prefer ADL/IADL measures over others because they focus attention on the needs common to persons with severe disabilities, apply to both household and institutional populations, reveal the particular types of assistance persons require regardless of age or setting, and are useful in determining eligibility for a range of long-term care services and benefits.<sup>25</sup>

One caveat associated with ADL/IADL surveys is that the number of persons reporting limitations in one or more ADL or IADL increases with the number of activities a particular study uses.<sup>26</sup> Relatively long activity lists produce relatively high prevalence rates. Apart from the sheer number, studies vary according to which particular activities they include or the extent to which several are grouped into a single category. Also, some studies measure multiple levels of difficulty in performing a particular activity according to the type of assistance required, such as special equipment or the help of another person. As an example of these variations, some studies exclude continence and mobility measures from the ADL scale. Others divide mobility

into the two activities of walking and getting outside. The 1986 SIPP combines all ADL measures into one category called "personal care" (Table 4), while the National Medical Expenditure Survey measured these items separately and according to several levels of difficulty (Table 5). The tables in the *Digest* reflect these variations, requiring care in interpretation, as explained in the narrative accompanying each one.

These inconsistencies make comparisons among multiple ADL/IADL studies difficult unless one focuses on general demographic patterns associated with disability, views only particular activities on the lists, or converts data from the multiple studies to an activity list common to all (see Table 6 for such a conversion for the elderly population). In an effort to reconcile these differences, at least for the elderly population, many professionals focus on a core set of five activities from the ADL scale (bathing, dressing, transferring in and out of bed and chair, using the toilet, and eating) as an effective basis for assessing need and determining eligibility for long-term care services.<sup>27</sup>

### Special Population Groups and Measures

Other studies with disability components focus on particular age groups or health conditions, and they often use definitions and measures unique to the specific survey. For example, NCHS conducts periodic special studies on current health topics, such as *severe and persistent mental illness* (1989) (Table 9), child health, including *development, learning, emotional or behavioral problems* (1988) (Tables 7), and aging (1984) using individual ADL/IADL measures (Figure 7). Respondents in these NHIS supplements also answer the activity limitation and other questions on the core survey instrument, and for this reason multiple measures of disability are possible. The 1984 SIPP also collected data using separate questions on child *physical, mental and emotional health* (Table 8), and the International Center for the Disabled, in conjunction with the National Council on the Handicapped, sponsored a Louis Harris poll on the *self-perception of persons with disabilities* (Tables 11 and 12).

### Chronic Conditions Causing Disability

Respondents reporting an activity limitation on the NHIS must also identify the particular chronic condition, e.g., high blood pressure, which causes this limitation. Respondents may report more than one chronic condition, but then they specify which one is the main cause. Measures of disability, therefore, can include not only the number of persons with a limitation but also the associated numbers and types of chronic conditions causing that limitation (see Table 13 for a detailed listing of chronic conditions).

NCHS defines a condition as chronic if (1) the respondent indicates it was first noticed more than 3 months before the reference date of the interview, or (2) it is a type of condition, such as heart disease or diabetes, that NCHS considers chronic regardless of onset.<sup>28</sup>

NCHS divides its NHIS sample of non-institutionalized persons into six groups, each of which is randomly administered one of six checklists of chronic conditions, regardless of disability, as follows:

1. selected Skin and Musculoskeletal Conditions, such as skin cancer or arthritis;
2. impairments, such as blindness;
3. selective Digestive Conditions, such as an ulcer;
4. selected Circulatory Conditions, such as heart disease;
5. selected Respiratory Conditions, such as emphysema; and
6. selective Miscellaneous Conditions (of the Genitourinary, Nervous, Endocrine, Metabolic, and Blood and Blood-Forming Systems), such as diabetes.

NCHS links this condition information with the survey responses on chronic activity limitation, restricted activity days and other measures of disability for analytical purposes, and the *Digest* uses this linked checklist information for presenting the disability rates, by chronic condition, in Tables N, 13, 14, and 15. These disability rates for each condition result from dividing the number of disabling conditions reported by the total reported condition count. As previously mentioned, not all reported chronic conditions cause an activity limitation, and many of the most prevalent ones produce low rates in this regard. Therefore, the existence of a chronic health condition is not, by itself, an indication of disability. Analysis of multiple conditions within, but not across, the six checklists is possible because an individual is administered only one condition list. These checklists do not include mental disorders which, therefore, do not appear in these tables.

Chronic condition data also come from the responses to NHIS questions on the causes of the major and outside activity limitation, irrespective of whether these conditions pertained to the respondent's particular checklist. In this case, analysis across the six domains is possible and the data include reported conditions not on the checklists, such as mental disorders, as Table M shows.

### Disability, Health Status, and Health Care Utilization

Chronic activity limitation, as defined by NCHS, manifests itself in many ways, and the *Digest* includes data which shows the relationship between long-term disability and a variety of health indicators, including respondent-assessed health status, restricted activity days, physician visits, and short-stay hospital days.

The definition and measurement of health status come from respondents describing health in general as 1) excellent, 2) very good, 3) good, 4) fair, or 5) poor. For presentation purposes, the tables combine data into two groups, 1) good to excellent and 2) fair or poor.

Another term relating to disability and health is restricted activity days. Except for persons who are bed-ridden, restricted activity days, as presented in the *Digest*, measure the recurring short-term effects of long-term disability (in some cases with accompanying acute conditions). The definition of restricted activity days is the average annual number of days a person experienced at least one of the following:

- 1) a bed day, during which a person stayed in bed more than half a day because of illness or injury;
- 2) a work-loss day, on which a currently employed person 18 years of age or over missed more than half a day from a job or business;
- 3) a school loss day, on which a student 5-17 years of age missed more than half a day from the school in which he or she was currently enrolled; or
- 4) a cut-down day, on which a person cuts down for more than half a day on things he usually does.

Depending on the particular table, the measures of restricted activity days are either *condition days* (Tables 14 and 15), that is the number of days during which a particular chronic condition caused a person to restrict his or her activity, or *person days* (Table 17), that is the number of days a person experienced at least one of the four types of activity restriction, regardless of the number of separate conditions involved. A person may have more than one chronic condition, and for this reason the number of condition days exceeds the number of person days.

Until now, the *Digest* has defined disability as a chronic (long-term) condition, such as arthritis, causing an activity limitation (long-term reduction in activity). Chronic conditions also can cause restricted activity (short-term reduction in activity) as just defined. However, unlike activity limitation, restricted activity may be caused by either an acute or chronic condition, or both. Nonetheless, researchers have found that the effects of these acute conditions do not alter the strong relationship between chronic disability and health status/health care utilization.<sup>29</sup>

The tables present these data according to the major demographic characteristics associated with disability to show how these patterns change among the various population groups. These health-related tables also include AIDS information which is particularly significant given the increasing prevalence, range of disabilities, and need for long-term care involved.<sup>30</sup>

### Work Disability

Another domain of analysis is work disability, which the Census Bureau defines, primarily, as a health problem or disability which prevents persons from working or which limits the kind or amount of work they can do.<sup>31</sup> From its 1988 Current Population Survey (CPS), the Bureau estimates that 8.6 percent of the non-institutionalized population between 16 and 64 years of age, or 13.4 million persons, had a work disability, including 4.8 percent with a severe one defined as inability to work at all or on a regular basis.<sup>32</sup> Another 4.5 million elderly persons 65 to 74 years of age reported having a work disability. Work disability prevalence figures include persons in and out of the labor force as well as those who are employed and unemployed.

Using similar definitions, the 1984 SIPP and the annual NHIS, among many other sources, also provide data on work disability, and the corresponding prevalence figures vary among the surveys. However, each survey is quite consistent regarding the major correlates of work disability such as labor force participation and earnings, as well as age, ethnicity, gender, education, income, and other factors.<sup>33</sup> Tables Q - V and 22 - 25 provide a detailed treatment of this subject.

### Disability in Long-Term Care Facilities

Data on residents of institutions are extremely important because the National Health Interview Survey, Survey of Income and Program Participation, and the Current Population Survey, among others, are household studies and, therefore, exclude persons with the most severe disabilities. The *Digest* includes data on three institutionalized population groups: nursing home residents, mental health inpatients, and persons living in residential facilities for the mentally retarded.

The major disability-related surveys which the *Digest* uses for this information are the 1985 National Nursing Home Survey (Tables 26-29); the 1986 Client/Patient Survey of Inpatient, Outpatient and Partial Care Programs conducted by the National Institute of Mental Health (Tables 30-32); and the 1987 National Medical Expenditure Survey Institutional Population Component covering facilities for the mentally retarded (Table 33). The 1986 Inventory of Long-Term Care Places also collected data on a range of institutional settings and served as a basis for sampling for the nursing home and mental retardation facility studies.<sup>34</sup>

While one can assume that all institutional residents have a disability by virtue of their placement, for two of these groups, those living in nursing homes and mental retardation facilities, the studies include ADL measures and, for nursing home residents, IADL measures as well.

Among the 1.5 million persons in nursing homes, 88.4 percent of whom were 65 years of age and over, more than 90 percent were dependent in at least one ADL (including continence as a separate activity, but excluding mobility measures) and virtually all had an IADL dependency (Table 26). Of the nearly 212,000 residents of facilities for the mentally retarded, 63.8 percent had at least one ADL difficulty, including walking (Table 33).

When classifying the inpatient population of mental health facilities, NIMH distinguishes between the long-term caseload, or patients *under care*, numbering 160,862 as of April 1986, and the total *admissions* during the course of that year, numbering 1.6 million. The reason for these separate groupings is that the overwhelming majority of inpatients had relatively short stays, with a median of only 15 days. This contrasts with the average daily census at mental health inpatient facilities, 228,530, which includes a combination of long and short term residents.<sup>35</sup> The patients under care constitute a distinct component within the overall population, and for this reason the tables present data separately for these two groups (Tables 30-32).

## Federal Benefit Programs for Persons with Disabilities

The *Digest* includes data from the major federal benefits programs for persons with disabilities to complement the overall prevalence figures for the population as a whole. These programs include special education, vocational rehabilitation, veterans affairs, Social Security Disability Insurance, (SSDI), and Supplemental Security Income (SSI) programs for persons who are blind or disabled. Information on these programs comes from administrative data bases on enrollees. For this reason, the size and composition of the participant population are strongly influenced by regulatory factors such as eligibility criteria unrelated to ones functional capacity. However, in conjunction with the national survey figures, data on demographic characteristics and chronic health conditions among beneficiaries provide another profile of persons with disabilities in this country (Tables 34-45).

### State Level Data

Most data on disability show prevalence estimates at only the national level. In some cases, this information appears according to the Bureau of the Census Regions (Table 2). The reason is that, with few exceptions, the sample sizes from the various disability-related surveys are too small to allow state-level estimates. However, for several sources, disability data for each state is available either because a full population base was used, e.g., all residential facilities for the mentally retarded, or the sample size was sufficiently large to allow small geographic area breakdowns, e.g., the U.S. Census. To help overcome these data limitations, NIDRR is sponsoring a computer modeling effort to produce state-level estimates from national data and may be contacted for availability information.

### Interpretation and Limitations of the Data

As introduced, above, federal statistical agencies measure and report on the prevalence of disability using many different definitions, including 1) *activity limitation* in the annual NHIS, 2) *functional limitation* in the 1984 SIPP, 3) *need for personal assistance* in performing activities of daily living (ADL) and instrumental activities of daily living (IADL) in the 1986 SIPP, among other studies, and 4) *work disability* in the 1988 CPS and the additional surveys on this topic. Many national studies which use these measures also focus on particular health conditions, and they distinguish between the household population and those living in institutions and among demographic groups such as children and the elderly.

Activity limitation and functional limitation are the most general measures, covering a wide spectrum of disability faced by the household population. On the other hand, measures of ADL/IADL limitation pertain to persons with severe long-term personal assistance needs and describe disability in both household and institutional settings. Work disability focuses specifically on the capacity to pursue gainful employment, with sustained earnings.

While the prevalence estimates legitimately vary depending on the particular survey and aspect of disability, the major demographic correlates are quite consistent across these data sources. According to the Bureau of the Census, those factors having the strongest association with disability are 1) age, 2) education, 3) income, 4) race and ethnicity, 5) living arrangements, and 6) gender.<sup>36</sup> It is important to note that the issue of causality between these demographic factors and disability often cannot be determined at all from the data. For example, while disability can certainly cause poverty, the reverse may be true as well; however, the extent to which each of these scenarios occurs is unknown.<sup>37</sup>

Using just some of the data from the *Digest's* detailed tables, the following discussion provides a summary of prevalence information and shows the relationship between disability and various characteristics associated with it. This information appears under the following categories, corresponding to the major disability definitions and measures introduced, above: 1) General Measure of Disability using the NHIS and 1984 SIPP, 2) ADL/IADL limitations using the 1986 SIPP, 3) Special Population Groups, Conditions, and measures (Children, Elderly, Mental Health, Mental Retardation, and Self-Perception) using various studies, 4) Chronic Health

Conditions Causing Disability from the NHIS, 5) Health Status and Health Care Utilization using the 1984 SIPP, 6) Work Disability using the 1988 CPS, 7) Residents of Long-term Care Facilities using multiple surveys, and 8) Federal Programs for Persons with Disabilities using administrative data bases. The tables section of the *Digest* provides detailed treatment of these topics using many sources of data and accompanying text, and for this reason only a few examples appear in this introduction.

To help understand the data, several explanations and interpretive guidelines are germane. First, the data presented, below, are normally *prevalence* estimates, showing the *current* number of persons with a disability or number of conditions existing at a particular reference point or period in time, regardless of onset. This contrasts with *incidence* figures which are the number of *new* persons or conditions occurring during or since a specified time period.

The tables and figures throughout this report present prevalence information in various ways. The most frequent measure is the percent of persons in a particular demographic group, such as high school graduates, who have a disability, compared to another demographic group, such as those without a high school diploma. In this case, the numbers of graduates or non-graduates, regardless of disability, are the base figures, and the percent of each with a disability is the measure (see Table 3 and Figure 6). However, one also can identify the differences between those with and without a disability relative to particular demographic characteristics, such as living alone. In this case, the base figures are the numbers of persons with or without a disability, and the measure is the percent among each who live alone (see Table 11 and Figure 7).

Depending on the particular table's structure, either of these rates may pertain to a column (see Table 5) or row (see Table A) of numbers. Tables also may have individual percentages grouped under various subtotals (see Table 25). For some of the figures, such as those for different age groups or those with or without a disability, the counts are mutually exclusive and, therefore, may be added to a total, usually 100 percent. Other numbers, such as persons who have difficulty performing a particular activity, such as eating, also may be included in the count for another activity, such as dressing. In this case the numbers are not mutually exclusive and normally may not be summed. To provide aggregate measures for these data, some of tables present the numbers of persons limited in various combinations of specific activities (see Table J).

Most tables are in the form produced by the originating federal statistical agency, and for this reason variations do occur in the location and use of these base numbers and the meaning of component figures. The Introduction and the Highlights and Explanatory Notes which accompany each table provide interpretive guidance in this regard.

For the household population, the prevalence estimates represent a person's (or proxy respondent's) own perception of a disability, as opposed to a professional diagnosis. However, studies show that respondent-reported limitations represents an accurate assessment of a person's functional capacity.<sup>38</sup>

Most of the data in the *Digest* come from surveys of population samples and are subject to sampling errors. Overall, these errors are very small because the sample sizes are quite large. In general, when the sample size is too small for reliable estimates, the figures are either omitted or marked with an asterisk (\*). However, small differences between two otherwise reliable numbers or percentages, especially for subgroups in a table, may be due to chance, e.g., not statistically significant. Differences highlighted in the narrative portions of the *Digest* come from federal statistical agency sources and are significant. Other small differences among numbers and percentages in the tables, or which a reader may recompute from the data, may not be statistically significant. The variety of data sources in the *Digest* precludes providing detailed reliability documentation on each one; however, for those interested in small differences or subtle patterns, the source publications in the citations have complete information in this regard.

Finally, as with any data, statistical relationships for *groups* of persons, such as the correlation between low educational attainment and work disability, cannot be ascribed to one person or a few *individuals*, who may not follow the group's pattern.

## Prevalence and Characteristics of Persons with Disabilities

### General Measures of Disability

Using two broad measures of functioning, *activity limitation* in the NHIS and *functional limitation* in the 1984 SIPP, the following discussion presents those demographic characteristics most associated with disability.

**Age:** As the NHIS data in Table A show, disability and age are strongly related, although in sheer numbers, the vast majority of persons with an activity limitation are under the age of 65. At the same time, most persons 65 and over have no activity limitation at all. Overall, however, disability increases substantially with age.

In terms of the percentage of the elderly with a disability, persons 65 years and older were more than three and one-half times as likely to have an activity limitation and over three times as likely to be unable to carry out their major activity as their younger counterparts. Of all persons 65 years of age and over, 38.3 percent had an activity limitation including 10.1 percent who were unable to carry on their major activity at all. For persons under the age of 65, 10.7 percent had an activity limitation including 3.2 percent who are unable to carry out their major activity (re-computed from Table A data).

Age	All Persons (Number in Thousands)	Total With Activity Limitation*	Unable to Carry on Major Activity	Limited in Amount or Kind of Major Activity	Limited, but not in Major Activity
All Ages	243,532	14.1	4.1	5.4	4.5
Under 18 Years	64,003	5.3	0.6	3.2	1.5
18-44 Years	104,196	9.0	2.6	3.7	2.7
45-64 Years	46,114	22.2	8.8	7.7	5.6
65 Years and Older	29,219	38.3	10.1	12.7	15.5
65-69 Years	9,903	36.9	15.7	13.4	7.7
70 Years and Older	19,316	39.0	7.2	12.3	19.4

\* This total of the three adjacent percentages may not add exactly due to rounding.

Source: National Center for Health Statistics, 1989 National Health Interview Survey. *Vital and Health Statistics*, Series 10, No. 176, Table 68.

As previously stated, the definition of major activity in the NHIS varies by age and, as a practical matter, by gender since more women than men in the 18-69 age group report "keeping house" as their major activity.<sup>39</sup> The purpose of this definitional variation is to measure disability in the context of one's particular environment and associated challenges. This results in an apparent reversal of the direct relationship between disability and age among specific groups. For example, there is a reduction in the prevalence of those unable to carry out their major activity when comparing ages 65-69, at 15.7 percent (where work is the predominant major activity), and age 70 and above, which drops to 7.2 percent (where "living independently" is the major activity). This change in the degree of activity limitation after age 69 simply means that many persons with a work disability can, upon reaching age 70, care for themselves.<sup>40</sup>

Given the narrow definition of major activity after age 69 (living independently), there is a corresponding increase in the numbers of persons reporting limitations in a broad range of non-major activity which includes work and social and recreational activities.<sup>41</sup> For this reason, the percentage of persons with a non-major activity limitation rises dramatically after age 69, from 7.7 percent to 19.4 percent. After age 75 major activity limitation rates rise and non-major ones fall.<sup>42</sup> For those 85 years of age and over, nearly 20 percent cannot perform their major activity, another 27 percent are otherwise limited in their major activity, and nearly 13 percent have a non-major activity limitation (data not shown).

In Table B on functional limitation status, the 1984 SIPP data confirm and augment information on the relationships found in the NHIS between disability and age. Again, because the SIPP uses questions different from the NHIS and a single set of functional activities to measure disability, regardless of age, the figures differ and do not show the abrupt changes found in the NHIS across specific age groupings.

As the table shows, persons 65 years of age and older were more than four times as likely to have a functional limitation and over seven times as likely to have a severe one than their younger counterparts. The relationship between age and disability is particularly pronounced for those 75 years of age and over where nearly three-quarters have a functional limitation.

As with all demographic characteristics, the interplay between age and the other correlates of disability suggests caution when interpreting the data. For example, since many elderly persons also have limited income and low levels of formal schooling, and, at advanced ages, are predominantly women, the relationships between disability and income, education, and gender, as presented below, are often a function of age. For this reason, many of the tables in this *Digest* present the characteristics of persons with a disability according to age, as well as the other factors associated with disability.

Age	Total	With a Functional Limitation			
		Total		Severe	
		Number	Percent	Number	Percent
Total	180,987	37,304	20.6	13,537	7.5
15 to 24 years	39,297	2,054	5.2	346	0.9
25 to 34 years	40,464	3,049	7.5	596	1.5
35 to 44 years	30,480	4,074	13.4	890	2.9
45 to 54 years	22,264	5,110	23.0	1,431	6.4
55 to 64 years	22,060	7,552	34.2	2,734	12.4
65 years and over	26,422	15,465	58.5	7,539	28.5
65 to 69 years	8,928	4,052	45.4	1,682	18.8
70 to 74 years	7,378	4,078	55.3	1,691	22.9
75 years and over	10,116	7,335	72.5	4,166	41.2

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation. *Current Population Reports*, Series P-70, No. 8, Table C.

**Income:** Using NHIS data, Figure 5 shows that disability and income (from all sources/persons) are clearly related in terms of both prevalence and severity of activity limitations. Persons with family incomes below \$10,000 were more than three times as likely to have some form of activity limitation and more than five times as likely to be unable to perform their major activity as those with incomes of \$35,000 or more. For persons with family incomes under \$10,000, 26.8 percent had some form of activity limitation including 9.7 percent who were unable to carry on their major activity. Conversely, for persons with family incomes of \$35,000 or more, only 8.2 percent experienced an activity limitation including 1.7 percent who were unable to carry on their major activity.

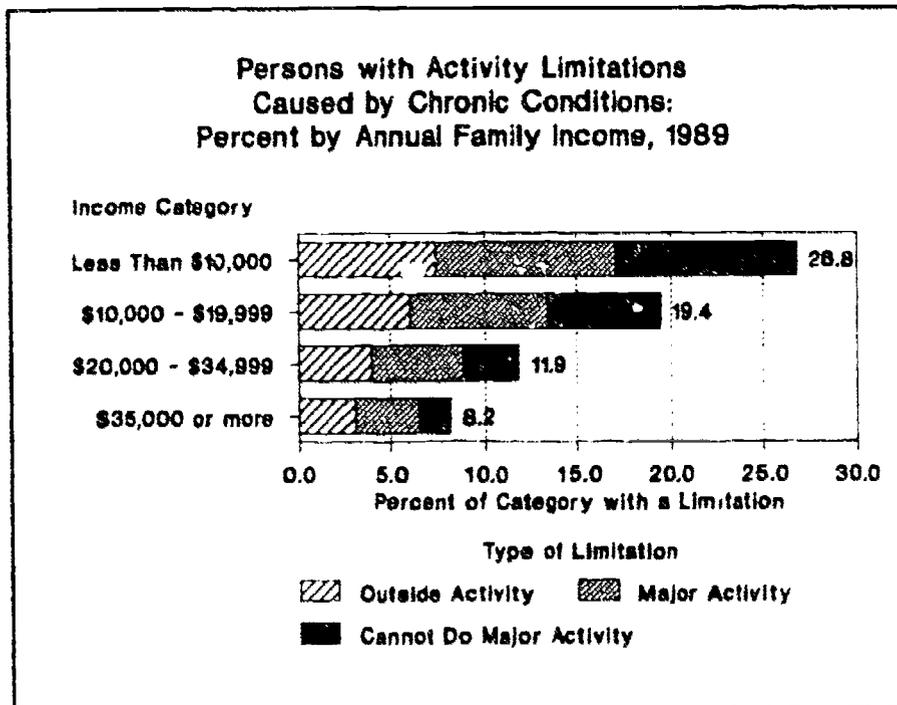


Figure 5

Source: National Center for Health Statistics, 1989 National Health Interview Survey. *Vital and Health Statistics*, Series 10, No. 176, Table 68.

Table C, with data from the 1984 SIPP, shows that persons with low incomes (less than \$600 per month) were nearly four times as likely to have a functional limitation and over six times as likely to have a severe limitation as persons with monthly incomes of \$3,000 and over. Income includes all household sources/persons.

Characteristic	Total	With a Functional Limitation			
		Total		Severe	
		Number	Percent	Number	Percent
Total	180,987	37,304	20.6	13,537	7.5
Monthly Household Income					
Under \$600	20,690	8,262	39.9	3,746	18.1
\$600 to \$1,199	27,866	8,944	32.1	3,731	13.4
\$1,200 to \$1,999	38,648	8,211	21.2	2,826	7.3
\$2,000 to \$2,999	40,999	6,249	15.2	1,804	4.4
\$3,000 and over	52,784	5,638	10.7	1,430	2.7

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation. *Current Population Reports*, Series P-70, No. 8, Table C.

Related to income, the dependence on public benefit programs increased with the prevalence of functional limitations, as shown in Table D. For example, over 45 percent of all Medicaid recipients and nearly 37 percent of all Food Stamp recipients have a functional limitation, compared to the 20.6 percent figure for all persons 15 years of age and over. This shows that, beyond the chronic conditions and functional limitations they cause, persons with disabilities must contend with other barriers to full participation in society, such as

low income, and they rely heavily on public benefit programs to help gain access to cash assistance, medical care, food, and housing, among other required services. The Census Bureau found that, among persons with a functional limitation, these utilization rates generally increased with age. The exception was Medicare which had a participation rate of 84.6 percent for the 15 to 64 age group with a functional limitation, compared to only 58.6 percent for those 65 years of age and over.<sup>43</sup>

Characteristic	Total	With a Functional Limitation			
		Total		Severe	
		Number	Percent	Number	Percent
Total	180,987	37,304	20.6	13,537	7.5
Program Participation					
Received -					
Cash assistance other than SSI	10,037	4,594	45.8	2,342	23.3
SSI	3,473	2,683	77.3	1,674	48.2
Food Stamps	10,867	3,994	36.8	1,776	16.3
Medicaid Coverage	10,610	4,788	45.1	2,527	23.8
Public or subsidized housing	5,932	2,243	37.8	1,019	17.2
VA Payments	3,460	1,979	57.2	974	28.2
Social Security	32,832	18,543	56.5	9,051	27.6
Medicare Coverage	27,948	16,932	60.6	8,549	30.6

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation. Current Population Reports, Series P-70, No. 8, Table C.

**Education:** According to the NHIS, low educational attainment has a strong correlation with disability. For persons 18 years of age and over without an eighth grade education, 38.0 percent have some form of activity limitation and 13.6 percent cannot perform their major activity, compared to 10.5 percent and 1.9 percent, respectively, for persons with at least four years of college (data not shown).<sup>44</sup>

This relationship between disability and years of schooling also appears in the 1984 SIPP data, as Figure 6 shows. In this case, persons without a high school diploma were almost two and one-half times as likely to have a functional limitation and almost four times as likely to have a severe limitation as those who were high school graduates. Of the 56 million persons 15 years of age and older without a high school diploma in 1984, 19.6 million, or 35.1 percent, had a functional limitation, and 8.6 million, or 15.4 percent, had a severe limitation (see Table 3). The contrasting figures for the 125 million high school graduates are 17.7 million, or 14.1 percent with a functional limitation, and 4.9 million, or 3.9 percent with a severe limitation.

In combination, low educational attainment and advanced age correlate with higher rates of disability than does either of these characteristics individually. As Table 3 shows, among persons 65 years of age and over, those without a high school education have a functional limitation rate of 68.6 percent, including 36.6 percent with a severe one. Conversely, for persons 15 to 64 years of age with a high school diploma, only 10.7 percent had a functional limitation, including 2.4 percent with a severe one.

**Ethnicity:** As the NHIS data shows in Table E, overall differences in activity limitation between the white and black population are small, but these differences increase with age and the severity of the limitation involved. For all age groups, 14.2 percent of the white population and 14.9 percent of the black population had an activity limitation. This difference is, in reality, greater because the black population as a whole is younger than the white, and activity limitation increases with age.<sup>45</sup> By comparing a younger black population with an older white one, real differences are masked.

Looking at particular subgroups presents a different picture than for the population as a whole. In the 45 to 64 and 65 to 69 age groups, blacks were nearly twice as likely to be unable to carry out their major activity as whites. For person 70 years and older, 38.2 percent of the white population had some form of activity limitation compared to 48.2 percent of their black counterparts.

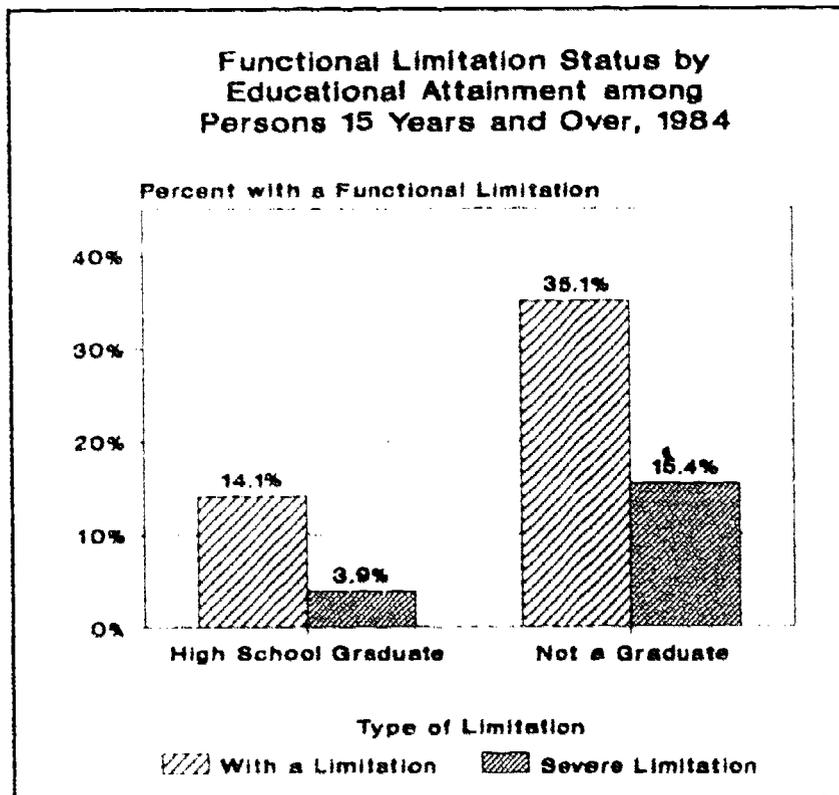


Figure 6

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation, *Current Population Series*, Series P-70, No. 8, Table 1.

Race and Age	All Persons (Number in Thousands)	Total With Activity Limitation*	Unable to Carry on Major Activity	Limited in Amount or Kind of Major Activity	Limited, but not in Major Activity
All Ages - White	205,312	14.2	3.9	5.5	4.7
Under 18 Years	51,549	5.4	0.5	3.3	1.6
18-44 Years	87,429	9.0	2.4	3.8	2.8
45-64 Years	40,022	21.5	8.0	7.8	5.7
65-69 Years	8,814	35.6	14.7	13.2	7.7
70 Years and Older	17,498	38.2	6.9	11.7	19.6
All Ages - Black	29,891	14.9	5.9	5.3	3.6
Under 18 Years	9,959	5.6	0.8	3.2	1.6
18-44 Years	12,766	10.2	4.2	3.7	2.3
45-64 Years	4,712	29.5	15.8	7.9	5.8
65-69 Years	905	48.8	25.6	14.6	8.6
70 Years and Older	1,548	48.2	11.2	18.6	18.3

\* This total of the three adjacent percentages may not add exactly due to rounding.

Source: National Center for Health Statistics, 1989 National Health Interview Survey, *Vital and Health Statistics*, Series 10, No. 176, Table 68.

The 1984 SIPP data in Table F exhibit a similar pattern of increased disability rates among blacks relative to whites, with advancing age and severity of limitation. According to the Census Bureau, 20.2 percent of whites 15 years of age and over had a functional limitation including 7.3 percent with a severe one, compared to 24.9 and 9.5 percent, respectively, for blacks. The corresponding figures for Hispanics, 19.2 and 7.6 percent, were not statistically different from whites.<sup>46</sup> Among the elderly 65 years of age and over, the functional limitation rates for blacks and whites were 75.0 and 56.9 percent, respectively. The 58.6 percent rate for Hispanics was not statistically different from whites. In terms of severity of limitation among the elderly, the white, black, and Hispanic rates of functional limitation were 27.4, 41.5 and 35.7, respectively.

Characteristic	Total	With a Functional Limitation			
		Total		Severe	
		Number	Percent	Number	Percent
Total <sup>1</sup>	180,987	37,304	20.6	13,537	7.5
White:					
Total Ages 15 and Over	156,009	31,568	20.2	11,394	7.3
15 to 64 Years	32,087	17,951	13.6	4,844	3.7
65 Years and Over	23,921	13,617	56.9	6,550	27.4
Black:					
Total Ages 15 and Over	20,018	4,975	24.9	1,907	9.5
15 to 64 Years	17,838	3,340	18.7	1,003	5.6
65 Years and Over	2,181	1,635	75.0	905	41.5
Spanish Origin <sup>2</sup> :					
Total Ages 15 and Over	9,394	1,808	19.2	710	7.6
15 to 64 Years	8,710	1,407	16.2	466	5.4
65 Years and Over	684	401	58.6	244	35.7

<sup>1</sup>Includes other races

<sup>2</sup>Persons of Spanish origin may be of any race

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation. Current Population Reports, Series P-70, No. 8, Table B.

**Gender:** Table G shows that gender differences are less frequently associated with levels of disability than race, with women having only a slightly higher prevalence of activity limitations than men (14.4% versus 13.7%).<sup>47</sup> In addition to those reasons cited in the discussion on age, above, gender variations in the NHIS data which do appear for those 45 to 69 years, especially for those unable to carry on their major activity, are due to the fact that women are less likely to report limitations in keeping house than men in performing work, with the opposite occurring for non-major activities, where house keeping as a major activity includes work as an outside activity.<sup>48</sup> There are more women than men in the high age groups associated with increased disability, and for this reason age adjusting the figures slightly reduces the rates for females and slightly increases them for males.<sup>49</sup>

Gender and Age	All Persons (Number in Thousands)	Total With Activity Limitation*	Unable to Carry on Major Activity	Limited in Amount or Kind of Major Activity	Limited, but not in Major Activity
All Ages - Male	118,009	13.7	4.6	5.0	4.0
Under 18 Years	32,752	6.3	0.6	4.0	1.7
18-44 Years	51,044	9.1	2.9	3.8	2.4
45-64 Years	22,070	21.4	10.4	6.5	4.5
65-69 Years	4,553	38.3	20.8	12.6	4.9
70 Years and Older	7,590	38.7	7.2	9.0	22.5
All Ages - Female	125,523	14.4	3.6	5.8	4.9
Under 18 Years	31,251	4.3	0.5	2.5	1.3
18-44 Years	53,152	9.0	2.3	3.7	3.0
45-64 Years	24,044	22.8	7.3	8.9	6.7
65-69 Years	5,350	35.7	11.4	14.1	10.1
70 Years and Older	11,726	39.1	7.2	14.5	17.4

\* This total of the three adjacent percentages may not add exactly due to rounding.

Source: National Center for Health Statistics. 1989 National Health Interview Survey. Vital and Health Statistics, Series 10, No. 176, Table 68.

As with the NHIS, gender differences in functional limitation status from the 1984 SIPP are influenced by age, since there are more women than men in the high age groups associated with disability. As Table H shows, for persons 15 to 64 years of age, 12.6 percent of males had a functional limitation, compared to 15.6 percent of females. The percentages with a severe limitation were 3.1 for males and 4.7 for females in this age group. For persons 65 years of age and over, 53.5 percent of males and 62.0 percent of females had a functional limitation. The corresponding figures for a severe limitation are 21.8 percent for elderly males and 33.2 percent for elderly females.

Characteristic	Total	With a Functional Limitation			
		Total		Severe	
		Number	Percent	Number	Percent
Total	180,987	37,304	20.6	13,537	7.5
Male - Total 15 and Over	86,336	15,260	17.7	4,662	5.4
15 to 64 Years	75,551	9,487	12.6	2,315	3.1
65 Years and Over	10,785	5,773	53.5	2,347	21.8
Females - Total 15 and Over	94,651	22,044	23.3	8,874	9.4
15 to 64 Years	79,014	12,352	15.6	3,682	4.7
65 Years and Over	15,637	9,692	62.0	5,192	33.2

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation. Current Population Reports, Series P-70, No. 8, Table B.

**Living Arrangements:** According to the NHIS, as Table I shows, the prevalence of disability is greatest among those who are potentially isolated - widowed, (40.4 percent with an activity limitation, many of whom are elderly), separated (22.2 percent), divorced (22.0 percent) - compared to married persons (16.0 percent with an activity limitation) and persons who have never been married (10.9 percent, many of whom are relatively young).<sup>50</sup>

Table I: Number of Persons and Percent Distribution by Degree of Activity Limitation Due to Chronic Conditions by Marital Status: United States, 1983-1985 (Annual Average for Three-Year Period)					
Marital Status	All Persons (Number in Thousands)	Total With Activity Limitation*	Unable to Carry on Major Activity	Limited in Amount or Kind of Major Activity	Limited, but not in Major Activity
Under Age 18 (any status)	62,650	5.1	0.4	3.2	1.5
Married	108,648	16.0	4.4	6.4	5.1
Widowed	12,808	40.4	10.3	16.6	13.6
Divorced	10,918	22.0	7.1	8.7	6.2
Separated	3,582	22.2	8.1	8.4	5.7
Never Married	32,150	10.9	4.2	3.9	2.8
Unknown	793	14.8	6.9	4.6	3.2

\* This total of the three adjacent percentages may not add exactly due to rounding.

Source: National Institute on Disability and Rehabilitation Research, 1983-1985 National Health Interview Survey, in LaPlante, Mitchell P. (1988). Data on Disability from the National Health Interview Survey, 1983-85, Table 2.

The 1984 SIPP also shows that vulnerability, such as living alone, increases for persons with disabilities, as presented in Figure 7. Those with a functional limitation were over twice as likely to live completely alone as those without such limitations (21.4 versus 9.1 percent). Persons with a severe functional limitation were nearly three times as likely to live alone as their counterparts without a functional limitation (26.0 versus 9.1 percent). The percent of persons living either alone or with non-relatives, are 24.5, 29.1 and 13.6, respectively, for those with a functional limitation, severe limitation and no limitation. This figure shows the percent of persons who live alone according to their functional limitation status. Presented another way, as Table 3 shows, 37.9 percent of those living alone had a functional limitation, compared to 20.0 percent of married persons with the spouse present.

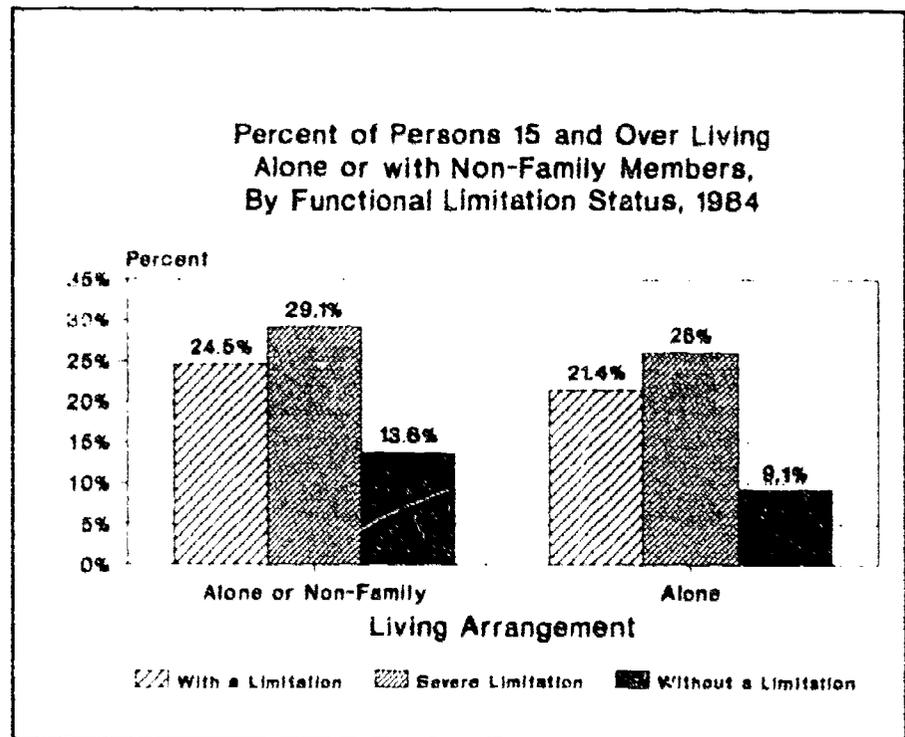


Figure 7

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation, Current Population Series, Series P-70, No. 8, Table 1.

## Limitation in Activities of Daily Living (ADL) and Instrumental Activities of Daily Living (IADL)

Using data from the Census Bureau's 1986 SIPP, the following tables show prevalence figures on the need for assistance from others with everyday activities. While 4.4 percent of the total population 15 years of age and older needed assistance with one or more of the five everyday activities, this rate varied considerably depending on persons' demographic characteristics.

**Age:** As Table J shows, persons 65 years and older were nearly seven times more likely to need personal assistance than their younger counterparts (16.0 versus 2.4 percent). The additional age detail in Table 4 shows this disparity increased for those of advanced age, with over 45 percent of persons 85 and over needing personal assistance. The particular type of personal assistance also varied with age. Persons needing assistance who were 65 years and over were more likely to require help with getting around outside and keeping track of money and bills than their younger counterparts with a need for assistance.<sup>51</sup> While the need for personal assistance increased with age, nearly half (46.4 percent) of those requiring help in this regard were under the age of 65.

Characteristic	Total	Needed assistance with -					
		One or more activities	Personal care	Getting around outside	Preparing meals	Doing housework	Keeping track of bills and/or money
Person 15 Years and Over							
Total Number	186,022	8,206	3,211	5,213	4,830	5,927	3,039
Total Percent	100	4.4	1.7	2.8	2.6	3.2	1.6
Persons 15 to 64 Years							
Total Number	158,359	3,794	1,383	2,077	2,315	2,821	1,050
Total Percent	100	2.4	0.9	1.3	1.5	1.8	0.7
Persons 65 Years and Over							
Total Number	27,663	4,412	1,827	3,136	2,515	3,106	1,990
Total Percent	100	16.0	6.6	11.3	9.1	11.2	7.2

Source: U.S. Bureau of the Census, 1986 Survey of Income and Program Participation, Current Population Reports, Series P-70, No. 19, Tables A and B.

**Income:** As Table K shows, persons with low household incomes (under \$600 per month) were more likely to need personal assistance than those with monthly incomes of \$3,000 and over (11.8 versus 1.9 percent). In combination, low income and advanced age correlate with the highest rate of need for personal assistance. Of persons 65 years of age and over with monthly incomes under \$600, 27.2 percent had a need for assistance with one or more of the activities.

**Ethnicity:** As Table 4 shows, blacks, at 5.7 percent, were more likely than whites at 4.3 percent, or Hispanics at 3.4 percent to require personal assistance. The black - white disparity in need for assistance increased

substantially for those of advanced age (22.7 versus 15.4 percent, respectively) for persons 65 and older. In this age group, white and Hispanic differences were not statistically different.<sup>52</sup>

**Gender:** Table 4 also shows that a larger percentage of females than males required personal assistance with one or more of the listed activities - 5.8 percent versus 2.9 percent. The gender disparity remained for all age groups, but varied depending on the particular activity involved. Suggesting the influence of traditional roles, males 65 to 74 years old reported they were less likely to need assistance with meal preparation (4.3 percent) and housekeeping (3.9 percent) than females (6.7 and 9.6 percent, respectively).<sup>53</sup> This was in spite of the fact that the overall need for assistance (with one or more activities) for both males and females was about the same for this age group.<sup>54</sup>

**Living Arrangements:** From the same table, the data show that persons living alone or with non-relatives had a greater likelihood of needing assistance with one or more of the everyday activities (8.4 percent) than those living with a family member (3.6 percent). Computed another way, nearly one-third (32.0 percent) of the 8.2 million persons needing personal assistance did not live with a family member, almost all of whom lived completely alone.

**Personal Assistance Caregivers:** The 1984 SIPP

also collected data on persons who provided personal assistance. Unpaid ADL and IADL assistance provided by family and friends constitutes the primary source of support, and the SIPP shows the extent to which this occurs, the specific everyday activities involved, and the characteristics of those providing the help.<sup>55</sup> Nearly 5.8 million persons provided assistance with one or more activities to a household member, while another 15.1 million persons provided personal assistance to one or more individuals outside the caregiver's household. For both groups of caregivers, the most frequently provided care, although not in the same order, was preparing meals, doing housework and helping someone get around outside the house. Over 94 percent of those providing care to a member of their own household were related to the recipient, including a spouse (44%), daughters (18.4%) and sons (11.9%). For those assisting persons outside the caregiver's household, 22.2 percent were daughters, 12.0 percent were sons, 32.6 percent were another relatives, and 33.2 percent were non-relatives.

**Disability Status of Special Population Groups**

**Children:** Disability status among children varies considerably depending on the particular study and the types of conditions involved. For example, the 1988 NHIS, in addition to data on activity limitation, measured child health in terms of: 1) *delays in growth or development* (4.0 percent of children age 17 years and under), 2) *learning disabilities* (6.5 percent of children 3 to 17 years of age), and 3) *emotional or behavioral problems lasting*

Monthly Income by Age Group	Total	Needed Assistance with One or More Activities
Person 15 Years and Over	186,022	4.4%
Under \$600	16,227	11.8
\$600 to 1,199	25,066	8.2
\$1,200 to 1,999	37,483	4.6
\$2,000 to 2,999	33,737	3.0
\$3,000 and Over	67,509	1.9
Persons 15 to 64 Years	158,359	2.4%
Under \$600	11,708	5.9
\$600 to 1,199	17,240	4.5
\$1,200 to 1,999	30,164	2.4
\$2,000 to 2,999	35,911	2.2
\$3,000 and Over	63,337	1.3
Persons 65 Years and Over	27,663	16.0%
Under \$600	4,519	27.2
\$600 to 1,199	7,827	16.5
\$1,200 to 1,999	7,320	13.6
\$2,000 to 2,999	3,826	11.2
\$3,000 and Over	4,172	11.2

Source: U.S. Bureau of the Census, 1986 Survey of Income and Program Participation, *Current Population Reports*, Series P-70, No. 19, Tables 1 and 2.

three months or more or requiring psychological treatment (13.4 percent of children 3 to 17 years of age) (see Table 7). Across all these measures, NCHS estimates that over 10.7 million children, or 19.5 percent of those 3 to 17 years of age, had one or more of these conditions. Because of the long-term effect which developmental, learning and emotional problems can have, these figures include children who have ever had the condition at anytime in their lives (lifetime prevalence). The NHIS Child Health Supplement shows that despite the elimination or amelioration of childhood infectious diseases, there is a high rate of chronic health problems, with psychological disorders increasing and now ranking among the most prevalent.<sup>56</sup>

As Table 7 shows, boys have substantially higher prevalence rates of learning disabilities (8.6 percent) and emotional or behavioral problems (15.4 percent) than girls (4.4 and 11.3 percent, respectively). Gender differences in growth or development delays were not statistically significant.<sup>57</sup> Family structure is an important correlate with learning disabilities and emotional or behavioral problems (but not developmental delays), with the lowest rates occurring in families where both the biological mother and father are present.

Another perspective on child health comes from the core NHIS questionnaire on prevalence of activity limitation. As previously shown in Table A, 5.3 percent of children under 18 years of age had a limitation in major or outside activity in 1989. NCHS estimates that within this group, 2.3 percent of children under 5 years old and 6.4 percent of those in the 5-14 age group had such a limitation.<sup>58</sup> For children 5 to 17 years of age, NCHS defines major activity as attending school and, for children under 5, ordinary play.

As Table L shows, the 1984 SIPP measured disability among children under 18 years of age in terms of 1) a long-lasting physical condition that limited his or her ability to walk, run or play (2.0 percent), or 2) a long-lasting mental or emotional that limited his or her ability to learn or do regular schoolwork (0.9 percent). Between the two groups, the Census Bureau estimates that 1.9 million children under 18 years of age, or 3.1 percent of this population, had either one of the conditions (2.9 percent) or both of them (0.2 percent). The 1984 SIPP questions on disability status of children included fewer conditions than the 1988 NHIS Child Health Supplement and pertained to children who currently had the condition(s) as opposed to any time in their lives.

With additional detail, Table 8 shows that children who live in very low income households with less than \$600 per month were more likely to have one or both types of disability than their counterparts with \$3,000 and over (4.5 versus 2.6 percent). Mirroring the income-related rates, children in female headed households with no husband present were more likely than those living in a married couple family to have one or both conditions (also 4.5 versus 2.6 percent).

Total	With a Disability							
	Number	Percent	Physical Only		Mental or Emotional Only		Both Physical and Mental or Emotional	
			Number	Percent	Number	Percent	Number	Percent
62,445	1,916	3.1	1,241	2.0	536	0.9	139	0.2

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation, Current Population Reports, Series P-70, No. 8, Table 6.

**Elderly:** The 1984 NHIS Supplement on Aging (SOA), among other surveys, used ADL and IADL measures for studying the needs of non-institutionalized persons 65 years of age and over, including the elderly residents of board and care homes.<sup>59</sup>

This survey shows that 4.8 million elderly persons outside of institutions, or 18.2 percent of those 65 years of age and over, had at least one ADL limitation - in this case the ADL definition includes mobility (walking and getting outside) and continence as separate activities - and 4.7 million, or 17.8 percent of the elderly, had at least one IADL dependency.<sup>60</sup> A total of 6.7 million, or 25.4 percent of the elderly, had either an ADL or an IADL dependency, and 2.7 million, or 10.4 percent, had both<sup>61</sup>.

As Figure 8 shows, dependence in these activities, increased across the three age groupings: 65-74 years, 75-84 years, and 85 years and over, with the greatest rise occurring in the latter group. For persons 65-74 years, the proportion who were dependent ranged from 18 to 48 per 1,000 (2 percent to 5 percent) across the eight activities listed, while those in the 75-84 age group ranged in dependency from 37 to 97 per 1,000 persons (4 percent to 10 percent). The population 85 years and over ranged in dependency from 90 to 286 per 1,000 persons (9 percent to 29 percent), as much as six times higher than for the 65-74 age cohort.<sup>62</sup>

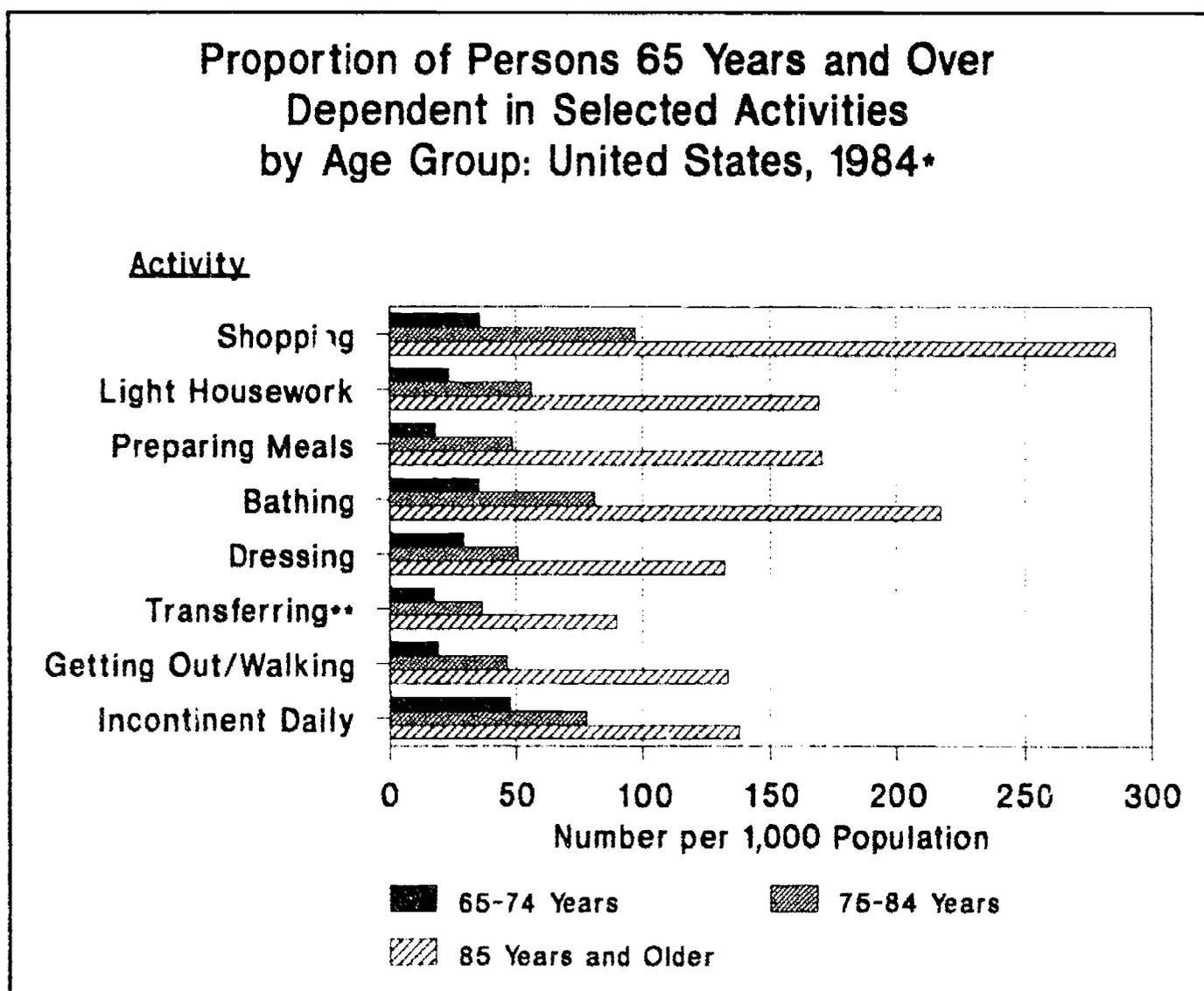


Figure 8

\* ADL and IADL definitions and measures vary among studies (see Table 6).

\*\* Getting into and out of bed or chair

Source: NCHS, 1984 NHIS, SOA, *Vital and Health Statistics*, 10(167).

Apart from the SOA, the core NHIS routinely collects ADL and IADL information on the elderly through two components of the survey. The first is the question on limitation in major activity, which for persons 70 years of age and older, is the ability to live independently (e.g., one combined ADL/IADL measure). As Table

A shows, 7.2 percent of those 70 years and over cannot perform such major activity and 12.3 percent are limited in the amount or kind they can do. The NHIS also asks two other global questions, one ADL and one IADL, of persons 60 to 69 years of age and any other person 5 to 59 years old reporting an activity limitation (as well as the elderly 70 years and older).<sup>63</sup> In addition, a recent analysis of the 1979-1980 NHIS Home Care Supplement provides a detailed analysis of ADL and IADL limitations across the life span.<sup>64</sup>

**Mental Health:** For prevalence estimates in the adult, non-institutionalized population, the National Institute of Mental Health uses the Epidemiological Catchment Area Survey (ECA) which covers a range of mental and emotional conditions, as presented in Figure 9 and Table 9. When the number of persons and time period include all persons who have ever had any type of mental disorder at any time in their lives (lifetime prevalence), NIMH estimates the figure to be 32.2 percent of the non-institutionalized population 18 years of age and over.<sup>65</sup> While nearly one-third reported at least one disorder during their lifetime, 19 percent reported one during the past six months, and 15 percent in any one month period, the latter measuring *current* prevalence rates. Substance use disorders had the highest lifetime prevalence, followed by anxiety disorders and affective disorders.

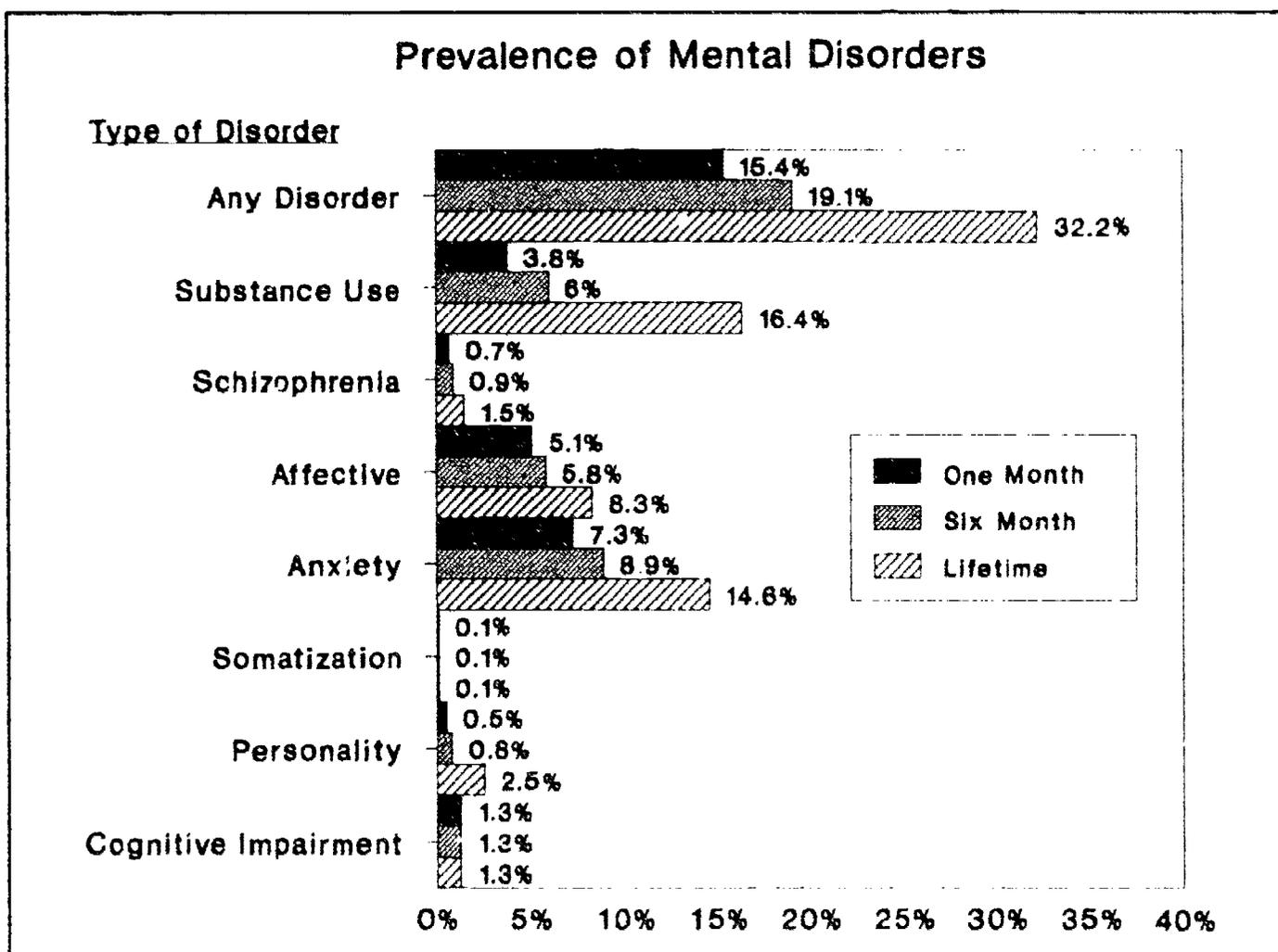


Figure 9

Source: Regier, D. A. et al., "One-Month Prevalence of Mental Disorders in the United States Based on Five Epidemiological Catchment Area Sites," *Archives of General Psychiatry* (1988), 961.

As opposed to the ECA which measured prevalence of mental disorders, regardless of severity, the 1980 NHIS Mental Health Supplement collected data on the prevalence of *severe and persistent* mental illness. Based on a preliminary analysis of these data, the National Institute of Mental Health (NIMH), which sponsored the supplement, estimates that 3.3 million non-institutionalized persons 18 years of age and over, currently have a severe mental illness. Of these, between 2.2 and 2.8 million are currently disabled as a result.<sup>66</sup>

**Mental Retardation and Developmental Disabilities:** Developmental disabilities include mental retardation, cerebral palsy, autism, epilepsy, and other neurologically-based conditions such as dyslexia.<sup>67</sup> At any given point in time, approximately one percent of the population is mentally retarded, with or without related developmental disabilities; of these, 15 percent are in institutions and the remaining 85 percent live with their families or otherwise independently.<sup>68</sup> The Association of Retarded Citizens (ARC) estimates that three percent of the population, or 6.6 million persons, will develop mental retardation at some point in their lives.<sup>69</sup> In terms of severity, ARC estimates that of this number, 89.0 percent will have a mild level of retardation, 6.0 percent moderate, 3.5 percent severe and 1.5 percent profound.

**Self-Perception among Persons with Disabilities:** The International Center for the Disabled (ICD), in cooperation with the National Council on the Handicapped, sponsored a Louis Harris poll on self-perception among persons with and without a disability. Respondents reported if they were 1) very satisfied, 2) somewhat satisfied, 3) neither satisfied nor dissatisfied, 4) somewhat dissatisfied, 5) very dissatisfied, or 6) very dissatisfied with life. The population with a disability was more than three times as likely to be "somewhat dissatisfied" than their counterparts without a disability (16 percent versus 5 percent), and eight times more likely to be "very dissatisfied" (8 percent versus 1 percent) (see Tables 11 and 12).

### **Chronic Conditions Causing Disability**

In addition to presenting the prevalence of activity limitation in general (e.g., Table A), NCHS collects information on the particular condition(s) causing the activity limitation. Clear patterns emerge about which conditions are most responsible for disability, and two tables show this causal relationship.

The first, Table M, identifies the 15 chronic conditions causing the greatest number of activity limitations, i.e., affecting the greatest *number* of persons. This is a function of both the number of conditions persons report and the degree to which the conditions cause an activity limitation. This is broken down by the *main cause* a person reports, and *all causes* since persons often report more than one. For conditions which are the main cause, the count equals the number of persons because there can be only one per individual. For all causes, the count exceeds the number of persons because an individual may report more than one condition. Many persons with an activity limitation (at least 40 percent) report multiple causal conditions, and, for this reason, focusing on all causes presents the most complete picture of the relationship between chronic conditions and disability.<sup>70</sup> In this regard, the conditions causing the greatest number of activity limitations are orthopedic impairments of the upper and lower extremities, back and spine; arthritis; and heart disease.

While these are the most prevalent causes of an activity limitation, they are not the most disabling conditions. Table N provides another perspective by showing the conditions causing the greatest *percentage* limitation (i.e., the highest rate of disability among those who have the condition). As the table illustrates, the highly disabling conditions are of low prevalence, affecting a relatively small number of persons. The conditions which most often cause a disability among those who have them are mental retardation, absence of leg(s), and lung or bronchial cancer. This table also shows the extent to which the condition causes an ADL or IADL limitation, based on one, global question asked in this regard on the NHIS. The conditions causing the greatest percentage (not number) of ADL or IADL limitations are multiple sclerosis, absence of legs, blindness in both eyes, and lung/bronchial cancer. Refer to the detailed listing in Table 13 to put these conditions in perspective, especially where individual ones are combined under categories, such as orthopedic impairments or heart disease.

Main Cause	Prevalence 1,000s	%	Main Cause	Prevalence 1,000s	%
All Conditions	32,540	100.0	All Conditions	52,718	100.0
Orthopedic Impairments	5,220	16.0	Orthopedic Impairments	6,987	13.3
Arthritis	4,000	12.3	Arthritis	6,130	11.6
Heart Disease	3,736	11.5	Heart Disease	5,575	10.6
Visual Impairments	1,438	4.4	Hypertension	3,506	6.6
Intervertebral Disk Disorders	1,424	4.4	Visual Impairments	2,900	5.6
Asthma	1,411	4.3	Diabetes	2,111	4.0
Nervous Disorders	1,289	4.0	Mental Disorders	1,837	3.5
Mental Disorders	1,284	3.9	Asthma	1,783	3.4
Hypertension	1,239	3.8	Intervertebral Disk Disorders	1,699	3.2
Mental Retardation	947	2.9	Nervous Disorders	1,601	3.0
Diabetes	885	2.7	Hearing Impairments	1,405	2.6
Hearing Impairments	813	2.5	Mental Retardation	1,047	2.0
Emphysema	649	2.0	Emphysema	994	1.9
Cerebrovascular Disease	610	1.9	Cerebrovascular Disease	939	1.8
Osteomyelitis/Bone Disorders	360	1.1	Abdominal Hernia	595	1.1

Source: LaPlante, M. P., *Disability Risks of Chronic Illness and Impairments*. Disability Statistics Report 2 (National Institute on Disability and Rehabilitation Research, 1991), 3.

Note: Nervous disorders include epilepsy, multiple sclerosis, Parkinson's disease, and other nervous disorders. Mental disorders include schizophrenia and other psychoses, neuroses, personality disorders, other mental illness, alcohol and drug dependency, senility, and special learning disorders (mental deficiency is not included). Content of other condition categories is described in the source document.

Chronic Condition	Number of Conditions (1,000s)	Percent Causing Activity Limitation	Rank	Percent Causing Major Activity Limitation	Rank	Percent Causing Need for Help in Basic Life Activities	Rank
Mental Retardation	1,202	84.1	1	80.0	1	19.9	9
Absence of Leg(s)	289	83.3	2	73.1	2	39.0	2
Lung or Bronchial Cancer	200	74.8	3	63.5	3	34.5	4
Multiple Sclerosis	171	70.6	4	63.3	4	40.7	1
Cerebral Palsy	274	69.7	5	62.2	5	22.8	8
Blind in Both Eyes	396	64.5	6	58.8	6	38.1	3
Partial Paralysis in Extremity	578	59.6	7	47.2	7	27.5	5
Other Orthopedic Impairments	316	58.7	8	46.2	8	14.3*	12
Complete Paralysis in Extremity	617	52.7	9	45.5	9	26.1	6
Rheumatoid Arthritis	1,223	51.0	10	39.4	12	14.9	11
Intervertebral Disk Disorders	3,987	48.7	11	38.2	14	5.3	-
Paralysis in Other Sites (Complete/Partial)	247	47.8	12	43.7	10	14.1*	13
Other Heart Disease/Disorders <sup>+</sup>	4,708	46.9	13	35.1	15	13.6	14
Cancer of Digestive Sites	228	45.3	14	40.3	11	15.9*	10
Emphysema	2,074	43.6	15	29.8	-	9.6	15
Absence of Arms(s)/Hand(s)	84	43.1	-	39.0	13	4.1*	-
Cerebrovascular Disease	2,599	38.2	-	33.3	-	22.9	7

\*Figure has low statistical reliability or precision (relative standard error exceeds 30 percent).

<sup>+</sup> Heart failure (9.8%), valve disorders (15.3%), congenital disorders (15.0%), all other and ill-defined heart conditions (59.9%).

Source: LaPlante, M. P., *Disability Risks of Chronic Illness and Impairments*. Disability Statistics Report 2 (National Institute on Disability and Rehabilitation Research, 1991), 8.

One important limitation of these data is their reliance on self-reporting and proxy responses for those not present, unable to respond, or under the age of 17. For example, a wife may respond for her husband who is at work during the interview. Respondents who are either unfamiliar with or unaware of the chronic conditions can misrepresent or fail to report them. For example, the prevalence of diabetes in the National Health Interview Survey is about half the number identified as actually existing from the National Health and Nutrition Examination Survey which employs a combined personal interview and physical exam.<sup>71</sup>

Reporting in the National Health Interview Survey is also influenced by the stigma associated with the condition. As an illustration, respondents underreport, and the figures understate, the prevalence of mental retardation.<sup>72</sup> Fortunately, while the particular chronic condition counts many vary because of these factors, self-reporting of activity limitation, especially work-related ones, regardless of the cause, are judged reasonably accurate by disability experts.<sup>73</sup>

While a source of error, the difference between reported and diagnosed prevalence of diseases also provides useful information for policy analysis and planning purposes. For example, this difference between reported and diagnosed diabetes has remained essentially constant over time, showing that little change has occurred in the population's knowledge of this condition and suggesting a need for intervention to address the awareness problem. By the same token, there is also a difference between reported and diagnosed high blood pressure; however, this difference has decreased over time suggesting a heightened awareness on the part of the population concerning hypertension.<sup>74</sup>

#### **Disability, Health Status and Health Care Utilization**

As described, above, one correlate with disability is the extent to which persons use health-related services provided by physicians and hospitals and experience restricted activity, including bed disability. The following data are from the 1984 SIPP (see Tables 16 - 19 for NHIS data on this subject). As Table O shows, over half (54.5 percent) of those making 20 or more doctor visits had a functional limitation, as did nearly two-thirds (63.7 percent) of those with two or more hospital visits, and almost three-quarters (73.2 percent) of those spending more than 20 days in a hospital in the previous year.

Stated another way, 8.6 percent of the population with a functional limitation and 13.5 percent with a severe limitation made 20 or more visits to the doctor during the previous 12 months, compared to only 1.9 percent for those without a functional limitation. In terms of hospital visits, 8.6 percent with a functional limitation and 14.5 percent with a severe limitation had two or more hospital visits in the past twelve months, compared to 1.3 percent for those without a functional limitation. Regarding length of stay for those hospital visits, 5.1 percent of those with a functional limitation and 9.7 percent of those with a severe one stayed a total of 21 or more days, compared to 0.5 percent for those without a functional limitation.

Table P shows that disability days, during which there was a reduction in a person's activity such as work loss or bed-disability, are also highly correlated with functional limitation. Nearly 87 percent of those with 60 or more disability days in the previous year had a functional limitation. In terms of disability status, 5.3 percent of those with a functional limitation had 60 or more disability days, compared to 12.2 percent for those with a severe limitation and only 0.2 percent for those without a functional limitation.

Characteristic	Total	With a Functional Limitation			
		Total		Severe	
		Number	Percent	Number	Percent
Total	180,987	37,304	20.6	13,537	7.5
Number of Doctor Visits in Past 12 Months					
None	56,676	6,268	11.1	1,518	2.7
1 to 3	75,579	11,536	15.3	3,108	4.1
4 to 7	25,883	8,650	33.4	3,306	12.8
8 to 11	7,323	2,728	37.3	1,275	17.4
12 to 19	9,634	4,912	51.0	2,508	26.0
20 or more	5,883	3,213	54.5	1,822	30.9
Number of Hospital Visits in Past 12 Months					
None	159,197	28,392	17.8	8,879	5.6
1	16,782	5,722	34.1	2,700	16.1
2 or more	5,008	3,190	63.7	1,958	39.1
Number of Days in Hospital in Past 12 Months					
None	159,197	28,392	17.8	8,879	5.6
1 to 3	7,858	1,918	24.4	679	8.9
4 to 7	6,522	2,241	34.4	1,045	16.0
8 to 20	4,812	2,852	59.3	1,601	33.3
21 or More	2,597	1,901	73.2	1,314	50.6

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation, Current Population Reports, Series P-70, No. 8, Table 1.

Characteristic	Total	With a Functional Limitation			
		Total		Severe	
		Number	Percent	Number	Percent
Total	180,987	37,304	20.6	13,537	7.5
Number of Disability Days in Past 12 Months					
None	137,960	23,905	17.3	7,233	5.2
1 to 3	24,266	4,184	17.2	1,168	4.8
4 to 9	9,637	3,207	33.3	1,312	13.6
10 to 29	5,538	3,128	56.5	1,583	28.6
30 to 59	1,298	897	69.1	590	45.5
60 or More	2,288	1,983	86.7	1,652	72.2

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation, Current Population Reports, Series P-70, No. 8, Table 1.

## Work Disability

The passage of the *Americans with Disabilities Act* (ADA) has focused increased attention on the issue of work disability. ADA's provisions for reasonable accommodation and safeguards to limit discrimination against persons with disabilities, already required of federal funds recipients, will now extend to virtually all employers (see Appendix).

The scope of the ADA is not limited to the work place, given the components of the law addressing access by persons with disabilities to a range of services provided to the public by either governmental or private entities. Clearly, however, the employment implications of the law are profound, highlighting work disability as an important issue area. In this regard, several of the tables identify the numbers and characteristics of persons who are limited in their ability to work or unable to do so because of a disability. These figures include severity, occupation, industry, and demographic characteristics of persons with a work disability, highlighting the major patterns and changes over time.

### Prevalence and Characteristics of Persons with a Work Disability

Several national surveys collect data on the prevalence of work disability, and Tables Q - V and 22 - 25 present summaries of these. One recent source is the Current Population Survey (CPS) conducted by the Census Bureau in 1988. As its primary method for collecting this information, the CPS asks if a person has a health problem or disability which prevents them from working or limits the kind or amount of work they can do, among other questions. Specifically, the Census Bureau classified persons as having a work disability if they met any of the following criteria:

1. has a health problem or disability which prevents them from working or which limits the kind or amount of work they can do;
2. has a service connected disability or ever retired or left a job for health reasons;
3. has a long term physical or mental illness or disability which prevents the performance of any kind of work;
4. did not work at all in the previous year because ill or disabled;
5. under 65 years of age and covered by Medicare; or
6. under 65 years of age and a recipient of Supplemental Security Income (SSI).

The Census Bureau further classified a person as having a severe work disability if any of items 3 through 6 applied. Using these criteria, the Census Bureau estimates that 13.4 million persons or 8.6 percent of the population 16 to 64 years of age had a work disability in 1988, of which 7.5 million or 4.8 percent had a severe one, as Table Q shows. The comparable rates for males were 8.7 percent and 4.9 percent, while for females they were 8.4 percent and 4.6 percent, respectively, for the total and severe work disability counts. Implicit in this severity ranking is a third classification for those with a non-severe work disability of 3.8 percent for both males and females.

Characteristics	Total Population 16 to 64 Years Old	Persons with a Work Disability (Numbers in Thousands)			
		Total		Severe	
		Number	Percent	Number	Percent
Total	156,542	13,420	8.6	7,457	4.8
Male	76,716	6,706	8.7	3,791	4.9
Female	79,826	6,714	8.4	3,666	4.6

Source: U.S. Bureau of the Census, 1988 Current Population Survey, Current Population Reports, Series P-23, No. 160, Table 3.

**Labor Force Participation:** Of particular significance is the manner in which work disability affects one's participation in the labor force at all. The labor force includes employed persons and those who are unemployed looking for work. As shown in Table R, only 35.7 percent of males and 27.5 percent of females with a work disability were in the labor force, compared to 88.9 and 69.5 percent of males and females, respectively, who have no work disability. Males and females with a work disability, each, had an unemployment rate of 14.2 percent. Males and females with no work disability had an unemployment rate of only 6.2 percent and 5.2 percent, respectively. Only 23.4 percent of males and 13.1 percent of females with a work disability were employed full time, compared to 74.8 percent for males and 47.1 for females without a work disability.

Sex	With a Work Disability			With No Work Disability		
	Percent		Unemployment Rate	Percent		Unemployment Rate
	In Labor Force	Employed Full Time		In Labor Force	Employed Full Time	
Males	35.7	23.4	14.2	88.9	74.8	6.2
Females	27.5	13.1	14.2	69.5	47.1	5.2

Source: U.S. Bureau of the Census, 1988 Current Population Survey, Current Population Reports, Series P-23, No. 160, Table F.

As with other types of activity limitation, work disability has a high, direct correlation with age and minority status, and a strong inverse relationship with education and income, as Table S shows. These figures, and the ones which follow, also demonstrate that persons with a work disability have a relatively low representation in well-paying professional positions and derive fewer benefits from traditional avenues of advancement, such as education, than their counterparts without a work disability.<sup>75</sup>

**Age:** The prevalence of work disability increased progressively with age, more than doubling between the 45 to 54 and the 55 to 64 age groups, from 10.3 percent to 22.3 percent. Persons in the 16 to 24 age group had a work disability rate of 3.8 percent, nearly six times lower than their counterparts 55 to 64. Severity of the work disability increased with age as well. For the 16 to 24 age group, 1.7 percent had a severe work disability compared to 14.0 percent for those 55-64 years of age.

The traditional retirement age of 65 notwithstanding, many persons 65 years and older wish to continue working. Of all persons age 65 to 74 years, 20.8 percent of the males and 11.2 percent of the females were employed, but

this was significantly influenced by work disability. Elderly males without a work disability had an employment rate of 25.5 percent, while only 8.1 percent with a work disability held a job. The corresponding figures for elderly females were 13.8 and 3.5 percent, respectively.<sup>76</sup>

Table S: Percent of Persons 16 to 64 Years Old with a Work Disability, by Selected Characteristics: 1988		
Characteristics	Percent Distribution Both Sexes	
	Total	Severe
Total	8.6	4.8
Age		
16 to 24 years	3.8	1.7
25 to 34 years	5.6	2.7
35 to 44 years	7.1	3.6
45 to 54 years	10.3	6.0
55 to 64 years	22.3	14.0
Years of School Completed <sup>1</sup>		
Less than 8 years	29.7	23.4
8	24.6	16.8
9 to 11	17.7	11.6
12	8.8	4.5
13 to 15	7.5	3.2
16 or more	3.8	1.3
Income to Poverty Ratio		
Less than 1.00	21.9	15.5
1.00 to 1.24	17.8	12.4
1.25 to 1.49	13.4	8.3
1.50 to 1.99	11.3	6.9
2.00 and over	5.6	2.4
Race and Hispanic Origin <sup>2</sup>		
White	7.9	4.1
Black	13.7	9.9
Hispanic origin	8.2	5.6

<sup>1</sup>Universe is persons 25 to 64 years old.

<sup>2</sup>Persons of Hispanic origin may be of any race.

Source: U.S. Bureau of the Census, 1988 Current Population Survey,  
Current Population Reports, Series P-23, No. 160, Table 3.

**Income:** When viewing financial information, both individual earnings and family income are important measures. The former consists of the wages and salaries paid to a worker while the latter consists of incomes from all sources including other family members who have no work disability. This distinction is important because variations in earnings related to work disability may be concealed when including income of other persons in the family.

In terms of 1987 average earnings for persons 16 to 64 years of age, males with a work disability earned 36 percent less than their counterparts without a work disability (\$15,497 versus \$24,095), while the corresponding figure for females was 38 percent (\$8,075 versus \$13,000) (see Table 24). These figures included part time employees and

persons not working year-round. For those employed year-round and full-time, the earnings differences between those with and without a work disability were 20 percent for males (\$24,200 versus \$29,994) and 16 percent for females (\$15,796 versus \$18,894).

According to the Census Bureau, this earnings disparity worsened between 1980 and 1987.<sup>77</sup> To explain changes over time, the relationship between earnings of persons with and without a work disability can be expressed as a ratio of the former to the latter. The higher the ratio, the closer the earnings are to each other, with "1" denoting identical amounts, and .75 meaning that persons with a work disability earn three-quarters of the amount earned by those without a work disability (or 25 percent less). Between 1980 and 1987, the ratio for males dropped from .77 to .64 for all workers and from .91 to .81 for year-round, full-time workers. The comparable figures for females were .69 to .62 for all workers and .88 to .84 for year-round, full-time workers, this latter change being too small, by Census Bureau calculations, to satisfy statistical tests of significance for the numbers of persons in the sample. Of particular significance during this 1980-1987 period is the increase in the number and percentage of (i.e., demand for) females in the labor force, which tends to counter the negative effects of work disability.

Unlike Table 24 which deals only with workers' earnings, Tables S and 22 present the overall financial condition of persons with a work disability, whether or not they are employed or in the labor force, and including income from all family members and sources. Of particular significance in this regard is the link between work disability and poverty. In the CPS, the Census Bureau compares the family income to the official poverty threshold, and a ratio of less than one means the family income is below that threshold. Conversely, the Bureau considers a ratio of 2 and above (at least twice the poverty threshold) to represent a more comfortable family income than other ratios shown in the table.

Table S shows that 21.9 percent of the population 16 to 64 years of age who were below the poverty level had a work disability, compared to just 5.6 percent of the population with family incomes at least twice that level (a ratio of 2 or more). The near poor, those with family incomes between 1 and 1.24 times the poverty level, had a work disability rate of 17.8 percent. Calculated another way, 28.2 percent of persons with a work disability have family incomes below the poverty level as opposed to only 9.4 percent of those without a work disability, nearly a three-fold difference.

**Education:** Low educational attainment is strongly associated with work disability, however, this pattern varies by demographic group. As with other factors, the interrelationship between education and work disability may very well be a dual one, with disability as both the cause and the effect of the level of schooling; however, the data cannot show the extent to which each of these relationships is true.<sup>78</sup> Causality notwithstanding, persons completing less than eight years of school are more than eight times as likely to have a work disability than college graduates. The difference relative to education increase with the severity of the work disability. Persons with less than eight years of schooling have a severe work disability rate which is 18 times higher than for college graduates.

Yet increases in educational attainment, alone, do not always counter the effects of work disability such as reduced earnings. For example, males with a work disability receive fewer advances in earnings when they do complete college than males without a work disability.<sup>79</sup> This means that males with a work disability have a dual limitation of relatively low levels of education in general and relatively small increases in earning when they do overcome this first barrier. The sample sizes for females, especially involving college graduates with a work disability, were too small to draw statistically significant conclusions in this regard.

**Ethnicity:** Race and Hispanic origin have a high correlation with work disability rates, at 13.7 percent for blacks, 8.2 percent for Hispanics, and 7.9 percent for whites, in the 16 to 64 age group. These differences increased with the severity of the disability, with blacks having over twice the rate of a severe work disability as whites (9.9 versus 4.1 percent). Hispanics had a severe work disability rate of 5.6 percent, compared to 4.1 percent for whites, despite the fact that overall work disability rates for these two groups were very similar.

## Employment by Occupation and Industry

As Table T shows, the CPS also provides information on work disability according to the person's occupation (e.g., managerial, sales, etc.) and industry (e.g., manufacturing, professional services, etc.). As distinguished from earlier work disability tables, these figures, by definition, exclude persons who are unemployed or not part of the labor force. Distinctions in employment by work disability status were far more prevalent for occupations than for industries, and certain occupation groups exhibited a much greater variation than others. For example, persons with a work disability were far less likely to be employed in managerial and professional specialty positions than their counterparts without a work disability. While 18.2 percent of males and 16.0 percent of females with a work disability held these positions, the rates rose to 26.3 percent and 25.6 percent, respectively, for males and females with no work disability.

Occupation and Industry	With a Work Disability		Without a Work Disability	
	Male	Female	Male	Female
<b>Occupation Group</b>	100.0%	100.0%	100.0%	100.0%
Managerial and professional specialty	18.2%	16.0%	26.3%	25.6%
Technical, sales, and administrative support	17.5%	39.5%	19.9%	45.3%
Service	12.5%	27.3%	9.2%	17.0%
Farm, forestry, and fishing	4.6%	1.4%	3.7%	0.8%
Precision, production, craft, and repair	19.6%	2.2%	19.8%	2.2%
Operators, laborers, and fabricators	27.4%	13.3%	20.9%	8.7%
<b>Industry Group</b>	100.0%	100.0%	100.0%	100.0%
Agriculture	3.9%	1.9%	3.3%	1.1%
Forestry and fishing	.2%	.1%	0.1%	.
Mining	1.1%	.	0.9%	0.3%
Construction	12.6%	1.1%	10.2%	1.1%
Manufacturing	21.0%	12.2%	23.5%	13.7%
Transportation, Communications, and other public utilities	9.2%	3.8%	9.3%	4.2%
Wholesale trade	5.2%	1.8%	5.3%	2.4%
Retail Trade	11.4%	19.3%	14.7%	18.9%
Finance, insurance, and real estate	4.5%	7.2%	4.7%	9.5%
Services	25.7%	47.3%	22.4%	43.7%
Public administration	4.7%	4.8%	5.0%	4.5%

Source: U.S. Bureau of the Census, 1988 Current Population Survey, Current Population Reports, Series P-23, No. 160, Table 6.

Men with a work disability were more likely to work as operators, laborers, and fabricators (27.4 percent) and in service occupations (12.5 percent) than their counterparts with no work disability (20.9 and 9.2 percent, respectively). Men with a work disability were somewhat less likely to be employed in technical, sales, and administrative support positions (17.5 percent) than those with no work disability (19.9 percent).

Women with a work disability were more likely to be employed in service occupations (27.3 percent) and as operators, laborers, and fabricators (13.3 percent) than those without a work disability (17.0 and 8.7 percent, respectively). Women with a work disability were less likely to be employed in technical, sales, and administrative support positions (39.5 percent) than those without a work disability (45.3 percent).

Work disability data according to occupation and industry also come from the National Health Interview survey, measured as an *activity limitation*, when the major activity is work. In addition to confirming the types of relationships in the CPS, the National Center for Health Statistics in its analysis of data for the years 1983-1985 found that employment patterns among the individual occupations and industries vary little by work disability status for persons with family incomes at or above \$25,000.<sup>80</sup>

**Health Insurance Coverage:** Related to the issue of work disability is coverage by employer-provided health insurance. As shown earlier, physician visits and hospitalization rates are higher for persons with a functional limitation, which makes health coverage an extremely important issue for persons with a disability. While nearly two-thirds (65.9 percent) of males with no work disability were covered by employer-provided health insurance, only about half (52.1 percent) of those with a work disability had such coverage. This distinction held for females, blacks and whites, except for those of Hispanic origin, where there was little distinction in coverage based on work disability status. The latter is possibly explained by the low overall rate of coverage by employer health insurance plans for Hispanics.<sup>81</sup>

#### **Work Disability by Functional Limitation Status**

The 1984 SIPP collected data on both functional limitations and work disability status among respondents, and for this reason comparisons are possible between these two domains. As previously stated, disability is multi-dimensional, and persons with a functional limitations such as walking or hearing may not have a work disability, depending on job requirements and an employer's accommodation, as well as training, education, work history, and other factors.<sup>82</sup> For example, of the 8.9 million *working* persons 16 to 64 years of age who had a non-severe functional limitation, less than one-third (30.2 percent) had a work disability.<sup>83</sup> Of the 1.5 million working persons with a severe functional limitation, over one-third (36.7 percent) had no work disability at all. These figures do not include persons with a work disability who are unemployed or discouraged workers who have left the labor force altogether. When considering all labor force statuses, including persons who are unemployed or out of the labor force, the distinction between functional limitation status and work disability decreased, but remained significant. Of the 15.7 million persons 16 to 64 years of age with a non-severe functional limitation, less than half (43.5 percent) had a work disability. For the 6.0 million in this age group with a severe functional limitation, there were still 16.1 percent with no work disability.

#### **Chronic Conditions Causing Work Disability**

The 1984 Survey of Income and Program Participation also provides prevalence statistics the individual chronic conditions mainly responsible for work disability. As Table U shows, for the population 16 to 72 years of age, the conditions most often responsible for work disability are back or spine problems (19.0 percent), heart trouble (15.2 percent), arthritis or rheumatism (11.6 percent), respiratory problems (7.2 percent), stiffness or deformity of limbs or extremities (4.5 percent), and high blood pressure (4.2 percent). In the survey, each respondent indicated which one condition was mainly responsible for the work disability; so the numbers and percentages can be added without duplication.

The 1984 SIPP used a somewhat different chronic condition nomenclature than the NHIS; however, these work disability figures follow a pattern similar to Table M on all types of activity limitation.

Table U: Conditions Mainly Responsible for Work Disability, 1984 (Persons 18 to 72 years with a work disability) Population Base=23,514,000	
Condition	Percent Distribution
Total	100.0
Arthritis or rheumatism	11.6
Back or spine problems	19.0
Blindness or poor vision	2.9
Cancer	2.0
Deafness or poor hearing	1.5
Diabetes	3.4
Heart trouble	15.2
Hernia	1.1
High blood pressure	4.2
Kidney problem	1.0
Respiratory problems	7.2
Mental illness	1.8
Mental retardation	2.6
Missing limbs or extremities	0.8
Nervous or emotional problems	2.7
Paralysis	1.3
Senility or Alzheimer's disease	0.3
Stiffness or deformity of limbs or extremities	4.5
Stomach trouble	1.6
Stroke	2.4
Thyroid trouble	0.2
Tumor or growth	0.5
Other or not reported	12.2

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation, Current Population Reports, Series P-70, No. 19, Table 9.

### Occupational Injuries and Illnesses

Job-related injuries and illnesses, both acute and chronic, are another component of work disability, as measured by the U.S. Department of Labor in an annual survey of employers. The survey shows nearly 6.3 million cases of occupational injuries and 284,000 cases of occupational illnesses occurring in 1989, for a total rate of 8.6 injury and illness cases per 100 full-time workers (see Table V). One tool for monitoring the severity of these cases is the incidence rate for lost workdays, computed as the number of workdays lost per 100 full-time workers. This includes the number of days employees were either away from work or restricted in their work activity due to

injuries and illnesses. Across all industry divisions, the lost workday rate was 78.7 in 1989. Table V shows the 1973 - 1989 trend in total cases of job-related illness and injury relative to the lost workdays involved. While the number of cases per 100 full-time workers decreased from 11.0 to 8.6 during this period, the corresponding workday loss increased from 53.3 to 78.7 due to a significant increase in the lost days per case. Another measure of severity is the number of lost workday cases relative to the total.<sup>84</sup> Approximately 46 percent of the all cases of injury and illness resulted in lost workdays in 1989, an increase from the 31 percent in 1973. The association between an illness (as opposed to an injury) and the work place may be difficult to make, especially regarding long-term latent ones, and for this reason the Department of Labor believes the illness figures (which are incorporated into the overall table rates) are understated.

Year	Total Cases	Lost Workday Cases	Lost Workdays
1973	11.0	3.4	53.3
1974	10.4	3.5	54.6
1975	9.1	3.3	56.1
1976	9.2	3.5	60.5
1977	9.3	3.8	61.6
1978	9.4	4.1	63.5
1979	9.5	4.3	67.7
1980	8.7	4.0	65.2
1981	8.3	3.8	61.7
1982	7.7	3.5	58.7
1983	7.6	3.4	58.5
1984	8.0	3.7	63.4
1985	7.9	3.6	64.9
1986	7.9	3.6	65.8
1987	8.3	3.8	69.9
1988	8.6	4.0	76.1
1989	8.6	4.0	78.7

Source: U.S. Bureau of Labor Statistics, News, USDL-90-582, BLS Reports on Survey of Occupational Injuries and Illnesses in 1989, U.S. Department of Labor, Washington, D.C. 1990. Table 6.

## Disability in Long-Term Care Facilities

The National Health Interview Survey and other household studies do not cover residents of institutions, which results in the exclusion of data on persons with the most severe disabilities. For this reason, the *Digest* also includes data from several studies of the institutional population, including nursing homes, mental health inpatient facilities, and institutions for the mentally retarded.

### Nursing Home Residents

The 1985 National Nursing Home Survey, another NCHS effort, included all types of nursing and related care homes with three or more beds set up and staffed for use by residents and routinely providing nursing and personal care services. Among the 19,100 nursing homes in the United States in 1985, there were 1,491,400 residents, as Table W shows. Of these persons, virtually all (88 percent) were 65 years of age or over, representing approximately 5 percent of the total elderly population. This rate of institutionalization at any point in time increases with age, rising to 22 percent for those 85 years of age and over. Compared to studies in 1973-74 and 1977, this *percentage* has remained virtually unchanged; although the numbers of persons 85 and over have decreased from 257 per 1,000 residents (25.7 percent) to 220 per 1,000 (22.0 percent) since 1973-74. The reasons for a decline in use among those with the highest nursing home utilization rates are unknown; however, they may be a function of competition due to lower vacancy rates than in the past.<sup>86</sup> The median length of stay was 1.7 years and the mean was 2.9 years, the latter not varying by either sex or race; however, persons under 65 had longer mean stays (3.6 years) than their elderly counterpart (2.8 years).<sup>87</sup>

The National Nursing Home Survey used "dependency in activities of daily living" to measure disability, as presented in Table W. Over three-fourths of the residents required assistance in bathing and dressing, and over half needed help with the remaining activities, with the exception of eating where nearly 40 percent required assistance.

Table W: Number and Percent of Nursing Home Residents by Dependency in Activities of Daily Living (ADL): United States, 1985		
ADL	Number	Percent
Requires assistance in bathing	1,323,200	88.7
Requires assistance in dressing	1,124,600	75.4
Requires assistance in using toilet room	907,600	60.9
Requires assistance in transferring*	893,400	59.9
Has difficulty with bowel and/or bladder control	774,400	51.9
Requires assistance in eating	586,700	39.3
Total	1,491,400	100.0

\* Transferring - Getting into or out of a chair or bed.

Source: National Center for Health Statistics, 1985 National Nursing Home Survey, *Vital and Health Statistics*, Series 13, No. 102, Table 6.

Table X identifies the chronic conditions with the highest prevalence among nursing home residents. Heart disease, senile dementia or organic brain syndrome, cerebrovascular disease, arthritis or rheumatism, and essential hypertension were the most frequently occurring conditions. While not high prevalence conditions, Alzheimer's disease and other specified and unspecified degeneration of the brain had the highest average number of ADL dependencies at 4.9, followed by Parkinson's disease with 4.6. High prevalence conditions which also had a high

number of ADL dependencies were senile dementia or organic brain syndrome and cerebrovascular disease, each with 4.5 average ADL dependencies.<sup>88</sup>

Table X: Number of Chronic Conditions with the Highest Prevalence among Nursing Home Residents: United States, 1985			
Condition	Rank	Number of Conditions per 1,000 Persons	Average Number of ADL Dependencies
Ischemic Heart Disease	1	241.5	3.7
Senile Dementia or Organic Brain Syndrome	2	233.7	4.5
Cerebrovascular Disease	3	182.1	4.5
Arthritis or Rheumatism	4	179.1	3.4
Essential Hypertension	5	156.4	3.3
Other Heart Disease	6	152.3	3.6
Diabetes Mellitus	7	124.2	3.7
Psychoses other than Senile Dementia	8	110.6	2.1
Congestive Heart Failure	9	106.8	3.5
Atherosclerosis	10	74.7	3.6
Chronic Obstructive Pulmonary Disease and Allied Conditions	11	68.4	3.0
Alzheimer's Disease and Other Specified and Unspecified Degeneration of the Brain	12	49.2	4.9
Malignant Neoplasms	13	48.1	3.9
Other Mental Disorders	14	47.9	2.0
Parkinson's Disease	15	47.4	4.6
Anemia	16	47.0	*
Urinary Tract Infection	17	38.9	*
Senility without Psychoses	18	38.5	*
Mental Retardation	19	33.9	2.6
Osteoporosis	20	32.9	*

\* Information not available

Source: National Center for Health Statistics, 1985 National Nursing Home Survey, *Vital and Health Statistics*, Series 13, No. 102, Tables 8 and 11.

Note: Rank and number of conditions per 1,000 persons pertain to all listed diagnoses; ADL dependency figures pertain to primary diagnosis.

In terms of severity of ADL limitation, Table Y shows the percentage distribution of nursing home residents who have from zero to six dependencies. Nearly 30 percent, or 431,700 residents, are dependent in all six categories, while nearly 10 percent, or 146,200 show no ADL dependency at all.<sup>89</sup>

Table Y: Percent of Nursing Home Residents by Number of Dependencies: United States, 1985	
Number of Dependencies	Percent Distribution
None	9.8%
1	11.2%
2	10.2%
3	7.7%
4	13.1%
5	19.1%
6	28.9%
Average Number of Dependencies	3.8 ADL Dependencies

Source: National Center for Health Statistics, 1985 National Nursing Home Survey, *Vital and Health Statistics*, Series 13, No. 102, Table 6.

### Mental Health Facilities and Organizations

Using the results of a sample survey, the National Institute of Mental Health publishes data on the numbers and characteristics of persons served by organizations designed primarily to provide mental health services.<sup>90</sup> These organizations include both residential treatment facilities and a range of outpatient and partial hospitalizations programs, consisting of the following:

- o state and county mental hospitals;
- o private psychiatric hospitals;
- o Veterans Administration medical centers;
- o non-federal general hospitals with separate psychiatric service(s);
- o residential treatment centers for emotionally disturbed children (RTC);
- o freestanding outpatient mental health clinics;
- o freestanding mental health partial care organizations; and
- o multi-service mental health organizations (including community mental health centers not operated as part of the above organizations).

Excluded from the NIMH data collection are private office-based practices of psychiatrists, psychologists, and other providers; psychiatric services of all types of hospitals or outpatient clinics operated by federal agencies other than the Department of Veterans Affairs (e.g., Public Health Service, Indian Health Service, Department of Defense, Bureau of Prisons); general hospitals which have no separate psychiatric services but admit psychiatric patients to non-psychiatric units, and psychiatric services of schools, colleges, halfway houses, community residential organizations, local and county jails, state prisons, and other human service providers.

For presentation purposes, NIMH categorizes mental health organizations as inpatient care (24 hour care in a mental hospital setting), outpatient care (ambulatory services for less than three hours at a single visit), and partial care (planned program of treatment generally in visits of three or more hours). The following data focuses primarily on the inpatient component of mental health services.

As Table 30 shows, in 1986 the average daily *inpatient* census for all surveyed mental health organizations was 228,530 persons in 3,039 organizations providing residential treatment. NIMH divides the mental health inpatient population into two groups for analysis. The first is patients *under care*, which represents the long-term institutional caseload. NIMH estimates there were 160,862 persons in this category as of April 1, 1986 (Table 31).

The second group consists of annual *admissions*, and there were 1.6 million persons admitted during 1986. The large difference results from a short median length of stay, only 15 days, confirming the distinct nature of the *under care* population relative to the vast majority of inpatients, who are not part of the long-term caseload.

Among the five inpatient NIMH facility and organization categories, state and county mental hospitals accounted for 59 percent of the patients under care, followed by general hospitals at 20 percent. A reversal of this relationship exists for admissions, with general hospitals accounting for 50 percent of admissions during 1986 and state and county mental hospitals accounting for 20 percent. This shows that a major portion of long-term mental health care is provided by state and county facilities, while general hospital mental health services address primarily short-term, acute care mental health needs.<sup>91</sup>

NIMH reported that of the 160,862 inpatients under care, 59 percent were male, 41 percent were female, 71 percent were white and 29 percent were from other racial groups. The corresponding figures for the sex and race of inpatient admissions presented a pattern similar to those under care. Of the 1.6 million admissions in 1986, 57 percent were male and 43 percent female, while 76 percent were white and 24 percent of other races.<sup>92</sup>

Nearly half (48 percent) of those under care were between the ages of 25 and 44 and almost one-fifth (19 percent) were between 45 and 64. The other age cohorts each comprised between 10 and 12 percent of the total inpatient population under care: under 18 years of age (10 percent), 18 to 24 (12 percent), and 65 and over (12 percent). While the total figures and those of state and county mental hospitals present similar patterns concerning age, race and sex, differences occur among the other types of facilities and organizations regarding inpatient care. For example, private psychiatric hospitals show only a four percentage point difference based on gender, with females outnumbering males 52 to 48 percent, and persons under 18 constituting the largest age group, at 41 percent.<sup>93</sup>

For admissions in 1986, the 25 to 44 age cohort was the largest at 52 percent followed by the 45 to 64 age group at 19 percent, reflecting a pattern similar to patients under care. However, the under 18, and 65 and over age cohorts were at 7 and 8 percent, respectively, which are lower than for the under care group. Those 18 to 24 years of age represented 14 percent of admissions.<sup>94</sup>

NIMH also collected data and reported on the principal psychiatric diagnosis for both patients under care and inpatient admissions, as Table 31 shows. For those under care, schizophrenia at 44 percent and affective disorders at 22 percent were the most frequently occurring. The same two were also most prevalent among admissions, but in the opposite order, with affective disorders at 31 percent and schizophrenia at 23 percent. For admissions, alcohol-related disorders constituted 15 percent, as compared to only 6 percent for those under care. The remaining conditions made up 15 and 20 percent of the patients under care and inpatient admissions, respectively.

NIMH also uses another measure of inpatient care - the rate per 100,000 civilian population - which provides a common denominator for comparison purposes. For patients under care, males had a relatively higher rate than females (82 versus 53), and whites had a lower rate than other races (56 versus 127). Within the "other races" category, the male-female difference was much greater than for the total mental health inpatient population under care (185 versus 75). Regarding age cohorts, the 25-44 group had the highest rate at 103, followed by those 18-24 years at a rate of 70, 45-64 years at a rate of 68, and under 18 at a rate of 26 per 100,000 civilian population. The median age was 34, which varied from 42 in VA medical centers to 22 in private psychiatric hospitals.<sup>95</sup>

For inpatient admissions per 100,000 civilian population, males at 790 had a higher rate than females at 551. For whites, the rate was 593 versus 1,074 for all other racial groups. The 25-44 age group constituted the highest rate per 100,000 for inpatient admissions at 1,119, followed by those 18-24 years of age at 802, and the 45-64 age group at 663. The elderly 65 and over had a rate of 447, and those under 18 had the lowest rate at 177 per 100,000 persons.<sup>96</sup>

*Outpatient* mental health organizations had 1.4 million persons under care and 2.1 million admissions during 1986. *Partial care* organizations had 133,194 persons under care and 156,912 admissions during that year.<sup>97</sup>

## Facilities for the Mentally Retarded

To further complement the statistics on disability from the various household surveys, Tables Z and 33 present information on persons with mental retardation in residential facilities. These data come from the 1987 National Medical Expenditure Survey (NMES) which, in addition to its household and nursing home components, includes persons who were residents of or had been admitted to facilities for the mentally retarded during calendar year 1987. (Another major source of information in this regard is the annual survey of such facilities conducted by the University of Minnesota Affiliated Program on Developmental Disabilities and summarized in Table 44).

Table Z shows a total of 211,712 persons resided in facilities for the mentally retarded in 1987 according to the NMES. Of these, 38.5 percent were in primarily large (16 beds or more) state institutions, 32.4 percent in large non-state facilities, and 29.1 percent in small (3-15 beds) non-state residential facilities. Of particular significance is that, unlike patterns in the past, less than half of the residents are in state-operated facilities; however, less than 30 percent of the total are in the small facilities which can serve as preferred alternative to the custodial focus of large institutions.<sup>98</sup>

As Table 33 shows, mental retardation is often placed under the rubric of developmental disabilities which includes other conditions such as epilepsy, autism, cerebral palsy and spina bifida. Not all persons with a developmental disability are mentally retarded; so the two types of conditions cannot be equated. For example, persons with the physical limitation caused by cerebral palsy may have no mental retardation at all. However, of the total number of persons in residential facilities for the mentally retarded, only a small percentage, 0.7%, have one or more of these other developmental disabilities, without mental retardation. Another 8.7 percent have neither mental retardation nor another developmental disability. Those without either type of condition are likely to be elderly or have mental health problems, in part because some facilities for the mentally retarded do not just serve persons with mental retardation.<sup>99</sup>

Persons who are mentally retarded often do have additional disabling conditions, including the other developmental disabilities, impairments and other chronic conditions, and ADL limitations. Of all residents in facilities for the mentally retarded, 35 percent had another developmental disability, nearly 20 percent had a visual impairment and almost 12 percent had a hearing impairment. Fifty-eight percent had difficulty talking while over 18 percent had other chronic physical health problems. In addition, nearly 64 percent had difficulty performing at least one activity of daily living such as bathing and dressing, while over one third had difficulty with three or more ADLs. Concerning the severity of retardation, 21.4 percent had borderline/mild, 20.9 percent moderate, 20.5 percent severe and 37.2 percent profound.

All Facilities	State Institutions	Other Residential Facilities	
		3-15 Beds	16 Beds or More
211,712 100.0%	81,442 38.5%	61,561 29.1%	68,709 32.4%

Source: Agency for Health Care Policy and Research, 1987 National Medical Expenditure Survey, Research Findings 6.

Of significance from a policy analysis and planning perspective is how and why these patterns vary among the different types of facilities, including state and private, large and small, as well as changes in these relationships which are occurring over time.<sup>100</sup> For example, Medicaid, an important source of funding for the poor, is

authorized for state operated intermediate care facilities certified for the mentally retarded (ICF-MR). In an effort to encourage levels of care appropriate for one's degree of retardation, Medicaid allows payment for treatment in relatively small ICF-MR residential settings as an alternative to the custodial focus of large institutions. However, in spite of these guidelines and the flexibility they allow, ICF-MR facilities remain essentially large institutions, a situation which effectively limits community care options for the poor.<sup>101</sup> Nevertheless, as shown in Table 33, there is a direct relationship between the size of the institution and the severity of the retardation of the residents. Over 60 percent of those living in mostly large state facilities had a profound level of retardation compared to less than 15 percent for small facilities of 3-15 beds.

A similar pattern existed in terms of capacity for independent living. For residents of large facilities, over half of those in the mostly large state institutions and over 30 percent in other large facilities had difficulty with three or more ADLs, compared to only 16.8 percent for small, non-state facilities. Contributing to this dichotomy between large and small facilities is the deinstitutionalization movement which has encouraged placing and serving those with relatively low levels of disability in the community or small residential settings.<sup>102</sup> These patterns also vary by state and region of the country. For example, the placement of residents in small facilities for the mentally retarded varied from a low of 18.5 percent in the south to over one-third in the midwest. Differences among the individual states are shown in Table 44.

### **Federal Benefit Programs**

Many social service programs at the national, state and local level provide a range of assistance for persons with disabilities. These may be within the scope of broad, federal categorical grant programs, such as those for children or the elderly, where there are client target groups and priority services associated with disability.

There are also several federally funded programs geared specifically for persons with disabilities, consisting of cash assistance, services, or both. Data on several of the programs which focus specifically on disability appear in Tables 34-42 and are briefly summarized as follows:

#### **Special Education**

Nearly 4.6 million children from birth through age 21, with a range of disabilities, received special education services during the 1988-89 school year (see Table 34).

#### **Social Security Disability Insurance Benefits (SSDI)**

During calendar 1989, 415,500 new SSDI awards were made to disabled workers. This brought the total to 2.9 million persons receiving SSDI payments in 1989, averaging \$555.80 per month (see Tables 35 and 36).

#### **Supplemental Security Income (SSI)**

At the end of calendar year 1989, there were 82,765 blind and 3,071,251 disabled SSI recipients, including children and all blind and disabled recipients who were 65 years of age and over. The average monthly benefit was \$319.76 for blind and \$308.94 for disabled SSI recipients (see Tables 35 and 37).

#### **State Vocational Rehabilitation Programs (VR)**

During federal fiscal year 1988 (10/1/87 - 9/30/88), 217,138 persons with a disability were rehabilitated into either paid employment or independent living (see Tables 38 and 39).

#### **Disabled Veterans (VA)**

A total of 2.8 million disabled veterans were receiving benefits as of September 1989 by the Department of Veterans Affairs (see Table 40).

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EH = Total hours worked by all employees during calendar year

200,000 = Base for 100 full-time workers (working 40 hours per week, 50 weeks per year).

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## **I. Prevalence and Characteristics of Persons with Disabilities**

**Table 1. Number and Percent of Persons by Degree of Activity Limitation Due to Chronic Conditions and Age, Race and Sex: United States, 1989**

### Highlights

- Chronic activity limitation, or long-term disability, affects 14.1 percent of the U.S. population. This includes 4.1 percent who are unable to carry out their major activity, such as working, keeping house, or attending school, and another 5.4 percent who are limited in the amount or kind of major activity they can perform. An additional 4.5 percent, while not limited in their major activity, respond positively when asked if they are limited in other ways (total affected by rounding).
- While most persons 65 and over have no activity limitation, the prevalence and severity of activity limitation increases with age. For those under the age of 18, only 5.3 percent have a limitation and 0.6 percent are unable to carry on their major activity. In the 18-44 age group 9.0 percent have an activity limitation and 2.6 percent cannot conduct their major activity. The percentage rises to 22.2 percent with a limitation and 8.8 percent unable to conduct their major activity in the 45-64 age group, and for those 65 and older 38.3 percent have an activity limitation while 10.1 percent are unable to carry on their major activity at all.
- Stated another way, by re-computing the figures, those under age 18 make up 26.3 percent of the total population (and 29.0 percent of those without a limitation) but only 10.0 percent of those who are limited in their activity. Conversely, those 70 years of age and over constitute only 7.9 percent of the total population (and only 5.6 percent of those without an activity limitation) but 21.9 percent of those limited in their activity. Nonetheless, over two-thirds of those with an activity limitation are under age 65.
- The prevalence of limitation is fairly consistent between genders within the specific age groupings. However, the severity of limitation (unable to perform one's major activity) is greater for men than women in the 65-69 age group where men are more likely to report a limitation in work than women in keeping house (see introduction). Also, because there are more women than men in the oldest age group, the increased prevalence of limitation for females is a function of age.
- Differences in populations with limitations along racial lines do not become apparent until the population reaches age 45, at which point blacks have a consistently higher prevalence and severity rates.

### Explanatory Notes

Data for this table come from the 1989 National Health Interview Survey (NHIS) conducted by the National Center for Health Statistics (NCHS). The interview sample was composed of 45,711 households containing 116,929 people. The survey data were collected by the U.S. Bureau of the Census in interviews with civilian, non-institutionalized, family members. Proxy responses were accepted for members who were unavailable, incapable of responding, or children 17 years or younger.

The disability measures used in this table identify long-term reduction in activity (activity limitation) due to chronic disease or impairments. Limitation in *major* activity is based on what is usual for one's particular age group: ordinary play or going to school (under 18 years), working or keeping house (18 to 69 years) or living independently (70 years and over). Two measures of severity apply: 1) unable to carry on one's major activity or 2) limited in the amount or kind of major activity, the former defined as severe. Limitations in *non-major* activity refers to reduction in one's ability to participate in other endeavors such as civic, religious, or recreational activities, but for the retired or those keeping house it can include the more challenging task of work. (See the introduction for a discussion of definition effects.)

Chronic disease and impairments are those conditions first noticed by the respondent more than three months prior to the interview or belong to a group of conditions, such as heart disease or diabetes, that are considered chronic regardless of when they began. (For a listing of these conditions, see Table 13.)

Table 1. Number and Percent Distribution of Persons by Degree of Activity Limitation Due to Chronic Conditions and Age, Race and Sex: United States, 1989					
Characteristic	All Persons (In Thousands)	Degree of Activity Limitation			
		Total with Activity Limitation <sup>1</sup>	Unable to Carry on Major Activity	Limited in Amount or Kind of Major Activity	Limited, But Not in Major Activity
		Percent Distribution			
All Persons	243,532	14.1	4.1	5.4	4.5
<b>Age</b>					
Under 18 Years	64,003	5.3	0.6	3.2	1.5
18-44 Years	104,196	9.0	2.6	3.7	2.7
45-64 Years	46,114	22.2	8.8	7.7	5.6
65 Years and Over	29,219	38.3	10.1	12.7	15.5
65-69 Years	9,903	36.9	15.7	13.4	7.7
70 Years and Over	19,316	39.0	7.2	12.3	19.4
<b>Sex and Age</b>					
<u>Male</u> All Ages	118,009	13.7	4.6	5.0	4.0
Under 18 Years	32,752	6.3	0.6	4.0	1.7
18-44 Years	51,044	9.1	2.9	3.8	2.4
45-64 Years	22,070	21.4	10.4	6.5	4.5
65-69 Years	4,553	38.3	20.8	12.6	4.9
70 Years and Over	7,590	38.7	7.2	9.0	22.5
<u>Female</u> All Ages	125,523	14.4	3.6	5.8	4.9
Under 18 Years	31,251	4.3	0.5	2.5	1.3
18-44 Years	53,152	9.0	2.3	3.7	3.0
45-64 Years	24,044	22.8	7.3	8.9	6.7
65-69 Years	5,350	35.7	11.4	14.1	10.1
70 Years and Over	11,726	39.1	7.2	14.5	17.4
<b>Race And Age</b>					
<u>White</u> All Ages	205,312	14.2	3.9	5.5	4.7
Under 18 Years	51,549	5.4	0.5	3.3	1.6
18-44 Years	87,429	9.0	2.4	3.8	2.8
45-64 Years	40,022	21.5	8.0	7.8	5.7
65-69 Years	8,814	35.6	14.7	13.2	7.7
70 Years and Over	17,498	38.2	6.9	11.7	19.6
<u>Black</u> All Ages	29,891	14.9	5.9	5.3	3.6
Under 18 Years	9,959	5.6	0.8	3.2	1.6
18-44 Years	12,766	10.2	4.2	3.7	2.3
45-64 Years	4,712	29.5	15.8	7.9	5.8
65-69 Years	905	48.8	25.6	14.6	8.6
70 Years and Over	1,548	48.2	11.2	18.6	18.3

<sup>1</sup>This total of the three adjacent percentages may not add exactly due to rounding.

Source: National Center for Health Statistics, National Health Interview Survey, "Current Estimates from the National Health Interview Survey, 1989," *Vital and Health Statistics*, Series 10, No. 176, Tables 67 and 68.

**Table 2. Number and Percent of Persons by Degree of Activity Limitation Due to Chronic Conditions and Age, Income, and Location: United States, 1989**

### **Highlights**

- The prevalence and severity of activity limitation increase as family income falls. For those with family incomes of less than \$10,000, 26.8 percent have an activity limitation including 9.7 percent who were unable to carry out their major activity at all. As income rises these percentages drop. Among the \$10,000-\$19,999 group, the corresponding figures are 19.4 and 6.1 percent, for the \$20,000-\$39,999 group they are 11.9 and 3.0 percent. For those with family incomes of \$35,000 and over the figures fall to 8.2 percent with an activity limitation, including 1.7 percent unable to carry out their major activity.
- In combination, age and income correlate with much higher rates of activity limitation than do these factors individually. For example, Table 1 shows that 22.2 percent of all persons in the 45 to 64 age group have an activity limitation, compared to 55.6 percent for the same age group with family incomes below \$10,000.
- Persons residing in the South (15.2 percent with an activity limitation) and outside metropolitan areas (16.6 percent) are somewhat more likely to have a disability than those in other locations.

### **Explanatory Notes**

Data for this table come from the 1989 National Health Interview Survey (NHIS) conducted by the National Center for Health Statistics. For a description of this data source, see Table 1.

Family income is the total from all sources including wages, rents, pensions, government payments, and help from relatives in the preceding twelve months, for all family members, whether by blood, marriage, or adoption, including earnings of family members with no disability.

Metropolitan Statistical Areas (MSAs) are generally defined as a central city or twin cities with a population of over 50,000 and adjacent metropolitan counties linked socially and economically to the central city. MSAs may include a number of counties and are not restricted by state boundaries; an individual MSA may be located in more than one state. The MSAs used in this table were those defined in the 1980 census.

Table 2. Number and Percent Distribution of Persons by Degree of Activity Limitation Due to Chronic Conditions and Age, Income and Location: United States, 1989

Characteristic	Degree of Limitation				
	All Persons (in thousands)	Total With Activity Limitation <sup>1</sup>	Unable to Carry on Major Activity	Limited in Amount or Kind of Major Activity	Limited, But Not in Major Activity
Under \$10,000		Percent Distribution			
All Ages	26,185	26.8	9.7	9.6	7.4
Under 18 Years	7,447	8.5	0.9	5.6	2.0
18-44 Years	9,763	17.6	7.3	6.0	4.2
45-64 Years	3,363	55.6	31.6	14.7	9.4
65-69 Years	1,427	57.0	26.1	18.2	12.6
70 Years and Over	4,185	47.3	8.0	18.3	21.1
\$10,000-\$19,999					
All Ages	41,040	19.4	6.1	7.3	6.0
Under 18 Years	10,640	6.8	0.6	4.5	1.6
18-44 Years	15,915	12.4	4.0	5.0	3.4
45-64 Years	6,483	32.7	15.2	10.8	6.7
65-69 Years	2,586	39.6	17.6	15.2	6.8
70 Years and Over	5,416	39.5	6.6	11.7	21.1
\$20,000-\$34,999					
All Ages	56,718	11.9	3.0	4.9	3.9
Under 18 Years	15,776	4.8	0.5	2.8	1.5
18-44 Years	25,856	8.3	1.8	3.9	2.6
45-64 Years	9,843	21.3	7.2	8.6	5.6
65-69 Years	2,096	31.9	12.0	13.2	6.8
70 Years and Over	3,146	33.4	5.5	7.6	20.3
\$35,000 or More					
All Ages	60,203	8.2	1.7	3.4	3.0
Under 18 Years	21,488	4.0	0.4	2.2	1.5
18-44 Years	37,310	6.2	1.1	2.7	2.4
56-64 Years	17,921	13.0	3.2	5.2	4.6
65-69 Years	1,652	27.5	9.7	11.1	6.7
70 Years and Over	1,831	32.2	7.4	8.0	16.8
Geographic Region					
Northeast	48,930	13.1	3.7	4.9	4.5
Midwest	59,540	13.7	3.8	5.6	4.4
South	83,148	15.2	4.7	5.9	4.7
West	51,913	13.5	4.0	5.2	4.3
Place of Residence					
MSA	189,860	13.3	3.9	5.2	4.3
Central City	74,410	14.6	4.7	5.4	4.5
Not Central City	115,450	12.5	3.4	5.0	4.1
Not MSA	53,672	16.6	5.0	6.4	5.2

<sup>1</sup>This total of the three adjacent percentages may not add exactly due to rounding.

Source: National Center for Health Statistics, 1989 National Health Interview Survey, "Current Estimates from the National Health Interview Survey, 1989," Vital and Health Statistics, Series 10, No. 176, Tables 67 and 68.

**Table 3. Functional Limitation Status, by Selected Characteristics: United States, 1984**

### Highlights

- Persons who had difficulty with one or more functional activities (see list, below) comprised 20.6 percent of the civilian non-institutionalized population, or 37.3 million persons 15 years and older. This included 7.5 percent who had a severe limitation, defined as either unable to perform one or more activities or needed the assistance of another person to do so. This leaves 13.1 percent with a non-severe limitation.
- Functional limitation increased at an accelerated rate with age. For example, persons 65 years of age and older were more than four times as likely to have a functional limitation and over seven times as likely to have a severe limitation than their younger counterparts. At the same time, vulnerability, such as living alone, has a high, direct correlation with disability. Those living completely alone are more likely to have a functional limitation (37.9 percent) than married persons with their spouse present (20.0 percent). Re-computing and presenting these figures another way, persons with a functional limitation are over twice as likely to live completely alone as those without such a limitation (21.4% versus 9.1%).
- Those with low incomes (less than \$600 per month) were nearly four times as likely to have a functional limitation, at 39.9 percent, and over six times as likely to have a severe limitation, at 18.1 percent, than persons with monthly incomes of \$3,000 and over, with functional limitation rate of 10.7 percent and a severe rate of 2.7 percent. Related to income, dependence on public benefit programs had a direct relationship with functional limitation. For example, over 45 percent of all Medicaid recipients and nearly 37 percent of all Food Stamp recipients have a functional limitation, compared to the 20.6 percent figure for the total population 15 years of age and over.
- Disability and labor force participation are also inversely related. Only 10.1 percent of persons in the labor force have a functional limitation, compared to 25.7 percent of those outside the labor force. This disparity increases for those with a severe functional limitation at 1.5 and 10.7 percent, respectively.
- The rate of functional limitation is almost twice as high among persons age 15 to 64 not covered by private health insurance (22.3 percent) as among those with such coverage (11.9 percent).
- Educational attainment and disability are highly, inversely related. Persons without a high school diploma were over twice as likely to have a functional limitation and over three times as likely to have a severe limitation as those who are high school graduates.

### Explanatory Notes

Data in this table come from the U.S. Census Bureau's 1984 Survey of Income and Program Participation (SIPP). The Bureau asked a sample of non-institutionalized persons 15 years of age and older about their ability to perform 9 sensory and physical activities: 1) Seeing words and letters in ordinary newspaper print even when wearing glasses or contact lenses (7.1 percent with a limitation); 2) Hearing what is said in a normal conversation (4.3 percent); 3) Having speech understood (1.4 percent); 4) Lifting and carrying a full bag of groceries (10 lbs.) (10.1 percent); 5) Walking three city blocks (1/4 mile) (10.6 percent); 6) Walking up a flight of stairs without resting (10.0 percent); 7) Getting around outside the house by yourself (3.3 percent); 8) Getting around inside the house by yourself (1.4 percent); and 9) Getting into and out of bed by yourself (1.1 percent). Except for having speech understood, respondents also reported on the severity of their difficulty by indicating 1) if they had difficulty and 2) if they were unable to do the activity at all or without the assistance of another person, the latter defined as severe.

SIPP presents another perspective to the figures from the National Health Interview Survey by using different questions and a single set of activities and criteria for disability regardless of the age or major activity of the respondent.

Table 3. Functional Limitation Status, by Selected Characteristics, United States, 1984  
(Persons 15 years and over. Numbers in Thousands)

Characteristic		Total	With a Functional Limitation			
			Total		Severe	
			Number	Percent	Number	Percent
Total		180,987	37,304	20.6	13,537	7.5
Age	15 to 24 years	39,297	2,054	5.2	346	0.9
	25 to 34 years	40,464	3,049	7.5	596	1.5
	35 to 44 years	30,480	4,074	13.4	890	2.9
	45 to 54 years	22,264	5,110	23.0	1,431	6.4
	55 to 64 years	22,060	7,552	34.2	2,734	12.4
	65 years and over	26,422	15,465	58.5	7,539	28.5
	65 to 69 years	8,928	4,052	45.4	1,682	18.8
	70 to 74 years	7,378	4,078	55.3	1,691	22.9
	75 years and over	10,116	7,335	72.5	4,166	41.2
Family Status	Married, spouse present	102,836	20,614	20.0	6,612	6.4
	Other family member	49,403	7,545	15.3	2,988	6.0
	Not a family member	28,749	9,145	31.8	3,937	13.7
	Lives alone	21,113	8,000	37.9	3,520	16.7
Program Participation	Received -					
	Cash assistance other than SSI	10,037	4,594	45.8	2,342	23.3
	SSI	3,473	2,683	77.3	1,674	48.2
	Food Stamps	10,867	3,994	36.8	1,776	16.3
	Medicaid Coverage	10,610	4,788	45.1	2,527	23.8
	Public or subsidized housing	5,932	2,243	37.8	1,019	17.2
	VA Payments	3,460	1,979	57.2	974	28.2
Social Security	Social Security	32,832	18,543	56.5	9,051	27.6
	Medicare Coverage	27,948	16,932	60.6	8,549	30.6
Monthly Household Income	Under \$600	20,690	8,262	39.9	3,746	18.1
	\$600 to \$1,199	27,866	8,944	32.1	3,731	13.4
	\$1,200 to \$1,999	38,648	8,211	21.2	2,826	7.3
	\$2,000 to \$2,999	40,999	6,249	15.2	1,804	4.4
	\$3,000 and over	52,784	5,639	10.7	1,430	2.7
Labor Force Status	Persons 15 to 64 years					
	In the labor force	114,745	11,624	10.1	1,750	1.5
	Not in the labor force	39,820	10,215	25.7	4,247	10.7
Private Health Insurance Coverage	Persons 15 to 64 years					
	Covered	121,337	14,430	11.9	3,435	2.8
	Not Covered	33,228	7,409	22.3	2,563	7.7
	Persons 65 years and over					
Covered	19,221	10,401	54.1	4,607	24.0	
Not Covered	7,202	5,064	70.3	2,932	40.7	
Educational Attainment	Persons 15 to 64 years					
	Not a high school graduate	41,614	9,764	23.5	3,332	8.0
	High school graduate	112,951	12,075	10.7	2,666	2.4
	Persons 65 years and over					
Not a high school graduate	14,389	9,871	68.6	5,271	36.6	
High school graduate	12,034	5,594	46.5	2,268	18.8	

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation, Current Populations Reports, Series P-70, No. 8, Table C.

**Table 4. Percent of Persons 15 Years Old and Over Who Needed Assistance from Others with Everyday Activities, by Age and Selected Characteristics: 1986**

### Highlights

- A total of 4.4 percent of the U.S. population 15 years of age and older needed assistance from other persons to perform one or more of these everyday activities.
- The greatest numbers needing assistance required help in doing housework (3.2 percent) or 72.7 percent of all persons requiring assistance from others. The fewest number needed assistance in keeping track of bills and/or money (1.6 percent).
- Personal assistance requirements increased with age. Only 2.4 percent of the population under the age of 65 required assistance in one or more of the everyday activities. This increased to 16 percent for those in the 65 and above age cohort. For those of advanced age these rates rose substantially. Almost one quarter of persons 80-84 years old needed assistance while 45.4 percent of those 85 and over depended on others for assistance with these everyday activities.
- Females required more assistance than males, with 5.8 percent of the total female population dependent on others for personal assistance, compared to 2.9 percent of males. This gender relationship held for all age categories except for those 75 years and over where rates for women increased relative to men. This reflects the higher average age of women than men in the 75 and over cohort group.
- While the need for assistance among all persons surveyed does not vary greatly along racial lines, marked racial differences appear among those 65 years and over, where 22.7 percent of blacks and 19.2 percent of Hispanics needed personal assistance, compared to 15.4 percent for whites.
- Of particular significance is the correlation between living alone and the need for assistance from others. This is especially true among those 65 years and over where over more than 20 percent of those living completely alone required assistance from others.

### Explanatory Notes

Data presented in this table were collected as part of the 1986 Survey of Income and Program Participation (SIPP) conducted by the U.S. Census Bureau. The 1986 SIPP covered those non-institutionalized individuals 15 years of age and over who, because of a health condition lasting more than three months, required assistance from other persons in their everyday activities. Activities determined to be essential to everyday living consist of: personal care including dressing, eating, and hygiene; getting around outside the household; doing light housework; preparing meals; and keeping track of bills and/or money.

These figures differ from other surveys by limiting the respondents to those requiring help from others with a specified set of activities necessary to live independently in the community (*personal assistance*).

The disability measures in the 1986 SIPP are similar to two other frequently used indicators of need for assistance - *Activities of Daily Living (ADL)* and *Instrumental Activities of Daily Living (IADL)*. ADL includes the basic tasks of eating, toileting, continence, transferring (in and out of bed or chair), dressing, and bathing; IADL goes beyond ADL in level of complexity and includes handling personal finances, meal preparation, shopping, traveling, doing housework, using the telephone, and taking medications.

Table 4. Percent of Persons 15 Years Old and Over Who Needed Assistance from Others with Everyday Activities, by Age and Selected Characteristics: 1986 (numbers in thousands)

Characteristic		Total	Needed Assistance With --					
			One or More Activities	Personal Care	Getting Around Outside	Preparing Meals	Doing Housework	Keeping Track of Bills and/or Money
Total		186,022	4.4	1.7	2.8	2.6	3.2	1.6
Age	Under 65 years	158,359	2.4	0.9	1.3	1.5	1.8	0.7
	65 years and over	27,663	16.0	6.6	11.3	9.1	11.2	7.2
	65 to 69 years	9,615	9.3	3.0	5.7	5.0	6.6	2.8
	70 to 74 years	7,391	10.3	4.5	7.1	6.4	7.7	4.0
	75 to 79 years	5,434	18.9	7.5	12.5	10.2	13.1	7.5
	80 to 84 years	3,126	23.6	10.0	19.0	11.7	15.1	10.7
	85 years and over	2,097	45.4	23.2	37.7	30.5	34.4	32.1
Sex	Male	88,958	2.9	1.4	1.8	1.6	1.6	1.3
	Under 65 years	77,547	1.7	0.8	1.0	1.0	1.0	0.7
	65 years and over	11,411	11.0	5.4	7.5	5.9	5.8	5.0
	65 to 69 years	4,316	7.0	3.3	4.7	3.8	3.7	2.8
	70 to 74 years	3,208	8.8	3.6	5.2	4.9	4.1	3.6
	75 years and over	3,886	17.2	9.2	12.4	9.0	9.5	8.4
	Female	97,064	5.8	2.0	3.7	3.5	4.6	2.0
	Under 65 years	80,812	3.1	0.9	1.6	2.0	2.6	0.6
	65 years and over	16,252	19.4	7.5	14.0	11.3	15.1	8.7
	65 to 69 years	5,298	11.1	2.7	6.4	6.0	9.0	2.9
	70 to 74 years	4,183	12.6	5.3	8.6	7.5	10.4	4.4
75 years and over	6,771	30.2	12.5	23.4	17.8	22.7	16.1	
Ethnic Group <sup>1</sup>	White	160,194	4.3	1.6	2.8	2.4	3.1	1.5
	Under 65 years	135,172	2.2	0.8	1.3	1.3	1.7	0.6
	65 years and over	25,022	15.4	6.2	11.0	8.4	10.5	6.7
	Black	20,845	5.7	2.7	3.3	4.1	4.4	2.6
	Under 65 years	18,572	3.6	1.5	1.8	2.6	2.6	1.4
	65 years and over	2,273	22.7	12.0	15.6	16.6	19.5	13.1
	Hispanic origin <sup>1</sup>	12,823	3.4	1.4	1.9	2.4	2.3	1.1
Under 65 years	12,020	2.4	1.1	1.3	1.7	1.7	0.7	
65 years and over	803	19.2	6.5	11.6	11.7	11.8	6.5	
Family Status	15 years and over:							
	Family member	154,866	3.6	1.6	2.3	2.3	2.6	1.3
	Lives with spouse	104,636	3.2	1.3	2.0	2.0	2.4	0.9
	Not a family member	31,156	8.4	2.5	5.3	3.9	6.1	3.3
	Lives alone	21,907	10.4	2.9	6.5	4.6	7.4	3.8
	15 to 64 years:							
	Family member	136,340	2.2	0.8	1.2	1.4	1.7	0.6
	Lives with spouse	89,505	2.1	0.7	1.1	1.4	1.7	0.4
	Not a family member	22,019	3.4	1.1	1.9	1.7	2.6	1.1
	Lives alone	13,267	3.9	1.0	1.9	1.8	2.9	1.1
	65 years and over:							
	Family member	18,526	13.8	6.9	10.2	9.0	9.6	6.6
Lives with spouse	15,132	10.1	4.9	7.0	6.0	6.5	3.9	
Not a family member	9,137	20.3	6.0	13.7	9.3	14.5	8.4	
Lives alone	8,639	20.3	5.7	13.5	8.9	14.4	8.0	

<sup>1</sup> Persons of Hispanic origin may be of any race.

Source: U.S. Bureau of the Census, 1986 Survey of Income and Program Participation, Current Population Reports, Series P-70, Number 19, Tables A and B.

**Table 5. Functional Status of the Non-Institutionalized Population Aged 55-64 and 65 Years and Over: Estimates of Persons with Activity of Daily Living (ADL), Mobility and Instrumental Activity of Daily Living (IADL) Difficulties: United States, 1987**

### Highlights

- A total of 3.6 million persons, or 12.9 percent of all persons in the community 65 years and over, had difficulty with at least one Activity of Daily Living (ADL) or mobility (walking). Nearly all of these persons (11.7 percent of all non-institutionalized elderly) had one or more of these problems for longer than three months, and most (8.2 percent) needed the help of other persons, either alone (3.5 percent) or in conjunction with assistive devices (4.7 percent). ADL and mobility difficulties affecting the greatest number of elderly were bathing (8.9 percent) and walking (7.7 percent). These were followed by transferring between bed and chair (5.9 percent), dressing (5.1 percent), toileting (excluding incontinence) (3.5 percent) and feeding oneself (1.1 percent).
- While each listed ADL difficulty required assistance from others in the majority of cases, most persons with walking difficulty did not need personal assistance, relying instead on assistive devices (3.6 percent) or functioning entirely on their own (0.6 percent). However, nearly one-fifth of those with walking difficulties (1.4 percent of all elderly in the community) could not walk at all. As shown in Table 5C, ADL difficulties varied directly with age. A total of 3.8 percent of all non-institutionalized persons in the 55-64 age group had difficulty with one or more ADL, a rate over three and one-third times less than for the 65 and over age cohort.
- Nearly 4.9 million persons aged 65 and over, or 17.5 percent of all elderly persons in the community, had difficulty performing at least one Instrumental Activity of Daily Living (IADL). Almost all of these persons (16.4 percent of all non-institutionalized elderly) had difficulties which were long term, having lasted for more than three months. Over half (9.4 percent) were unable to perform the IADL at all, even with the assistance of other persons or devices, and the overwhelming majority of the rest (6.8 percent) required the assistance of other persons.
- The most frequently occurring IADL difficulties for persons 65 years and over were getting about the community (13.5 percent of all elderly), shopping (11.0 percent) and doing light housework (10.1 percent). Use of the telephone presented the least difficulty (4.4 percent). IADL difficulties and age are strongly related, as shown in Table 5D. Among persons aged 55 to 64 years, 4.7 percent experienced difficulty with one or more IADL, a rate over three and one-half times less than their counterparts 65 years and over.
- As Table 5E shows, 19.5 percent of the elderly cohort had at least one ADL or IADL, and 11.4 percent had at least one ADL (excluding mobility). Table 5B shows that 17.5 percent had at least one IADL. Therefore, by computing the differences, 8.1 percent had only an IADL limitation (19.5-11.4), and 2.1 percent only an ADL (19.5-17.5) (figure affected by rounding). Rates increased for the very old, females, minorities and those living alone, in the south and rural areas, and for Medicaid recipients and non-veterans.

### Explanatory Notes

These Tables come from Round 1, 1987 National Medical Expenditure Survey and present estimates of the number of non-institutionalized persons 65 years and over and 55-64 with difficulty performing Activities of Daily Living (ADL) and Instrumental Activities of Daily Living (IADL). These estimates show the particular ADL/IADL involved and whether the difficulty required assistance, either from another person, a device or both. Activities of daily living are those essential for self care and consist of bathing, dressing, feeding oneself, toileting (excluding incontinence), and transferring between bed and chair. Instrumental activities of daily living consist of household and social tasks such as meals preparation, house cleaning, the handling of money, shopping and getting around the community. Mobility is shown separately because, unlike other ADLs, many persons are able to overcome walking difficulties by using assistive devices (see introduction for ADL issues).

Table 5A. Functional Status of the Non-Institutionalized Population Aged 65 and Older: Estimates of Persons with ADL and Mobility Difficulties as a Percent of the Total Population Aged 65 and Older, United States, 1987

Population Characteristic	Total Population Aged 65 or Older	Walking or at least one ADL <sup>a</sup>	Bathing	Bed/Chair Transfer	Dressing	Toileting	Feeding	Walking
		Population with ADL and Walking Difficulties						
Number (in thousands)	27,909	3,601	2,482	1,635	1,437	975	316	2,152
Percent		12.9	8.9	5.9	5.1	3.5	1.1	7.7
		Percent of Total Population by Level of Difficulty and Dependence						
Functioning without help <sup>b</sup>		1.8	0.9	1.4	0.6	0.2	0.1*	0.6
Functioning with help <sup>b</sup>								
Equipment only		2.9	1.1	1.1	0.1*	0.9	0.0*	3.6
Personal assistance only		3.5	4.5	1.7	4.1	0.9	0.6	0.6
Both		4.7	2.4	1.2	0.3	1.0	0.1*	1.5
Unable to perform activity with or without help <sup>b</sup>		N/A	N/A	0.5	N/A	0.5	0.3	1.4
		Percent of Total Population by Duration of Problem						
More than 3 months		11.7	0.8	5.1	4.5	3.0	0.9	6.8
More than 3 months and functioning without help		1.6	0.8	1.3	0.5	0.2	0.1*	0.5

Table 5B. Functional Status of the Non-Institutionalized Population Aged 65 and Older: Estimates of Persons with IADL Difficulties as a Percent of the Total Population Aged 65 or Older, United States, 1987

Population Characteristic	Total Population Aged 65 or Older	At least one IADL <sup>a</sup>	Use of Telephone	Handling Money	Shopping	Getting About the Community	Preparing Meals	Doing Light Housework
		Population with IADL and Walking Difficulties						
Number (in thousands)	27,909	4,884	1,237	1,758	3,072	3,774	2,090	2,823
Percent		17.5	4.4	6.3	11.0	13.5	7.5	10.1
		Percent of Total Population by Level of Difficulty and Dependence						
Difficulty but functioning without help <sup>b</sup>		1.3	1.1	0.3	0.3	0.6	0.5	0.8
Functioning with help <sup>b</sup>		6.8	1.7	2.8	3.9	8.9	1.9	3.3
Unable to perform activity with or without help <sup>b</sup>		9.4	1.6	3.2	6.8	4.0	5.1	6.0
		Percent of Total Population by Duration of Problem						
More than 3 months		16.4	4.1	5.9	10.2	12.5	6.7	9.0

<sup>a</sup>Persons with more than one difficulty are assigned to the category representing the highest level of dependence.

<sup>b</sup>The levels indicate increasing dependence and are mutually exclusive.

\*Relative standard error is equal to or greater than 30 percent; sample size is too small for a reliable estimate.

Source: Agency for Health Care Policy and Research, 1987 National Medical Expenditure Survey, Research Findings 4.

Table 5C. Functional Status of the Non-Institutionalized Population Aged 55-64: Estimates of Persons with ADL and Mobility Difficulties as a Percent of the Total Population Aged 55-64, United States, 1987								
Population Characteristic	Total Population Aged 55-64	Walking or at least one ADL <sup>a</sup>	Bathing	Bed/Chair Transfer	Dressing	Toileting	Feeding	Walking
		Population with ADL and Walking Difficulties						
Number (in thousands)	22,045	848	488	467	354	159	52	520
Percent		3.8	2.2	2.1	1.6	0.7	0.2*	2.4
		Percent of Total Population by Level of Difficulty and Dependence						
Functioning without help <sup>b</sup>		0.5	0.3	0.5	0.3*	0.0*	0.0*	0.3*
Functioning with help <sup>b</sup>								
Equipment only		0.8	0.4*	0.4	0.0*	0.3*	0.0*	1.0
Personal assistance only		1.3	1.1	0.8	1.2	0.2*	0.2*	0.2*
Both		1.2	0.4	0.3*	0.1*	0.2*	0.0*	0.6
Unable to perform activity with or without help <sup>b</sup>		N/A	N/A	0.1*	N/A	0.1*	0.0*	0.3*
		Percent of Total Population by Duration of Problem						
More than 3 months		3.5	2.0	2.1	1.5	0.7	0.2*	2.3
More than 3 months and functioning without help		0.3	0.3*	0.4	0.3*	0.0*	0.0*	0.3*

Table 5D. Functional Status of the Non-Institutionalized Population aged 55-64: Estimates of Persons with IADL Difficulties as a Percent of the Total Population Aged 55-64, United States, 1987								
Population Characteristic	Total Population Aged 55-64	At least one IADL <sup>a</sup>	Use of Telephone	Handling Money	Shopping	Getting About the Community	Preparing Meals	Doing Light Housework
		Population with IADL and Walking Difficulties						
Number (in thousands)	22,045	1,033	155	210	511	644	333	664
Percent		4.7	0.7	1.0	2.3	2.9	1.5	3.0
		Percent of Total Population by Level of Difficulty and Dependence						
Difficulty but functioning without help <sup>b</sup>		0.8	0.2*	0.1*	0.0*	0.2*	0.2*	0.4
Functioning with help <sup>b</sup>		1.9	0.3	0.6	1.1	2.0	0.4	1.1
Unable to perform activity with or without help <sup>b</sup>		2.2	0.2*	0.3*	1.2	0.7	0.9	1.5
		Percent of Total Population by Duration of Problem						
More than 3 months		4.4	0.7	1.0	2.2	2.8	1.4	2.8

<sup>a</sup>Persons with more than one difficulty are assigned to the category representing the highest level of dependence.

<sup>b</sup>The levels indicate increasing dependence and are mutually exclusive.

\*Relative standard error is equal to or greater than 30 percent; sample size is too small for a reliable estimate.

Source: Agency for Health Care Policy and Research, 1987 National Medical Expenditure Survey, Research Findings 4.

Table 5E. Estimates of ADL/IADL Difficulties of the Non-Institutionalized Population Aged 65 or Older by Selected Demographic Characteristics, United States, 1987

Demographic Characteristic	Population aged 65 or older (in thousands)	At least one ADL or IADL Difficulty	At least one ADL Difficulty <sup>1</sup>	Number of ADL Difficulties		
				1	2 or 3	4 or more
Total <sup>a</sup>	27,909	Percent		Percent Distribution		
		19.5	11.4	5.2	3.8	2.4
<b>Age and Sex</b>						
<b>Both Sexes</b>						
65-69	9,361	9.9	5.9	2.4	2.1	1.3
70-74	7,525	13.2	7.9	3.4	3.0	1.5
75-79	5,389	19.9	11.5	6.2	3.3	2.0
80-84	3,361	34.1	18.6	8.0	7.5	3.2
85 and older	2,274	56.8	34.5	15.6	9.7	9.2
<b>Male</b>						
65-69	4,097	8.0	5.0	1.7	1.8	1.4
70-74	3,359	9.2	6.3	2.3	2.3	1.7
75-79	2,167	15.5	8.7	4.2	2.7*	1.8
80-84	1,175	29.5	17.4	7.4	6.6	3.4*
85 and older	743	51.5	26.3	13.0	9.2	4.1*
<b>Female</b>						
65-69	5,264	11.3	6.5	2.9	2.4	1.3
70-74	4,165	16.5	9.2	4.3	3.5	1.3
75-79	3,222	22.9	13.3	7.6	3.7	2.0
80-84	2,186	36.6	19.3	8.3	7.9	3.1
85 and older	1,531	59.3	38.4	16.9	9.9	11.7
<b>Ethnic/Racial Background</b>						
White	24,135	19.1	11.1	5.1	3.6	2.4
Black	2,327	26.3	15.5	6.0	6.4	3.2
Hispanic	863	14.1	7.8	3.7*	4.1*	0.0*
<b>Living Arrangements</b>						
Alone	8,965	25.5	13.3	6.5	5.2	1.5
With spouse only	12,744	13.1	7.9	3.5	2.4	1.9
With other relatives	5,631	23.1	15.6	6.7	4.8	4.1
<b>Insurance Status</b>						
Medicare only	4,721	22.9	12.5	5.9	4.1	2.4
Medicaid <sup>b</sup>	2,444	43.4	27.0	9.5	11.9	5.6
Private <sup>b</sup>	20,504	15.9	9.3	4.5	2.8	2.0
<b>Veteran Status (Male)</b>						
Veteran	5,478	11.9	7.3	3.2	2.5	1.6
Other	6,064	17.5	10.0	4.1	3.6	2.3
<b>Place of Residence</b>						
Largest SMSAs	7,452	16.5	9.4	3.9	3.3	2.2
Other SMSAs	13,106	19.1	11.1	5.2	3.6	2.3
Other	7,352	23.1	13.9	6.3	4.9	2.7
<b>U.S. Census Region</b>						
Northwest	6,248	17.1	9.7	4.7	3.0	2.0
Midwest	6,958	18.5	10.5	4.7	3.7	2.1
South	9,577	21.9	13.0	5.5	4.7	2.9
West	5,126	19.1	11.5	5.7	3.6	2.2

<sup>1</sup>This column is the total of the three adjacent percentages; unlike Table 5A-D ADL measures in this table do not include mobility (walking).

<sup>a</sup>Includes persons with other ethnic/racial background, unknown veteran and insurance status, other living arrangements, and without insurance.

<sup>b</sup>Coverage in addition to Medicare and including CHAMPUS/CHAMPVA.

\*Relative standard error is greater than or equal to 30 percent; sample size is too small for a reliable estimate.

Source: Agency for Health Care Policy and Research, 1987 National Medical Expenditures Survey, Research Findings 4.

**Table 6. Activity of Daily Living (ADL) Disabilities among Non-Institutionalized Persons Aged 65 and Over, by Survey and Type of Activity: United States, Various Years**

### **Highlights**

- As an overall measure of difficulty, between 5.0 and 8.1 percent of the elderly 65 years of age and over in the community received help with one or more ADL from a list of five common activities.
- Between 4.6 and 6.9 percent of the elderly required personal assistance bathing, and between 2.9 and 4.4 percent of the elderly needed similar help dressing.
- Between 2.6 and 4.2 percent needed help transferring (in and out of bed or chair), and between 2.4 and 3.4 percent needed help with toileting.
- Between 0.7 and 2.5 percent needed help eating, which was the ADL limitation with the lowest prevalence.

### **Explanatory Notes**

This table compares five different surveys according to five selected Activity of Daily Living (ADL) measures for persons 65 years of age and over living in the community. Activities of Daily Living consist of everyday tasks performed for self care and independent living. ADL measures vary considerably among surveys in terms of the particular list of activities involved, the degree and duration of ADL difficulties, whether persons require active human assistance or need the help of mechanical devices, how long ago the survey was conducted, the sampling methodology, the method of interviewing, and other factors influencing the survey results.

A major cause of disparity among ADL studies is that the more activities there are on a particular survey's list, the larger will be the number of persons responding positively to an ADL disability. For this reason the table uses a selected list which is consistent across most of the studies and represents a consensus among many in the disability statistics community on appropriate criteria for assessing needs and determining benefits for long term care.

To control for some of these differences, the table uses weighted estimates for the five common activities of daily living. These ADLs cover those needing help from other persons with bathing, dressing, transferring (in and out of bed or chair), toileting (which does not include continence), and eating. The table cannot control for many differences, however, including the wording of particular survey questions and related items. For additional information, consult the source article from which this table draws its data and narrative explanation.

Table 6. Activity of Daily Living Disabilities Among the Noninstitutionalized Elderly Aged 65 and Over by Survey and Type of Activity: United States, Various Years (In thousands)

	1982 National Long-Term Care Survey	1984 National Long-Term Care Survey	1984 Supplement on Aging	1984 Survey on Income and Program Participation	1987 National Medical Expenditure Survey
Total Noninstitutionalized Elderly Population/% Aged 65 and Over	25,440/100.0%	26,481/100.0%	26,268/100.0%	26,422/100.0%	27,909/100.0%
Receives Help of Another Person					
One or More ADLs	1,992/ 7.8%	2,062/ 7.8%	1,318/ 5.0%	1,538/ 5.8% <sup>a</sup>	2,250/ 8.1%
Bathing	1,609/ 6.3%	1,660/ 6.3%	1,211/ 4.6%	1,459/ 5.5% <sup>b</sup>	1,926/ 6.9%
Dressing	1,072/ 4.2%	1,063/ 4.0%	771/ 2.9%	b	1,228/ 4.4%
Transferring*	1,072/ 4.2%	1,072/ 4.0%	675/ 2.6%	699/ 2.6%	977/ 3.5%
Toileting	857/ 3.4%	880/ 3.3%	619/ 2.4%	n.a.	670/ 2.4%
Eating	624/ 2.5%	618/ 2.3%	163/ 0.7%	b	c

<sup>a</sup>Excludes toileting.

<sup>b</sup>Combines bathing, dressing, eating and personal hygiene in one question.

<sup>c</sup>Cell size too small for reliable estimate.

\*In and out of bed or chair

Source: Wiener, Joshua M. and Hanley, Raymond J., "Measuring the Activities of Daily Living among the Elderly: A Guide to National Surveys," The Interagency Forum on Aging-Related Statistics, October 1989, Table 1; This table also appears in Wiener, J. M. et al., "Measuring the Activities of Daily Living: Comparisons across National Surveys," Journal of Gerontology: SOCIAL SCIENCES, Vol. 45, No. 6 (1990).

**Table 7. Number and Percent of Children Who Ever Had a Delay in Growth or Development, a Learning Disability, or an Emotional Problem That Lasted 3 Months or More or Required Psychological Help, by Age and Selected Characteristics: United States, 1988**

### **Highlights**

- Over 2.5 million children, or 4 percent of those 17 years of age and younger, have had a delay in their growth or development. Of all children 3 to 17 years of age, 6.5 percent, or 3.4 million, have had a learning disability, and 13.4 percent, or 7 million, have had an emotional or behavioral problem lasting three months or more or which required psychological treatment.
- When data are combined, 19.5 percent or 10.2 million children ages 3 to 17 have had one or more of these three conditions, and when the children ages two and under with growth or development delays are included, the figure is 10.7 million (data not shown). These figures equal or exceed those for the most prevalent chronic physical conditions among children.
- Little or no significant increase in rates occurred across age groups for children with delays in growth or development showing that most such delays occur in early childhood (percentages for older children include conditions which existed at any period in their lifetime). Learning disabilities increased at school age, showing that such conditions are often not recognized before starting school. Emotional and behavioral problems increase steadily with age, except for a decline in the rate of increase after early elementary school.
- Males had a substantially higher prevalence of learning disabilities (8.6 percent) and emotional or behavioral problems (15.4 percent) than females (4.4 and 11.3 percent, respectively). Gender differences in growth or development delays were not significant.
- Learning disabilities varied inversely with family income and parental education. Also, emotional or behavioral problems increased as family income fell, but overall differences according to parental education were not significant. However, the most persistent emotional or behavioral problems, while relatively small in number, were highest among parents with low levels of educational attainment (data not shown). Education and income differences among those with a developmental delay were not statistically significant in most cases.
- The lower prevalence of these disabilities for racial minorities can be attributed to under reporting by black and Hispanic respondents.
- For learning disabilities and emotional or behavioral problems, children in families where the biological mother and father are both present were much less likely to experience one or more of the three conditions than those in other types of family settings. For developmental delays, there was little significant difference among various family types. (The "All Other" family structure category includes children living with fathers, fathers with stepmothers, grandparents or other relatives, or in adoptive or foster homes.)

### **Explanatory Notes**

Data in this table come from the 1988 National Health Interview Survey of Child Health. All responses were made for the child by an adult, usually the mother. Respondents were asked if the child has or ever had 1) a delay in growth or development (asked of children 0-17 years), 2) a learning disability (asked of children 3-17 years), or 3) an emotional or behavioral problem lasting three months or more (asked of children 3-17 years). Concerning the third item, if the child had ever seen a psychiatrist or other professional in this regard, or if during the past 12 months the respondent felt or had anyone suggest the need for such help, item 3 was considered positive. Because the questionnaire identified children who had ever had one or more of the three conditions, data represent lifetime prevalence.

Table 7. Number and Percent of Children Who Ever Had a Delay in Growth Or Development, A Learning Disability, or An Emotional Problem That Lasted 3 Months or More or Required Psychological Help, By Age And Selected Characteristics: United States, 1988

Characteristics		Total Population 17 Years and Under	Delays in Growth or Development All Ages 17 Years And Under	Total Population 3-17 Years	Learning Disabilities All Ages 3-17 Years	Emotional or Behavioral Problems All Ages 3-17 Years
		Number (In Thousands)	Percent	Number (In Thousands)	Percent	Percent
All Children <sup>1</sup>		63,569	4.0	52,209	6.5	13.4
Age	2 Years and Under	11,360	4.3	-	-	-
	3-5 Years	10,748	4.4	10,748	1.6	5.3
	6-11 Years	20,966	4.1	20,966	6.8	12.7
	12-17 Years	20,495	3.6	20,495	8.8	18.5
Sex	Male	32,526	4.2	26,621	8.6	15.4
	Female	31,043	3.8	25,588	4.4	11.3
Race	White	51,380	4.4	42,314	6.7	14.2
	Black	9,820	2.1	8,009	6.2	10.3
Hispanic Origin	Hispanic	7,239	3.4	5,965	5.8	12.0
	Non-Hispanic	55,031	4.2	45,519	6.6	13.6
Family Income	Less than \$10,000	7,924	5.4	6,219	8.4	15.8
	\$10,000-\$24,999	16,708	4.0	13,435	7.2	14.5
	\$25,000-\$39,999	15,737	4.0	12,986	6.2	13.4
	\$40,000 or more	16,071	3.9	13,638	5.8	12.8
Place of Residence	MSA	48,314	3.8	39,521	6.5	13.7
	Central City	18,972	3.1	15,210	5.9	13.6
	Not Central City	29,342	4.2	24,311	6.9	13.8
	Not MSA	15,255	4.7	12,688	6.5	12.4
Assessed Health Status	Excellent, Very Good, or Good	61,173	3.7	50,307	6.3	13.1
	Fair or Poor	1,788	15.2	1,413	15.1	23.3
Mother's Education	Less than 12 Years	12,479	3.3	10,362	8.7	13.6
	12 Years	26,791	4.2	22,315	6.8	12.5
	More than 12 Years	22,899	4.2	18,416	4.9	13.7
Family Structure	Biological Mother and Father	38,999	3.8	30,856	5.5	8.3
	Biological Mother and Stepfather	4,477	3.7	4,369	9.1	23.6
	Biological Mother Only <sup>2</sup>	13,716	4.5	11,323	7.5	19.1
	All Other	6,377	4.8	5,661	8.3	22.2

<sup>1</sup>Includes other races and unknown socio-demographic and health characteristics.

<sup>2</sup>Includes families in which the mother lived with the child's grandmother or other adult relative.

Note: MSA is metropolitan statistical area.

Source: National Center for Health Statistics, 1988 National Health Interview Survey, Child Health Supplement. Advance Data from Vital and Health Statistics, Number 190.

**Table 8. Disability Status of Children, by Selected Characteristics: United States, 1984**

**Highlights:**

- Among the 62.4 million persons under 18 years of age, 1.9 million, or 3.1 percent, had a physical, or mental or emotional disability. This consisted of 2.0 percent who had only a physical disability, 0.9 percent who had only a mental or emotional disability, and 0.2 percent who had both types of disability.
- Among all children with a disability, 1.6 million were white, 0.3 million were black, and 0.1 million were Hispanic.
- Children in families with monthly household incomes under \$600 were more likely to have a disability, at 4.5 percent, than their counterparts with monthly household income of \$3,000 and over, at 2.6 percent.
- Disability was greatest among children living in female headed households with no spouse present, at 4.5 percent, compared to married couple families, at 2.6 percent.
- Children with Medicaid coverage were more likely to have a disability, at 5.3 percent, than those with private health insurance, at 2.9 percent.
- Most children, regardless of disability, were able to attend school. The disability rate among the 62.2 million school children was 2.7 percent, compared to 100 percent for the 251,000 who could not attend.

**Explanatory notes**

Data for this table come from the third wave supplement to the 1984 panel of the Survey of Income and Program Participation (SIPP) conducted by the U.S. Census Bureau during May through August 1984. A separate group of questions was asked of children under 18 years of age to determine if the child had 1) a long-lasting physical condition that limited his or her ability to walk, run, or play, or 2) a long-lasting mental or emotional problem that limited his or her ability to learn or do regular schoolwork. Unlike the previous table, which presented lifetime prevalence from three disability categories, this table shows children who currently had a disability at the time of the survey using two categories.

Table 8. Disability Status of Children, by Selected Characteristics, United States, 1984  
(Persons under 18 years. Numbers in thousands.)

Characteristics	Total	With a Disability							
		Number	Percent	Physical Only		Mental or Emotional Only		Both Physical and Mental or Emotional	
				Number	Percent	Number	Percent	Number	Percent
Persons under 18 years old	62,445	1,916	3.1	1,241	2.0	536	0.9	139	0.2
Sex									
Male	31,898	1,075	3.4	658	2.1	333	1.0	83	0.3
Female	30,547	842	2.8	583	1.9	203	0.7	56	0.2
Race and Spanish Origin									
White	50,765	1,560	3.1	1,002	2.0	437	0.9	121	0.2
Black	9,496	319	3.4	208	2.2	92	1.0	19	0.2
Spanish Origin <sup>1</sup>	4,943	101	2.0	80	1.6	-	-	22	0.4
Age									
0 to 1 years	10,953	136	1.2	118	1.1	8	0.1	10	0.1
3 to 5 years	10,522	218	2.1	176	1.7	27	0.3	15	0.1
6 to 9 years	12,893	443	3.4	287	2.2	122	0.9	24	0.3
10 to 14 years	17,275	699	4.0	418	2.4	240	1.4	41	0.2
15 to 17 years	10,802	420	3.9	242	2.2	138	1.3	40	0.4
Ability to Attend Regular School									
Does attend or will attend	62,194	1,666	2.7	1,150	1.8	433	0.7	83	0.1
Can not attend or will not attend	251	251	100.0	91	36.3	103	41.0	56	22.3
Monthly Household Income									
Under \$600	8,069	366	4.5	249	3.1	80	1.0	37	0.5
\$600 to \$1,199	9,177	336	3.7	181	2.0	123	1.3	31	0.3
\$1,200 to \$1,999	13,628	329	2.4	191	1.4	109	0.8	28	0.2
\$2,000 to \$2,999	15,035	460	3.1	321	2.1	106	0.7	32	0.2
\$3,000 and over	16,537	426	2.6	298	1.8	118	0.7	11	0.1
Living Arrangements									
In married-couple family	47,225	1,237	2.6	831	1.8	305	0.6	100	0.2
In family with female householder, no husband present	13,755	618	4.5	386	2.8	196	1.4	36	0.3
Health Insurance Coverage									
Covered by private health insurance	44,110	1,277	2.9	853	1.9	327	0.7	98	0.2
Covered by Medicaid	8,004	426	5.3	309	3.9	90	1.1	28	0.3

<sup>1</sup> Persons of Spanish origin may be of any race.

Source: U.S. Bureau of the Census, 1984 Survey of Income and Program Participation (SIPP), Current Population Reports, Series P-70, No. 8, Table 6.

**Table 9. Comparison of Standardized One-Month, Six-Month, and Lifetime Prevalence of Mental Disorders, Expressed as a Percent of the Population 18 Years and Older, United States: 1980-84**

### **Highlights**

- The percentage of the U.S. population 18 years of age and over reporting a mental disorder increased with the duration of the reference period. The percentage with a current mental health disorder at the time of the survey (one month prevalence) was 15.4 percent. If a person had a disorder at any time during the past six months, the rate increased to 19.1 percent. If the disorder occurred at any point during the person's life (lifetime prevalence), the rate rose to 32.2 percent.
- The most common current disorders, those with a one-month prevalence, include phobia (6.2 percent), dysthymia (long-term, non-major depression) (3.3 percent), alcohol abuse/dependence (2.8 percent) and major depressive episode (2.2 percent).
- About half of the total prevalence for each of the three periods involved substance use disorders and phobias.
- When substance abuse disorders and phobia are excluded, the reported prevalence rates are 8.3 percent for any one-month period, 9.4 percent during the past six months, and 13.8 percent at any time in life.

### **Explanatory Notes**

Data for this table come from the Epidemiological Catchment Area (ECA) Survey, a five-site program of the National Institute of Mental Health (NIMH). The survey, which covers non-institutionalized adults 18 years of age and older, is conducted in conjunction with Yale University (New Haven, CT), The Johns Hopkins University (Baltimore, MD), Washington University (St. Louis, MO), Duke University (Durham, NC), and UCLA (Los Angeles, CA). The data show the prevalence of mental disorders, regardless of severity and whether these conditions cause a disability by limiting one's activity. The NIMH Diagnostic Interview Schedule (DIS) was used as the case-identification instrument in the ECA studies. While not based on a national probability sample, NIMH staff have been able to compute national prevalence estimates for persons living in the community.

NIMH reports that younger persons, under age 45, had higher prevalence rates for most disorders than their older counterparts, with the exception of cognitive impairment. Men had higher rates for substance abuse and antisocial personality than women. At the same time, women had higher rates for affective, anxiety and somatization disorders than men (data not shown).

The table presents percentages of persons with one or more disorder, in terms of several different condition groupings. For example, one total excludes substance abuse disorders. This allows distinguishing among various groupings and permits comparisons with other studies which may not include all the disorders in the ECA program.

In June 1991, NIMH completed a preliminary analysis of the 1989 National Health Interview Survey (NHIS) special mental health supplement. This analysis differs from the ECA program by including only person who have a severe and persistent mental illness, and it identifies how many are disabled as a result. According to this analysis, between 2.2 and 2.8 million non-institutionalized adults age 18 and over are currently disabled due to a severe and persistent mental illness. Another 0.5 million are severely mentally ill but are not currently disabled as a result. Therefore, NIMH estimates that a total of 3.3 million non-institutionalized adults 18 years of age and over are severely mentally ill (see introduction for a detailed discussion of mental health measurement issues).

Table 9. Comparison of Standardized One-Month, Six-Month, and Lifetime Prevalence of Mental Disorders Expressed as a Percent of the Population 18 Years and Older, United States: 1980-84\*

Disorders**	Rate, % (SE) <sup>1</sup>		
	1 Month	6 Months	Lifetime
Any DIS disorder covered	15.4 (0.4)	19.1 (0.4)	32.2 (0.5)
Any DIS disorder except cognitive impairment, substance use disorder, and antisocial personality	11.2 (0.3)	13.1 (0.4)	19.6 (0.4)
Any DIS disorder except phobia	11.2 (0.3)	14.0 (0.4)	25.2 (0.5)
Any DIS disorder except substance use disorders	12.6 (0.3)	14.8 (0.4)	22.1 (0.4)
Any DIS disorder except substance use or phobia	8.3 (0.3)	9.4 (0.3)	13.8 (0.4)
Substance use disorders	3.8 (0.3)	6.0 (0.3)	16.4 (0.4)
Alcohol abuse/dependence	2.8 (0.2)	4.7 (0.2)	13.3 (0.4)
Drug abuse/dependence	1.3 (0.1)	2.0 (0.1)	5.9 (0.2)
Schizophrenic/schizophreniform disorders	0.7 (0.1)	0.9 (0.1)	1.5 (0.1)
Schizophrenia	0.6 (0.1)	0.8 (0.1)	1.3 (0.1)
Schizophreniform disorder	0.1 (0.0)	0.1 (0.0)	0.1 (0.0)
Affective disorders	5.1 (0.2)	5.8 (0.3)	8.3 (0.3)
Manic episode	0.4 (0.1)	0.5 (0.1)	0.8 (0.1)
Major depressive episode	2.2 (0.2)	3.0 (0.2)	5.8 (0.3)
Dysthymia <sup>2</sup>	3.3 (0.2)	3.3 (0.2)	3.3 (0.2)
Anxiety disorders	7.3 (0.3)	8.9 (0.3)	14.6 (0.4)
Phobia	6.2 (0.2)	7.7 (0.3)	12.5 (0.3)
Panic	0.5 (0.1)	0.8 (0.1)	1.6 (0.1)
Obsessive-compulsive	1.3 (0.1)	1.5 (0.1)	2.5 (0.2)
Somatization disorder	0.1 (0.0)	0.1 (0.0)	0.1 (0.0)
Personality disorder, antisocial personality	0.5 (0.1)	0.8 (0.1)	2.5 (0.2)
Cognitive impairment (severe) <sup>2</sup>	1.3 (0.1)	1.3 (0.1)	1.3 (0.1)

\*The rates are standardized to the age, sex and race distribution of the 1980 noninstitutionalized population of the United States aged 18 years and older.

\*\*DIS indicates Diagnostic Interview Schedule.

<sup>1</sup>SE is the standard error.

<sup>2</sup>Dysthymia and cognitive impairment have no recency information; thus, the rates are the same for all three time periods.

Source: National Institute of Mental Health, Epidemiological Catchment Area Survey, consolidation of data from the five sites surveyed between 1980 and 1984, in Regier, Darrel A., et al., "One-Month Prevalence of Mental Disorders in the United States Based on Five Epidemiological Catchment Area Sites," *Archives of General Psychiatry* (American Medical Association, 1988), 961.

**Table 10. Estimated Number of Non-Institutionalized Persons with Developmental Disabilities by Degree of Activity Limitation: United States, 1979-1980<sup>1</sup>**

### Highlights

- Over 6 million persons, or 2.8 percent of the non-institutionalized population reported an activity limitation with an onset before age 22 caused by a developmental disability.
- More than 1.5 percent, or 3.3 million persons, reported such a limitation in their *major activity*, such as work or school, while only 0.2 percent, or 0.5 million persons, reported they were unable to carry out their major activity as a result of a developmental disability.
- Developmental disabilities affect persons across the life span, and 43 percent with any activity limitation as a result are 22 years of age and over; although 90 percent are under the age of 45.

### Explanatory Notes

This table presents calculations from the 1979 and 1980 National Health Interview Survey (NHIS) on the prevalence of developmental disabilities in the United States with an onset of activity limitation before age 22. Combining data from two years yielded a sample size of approximately 3,200 persons (1,600 per year) who were limited in a major activity and another 500 who reported being unable to perform their major activity. The 1979 and 1980 NHIS samples were used because subsequent NHIS versions did not contain the question on the age of onset for limitation in activities. Developmental disabilities include cerebral palsy, epilepsy, mental retardation, and neurologically-based conditions such as dyslexia. Approximately 95 percent of the count of all persons with a developmental disability in this table are mentally retarded.<sup>2</sup>

The level of functioning must be inferred from the three types of activity limitation defined by the National Center for Health Statistics in the NHIS. These are 1) a limitation in the amount or kind of major activity, such as attending school, ordinary play, or work, 2) inability to perform one's major activity at all, and 3) limitation in non-major activity such as social or recreational activity.

Experts estimate that at any given point in time, approximately 1 percent of the total population are mentally retarded.<sup>3</sup> In terms of lifetime prevalence, the Association for Retarded Citizens (ARC) estimates that approximately 3 percent of the total population will develop mental retardation at some time in their lives. Of this three percent, or 6.6 million persons, ARC estimates that 2.6 million are under the age of 21 years, 89 percent have mild retardation, 6 percent moderate, 3.5 percent severe, and 1.5 percent profound.<sup>4</sup>

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<sup>1</sup>Where Onset of Activity Limitation Occurred before Age 22.

<sup>2</sup>Jacobson, J. W. and Janicki, M. P., "Observed Prevalence of Multiple Developmental Disabilities," *Mental Retardation*, Vol. 21, No. 3, (American Association on Mental Deficiency, June 1983), 87-94.

<sup>3</sup>Amado, A. N., Lakin, K. C., and Menke, J. M., *1990 Chartbook on Services for People with Developmental Disabilities* (University of Minnesota, Center for Residential and Community Services, 1990).

<sup>4</sup>Association for Retarded Citizens, "Introduction to Mental Retardation," *arcfacts*, (Arlington, Texas, 1987).

Table 10. Estimated Number of Non-Institutionalized Persons with Developmental Disabilities by Degree of Activity Limitation: United States, 1979-1980					
All Ages	Total Population	Any Limitation Definition <sup>a</sup>	Persons With Developmental Disabilities		
			Broad <sup>d</sup> Definition	Middle <sup>b</sup> Definition	Narrow <sup>c</sup> Definition
	216,822,717	31,452,826	8,009,111	3,302,275	511,085
Age Group					
0 - 2	9,689,674	147,273	147,273	147,273	39,534
3 - 5	9,166,231	298,713	298,713	298,713	28,826
6 - 12	23,777,029	969,850	969,850	444,362	7,927
13 - 17	19,546,937	1,069,563	1,069,563	380,685	26,096
18 - 21	16,009,188	849,467	849,467	500,668	83,590
22 - 44	71,520,499	6,814,450	1,982,080	1,174,238	232,492
45 - 64	43,496,237	10,432,127	464,778	273,826	61,719
65+	23,616,923	10,771,385	127,389	72,512	20,912

<sup>a</sup> Where onset of activity limitation occurred before age 22.

<sup>b</sup> All persons with an activity limitation, regardless of cause, including individuals with no developmental disability.

<sup>c</sup> Broad definition is any limitation of activity with onset before age 22.

<sup>d</sup> Middle definition is any limitation in major activity with onset before age 22.

<sup>e</sup> Narrow definition is inability to do major activity with onset before age 22.

Source: National Health Interview Survey, 1979-1980. Estimates are annual averages. Produced from public use tapes by Mitchell P. LaPlante, Ph.D., Disability Statistics Program, University of CA, San Francisco, revised 2/14/90, as presented in Thornton, et al. "Design for a National Survey of Persons with Developmental Disabilities," Mathematica Policy Research, Inc.: U.S. Department of Health and Human Services, February 1990.

**Table 11. Satisfaction with Life: A Comparison Between Disabled and Non-Disabled Persons: United States, 1986**

### **Highlights**

- Those indicating they are "disabled" are less likely to be satisfied with life than those reporting they are "non-disabled." Among "disabled persons," 69 percent report they are either "somewhat satisfied" or "very satisfied" with life, compared to 90 percent for the "non-disabled" population.
- By the same token, "disabled" persons were more likely to report being either "somewhat dissatisfied" or "very dissatisfied" with life than their counterparts without a disability (24 versus 6 percent).
- The percentage of the population dissatisfied with life increased with the degree to which the disability caused a limitation of activities. Thirty-three percent of those who could not work, keep house, or participate in other activities were either "somewhat dissatisfied" or "very dissatisfied" with life, compared to only 8 percent of those whose disability caused no limitation.
- Dissatisfaction with life also rose with the severity of the disability, with those having a very severe disability more than 10 times as likely to report they are very dissatisfied as those with a slight disability (2 versus 21 percent).

### **Explanatory Notes**

Data for this table come from a survey of persons with a disability conducted by Louis Harris and Associates for the International Center for the Disabled, in cooperation with the National Council on the Handicapped. The survey is based on 1,000 telephone interviews. The 1,000 persons were selected during pre-screening calls to ascertain disability. A person was defined as disabled if he or she:

- had a disability or health problem that prevented them from participating fully in work, school or other activity,
- had a physical disability, a seeing, hearing or speech impairment, an emotional or mental disability, or a learning disability, or
- considered himself or herself disabled, or said that other people would consider him or her disabled.

Because the sample size is only 1,000 persons, small differences may be due to chance. For this reason, only very general patterns are included in the highlights.

Table 11. Satisfaction with Life: A Comparison Between Disabled and Non-Disabled Persons: United States, 1986

How satisfied are you with life in general – very satisfied, somewhat satisfied, neither satisfied nor dissatisfied, somewhat dissatisfied, or very dissatisfied?

Characteristics	Base Number of Persons	Percent					
		Very Satisfied	Somewhat Satisfied	Percent Who Are Neither Satisfied Nor Dissatisfied	Somewhat Dissatisfied	Very Dissatisfied	Not Sure Refused
Non-disabled persons*	1,064	50	40	3	5	1	1
Total disabled persons	1,000	39	30	3	16	8	3
Age							
16-34 years	190	35	42	4	12	5	1
35-44 years	136	38	26	4	17	15	-
45-54 years	145	28	32	4	22	12	2
55-64 years	232	43	25	2	20	8	3
65 and over	296	43	30	4	11	6	-
Onset of Limitation							
Birth-adolescence	139	40	38	2	8	10	2
Young adult	228	32	33	6	18	9	1
Middle age	216	39	26	3	22	7	3
After age 55	336	38	29	3	16	8	6
Limitation of Activities							
Cannot work, keep house, etc.	455	29	30	3	21	12	4
Limited in amount or kind of work	381	43	31	3	14	6	3
Other activities limited	86	52	29	6	7	2	4
Not limited at all	77	62	29	1	5	3	-
Severity of Disability							
Slight	144	55	31	1	11	2	2
Moderate	310	47	33	4	10	3	2
Somewhat severe	284	31	33	4	23	6	3
Very severe	237	29	25	3	16	21	7

\*Based on a 1985 national sample of adults aged 18 and over who say that they don't have a limiting disability or health problem.

Source: Louis Harris and Associates, *Disabled American's Self-Perception: Bringing Americans into the Mainstream* (International Center for the Disabled, Study No. 854009, 1986), Table 19.

**Table 12. Percentage Who Feel Disability has Prevented Them From Reaching Their Potential as a Person: United States, 1986**

**Highlights**

- The majority of persons with a disability or health problem, 57 percent, believes that their disability has prevented them reaching their full potential as a person.
- This belief varies by degree of activity limitation, from 22 percent (not limited at all) to 69 percent (cannot work, keep house, etc.)
- Severity of limitation is also correlated with this belief, from 29 percent (slight disability) to 72 percent (very severe disability).
- Among persons with a disability, there is a strong relationship between this belief and one's self-perception of his or her disability. Of persons with a disability or health problem, who nonetheless do not consider themselves disabled, 44 percent believe disability has prevented them from reaching their potential in life. However, among persons with a disability or health problem who, indeed, consider themselves disabled, 71 percent believe disability has prevented them from reaching their potential in life.

**Explanatory Notes**

Data for this table come from a survey of persons with a disability conducted by Louis Harris and Associates for the International Center for the Disabled, in cooperation with the National Council on the Handicapped. For a description of this survey, see Table 11.

Table 12. Percentage Who Feel Disability has Prevented Them From Reaching Their Full Abilities as a Person: United States, 1986

Do you feel that your disability or health problem has in any way prevented you from reaching what you feel are your full abilities as a person, or not?				
Characteristic	Base	Percentage		
		Has Prevented	Has Not Prevented	Not Sure/Refused
Total Disabled Persons	1,000	57	40	2
Age				
18-34 years	190	50	46	4
35-44 years	136	60	40	-
45-54 years	145	65	34	1
55-64 years	232	61	30	3
65 and over	296	54	43	3
Onset of Limitation				
Birth-adolescence	139	56	40	4
Young adult	226	64	35	1
Middle age	216	63	36	2
After age 55	336	58	40	3
Limitation of Activities				
Cannot work, keep house, etc.	455	69	26	3
Limited in amount or kind of work	381	56	43	2
Other activities limited	86	30	67	2
Not limited at all	77	22	78	-
Severity of Disability				
Slight	144	29	69	2
Moderate	310	52	45	2
Somewhat severe	284	62	36	1
Very severe	237	72	25	4
Self Perception				
Considers self disabled	484	71	26	2
Does not consider self disabled	504	44	55	2
Satisfaction With Life				
Very/somewhat satisfied	692	49	48	2
Neither satisfied nor dissatisfied	35	63	28	9
Very/somewhat dissatisfied	242	79	20	1

Source: Louis Harris and Associates, Disabled American's Self-Perception: Bringing Americans into the Mainstream (International Center for the Disabled, Study No. 854009, 1986), Table 11.

## **II. Chronic Conditions and Impairments Causing Disability**

**Table 13. Average Annual Number of Selected Chronic Conditions and Percent of Conditions Causing Limitation of Activity by Nature of Limitation and Gender All Ages: United States, 1983-1986**

### **Highlights**

- As a group, orthopedic impairments (which appear under the "Impairments" category, as "curvature of back or spine" through "other orthopedic impairments") were most frequently reported as causing a limitation in either major or outside activity. Arthritis (primarily osteoarthritis) (under the "Skin and Musculoskeletal" category), and heart disease and hypertension (high blood pressure) (under the "circulatory" category) were the second, third, and fourth most frequently reported cause of activity limitation.
- Low prevalence conditions which have a high rate of activity limitation, among those who have them, include mental retardation and absence of leg(s) (under impairments), lung or bronchial cancer (under respiratory), multiple sclerosis (under miscellaneous), and cerebral palsy and blind in both eyes (under impairments).
- Marked differences exist between the most prevalent chronic conditions and the conditions most frequently reported as causing activity limitation. High prevalence conditions not strongly associated with disability include chronic sinusitis, hay fever (without asthma), and chronic bronchitis (under respiratory), and psoriasis and dermatitis (under skin and musculoskeletal).
- The need for assistance in basic life activities (ADL/IADL limitation) constitutes a more severe disability and involves fewer reported conditions than an activity limitation. While 11.7 percent of all reported conditions cause an activity limitation, only 2.6 percent cause a need for help in basic life activities.
- Females have a higher prevalence of conditions and percent causing activity limitation than men for arthritis and high blood pressure, but this may be a function of age rather than gender since there are more women of advanced age than men. Men have a higher prevalence and percentage causing activity limitation for ischemic (coronary) heart disease, speech impairments, and intervertebral disc disorders (men also report more absence of extremities than women, although the activity limitation rates are somewhat lower). Although women report having more chronic conditions than men (230,096 versus 163,803), gender differences in the percent causing an activity limitation are small (12.5 for males versus 11.2 percent for females). However, women generally report more ADL/IADL limitations than men (3.1 versus 2.0 percent).

### **Explanatory Notes**

This table presents prevalence estimates for select chronic conditions and the percent causing activity limitation and need for help in basic life activities (ADL/IADL limitation) among the civilian non-institutionalized population in the United States. The figures are counts of conditions, which exceed the number of separate individuals involved because a person may report multiple conditions or be counted more than once within the same condition. These estimates are based on the National Health Interview Survey (NHIS) conducted by the National Center for Health Statistics (NCHS) for the years 1983-1986. Combining data for four years increases the stability of the estimates and reduces sampling error. Data are annual averages for the four years. Annually, the sample consists of approximately 40,000 eligible households containing about 120,000 persons living at the time of the interview (see Table 1 for a description of the NHIS).

The numbers and percentage of chronic conditions presented are for all causes of activity limitation and need for help in basic life activities. Activity limitation is a broad measure of disability in terms of one's major activity (e. g., play, school, and work) or in terms of other, non-major activity. The need for help in basic life activities measures severe disability in terms of an ADL limitation (needing the help of other persons with personal care needs such as eating, bathing, dressing, or getting around one's home), or, in the absence of an ADL limitation, if one needs the help of other persons in handling routine needs, such as everyday household chores, doing necessary business, shopping or getting around for other purposes (IADL).

Table 13. Average Annual Number of Selected Chronic Conditions and Percent of Conditions Causing Limitation of Activity by Nature of Limitation and Gender All Ages: United States, 1983-1986

Chronic Condition	Both Genders			Males			Females		
	Number of Conditions (1,000s)	Percent Causing		Number of Conditions (1,000s)	Percent Causing		Number of Conditions (1,000s)	Percent Causing	
		Any Activity Limitation	Need for Help in Basic Life Activities <sup>+</sup>		Any Activity Limitation	Need for Help in Basic Life Activities <sup>+</sup>		Any Activity Limitation	Need for Help in Basic Life Activities <sup>+</sup>
All selected chronic conditions	393,899	11.7	2.6	163,803	12.5	2.0	230,096	11.2	3.1
<b>Skin and Musculoskeletal</b>									
Rheumatoid Arthritis	1,223	51.0	14.9	321	43.9	4.4*	902	53.6	18.7
Osteoarthritis/Other Arthropathies	29,245	19.6	5.3	10,351	18.3	3.4	18,893	20.4	6.3
Intervertebral Disk Disorders	3,987	48.7	5.3	2,212	50.4	3.6	1,775	46.6	7.4
Osteomyelitis/Bone Disorders	2,998	21.0	5.9	1,116	15.4	1.5*	1,882	24.3	8.5
Bursitis	4,539	6.2	0.7*	1,812	6.1	0.0	2,727	6.2	1.2*
Psoriasis and Dermatitis	11,329	1.9	0.1*	4,578	1.5	0.0	6,751	2.2	0.2*
Skin Cancer	1,459	2.3*	0.9*	874	2.8*	1.5*	586	1.6*	0.0
Other Selected Skin and Musculoskeletal	27,747	2.1	0.4	11,502	2.8	0.4*	16,245	1.6	0.5
Total	82,527	12.2	2.8	32,766	11.7	1.6	49,761	12.5	3.6
<b>Impairments</b>									
Absence of Arms(s)/Hand(s)	84	43.1	4.1*	78	46.5	4.4*	6*	0.0	0.0
Absence of Leg(s)	289	83.3	39.0	234	82.6	35.0	56*	86.3*	55.8*
Absence of Fingers, Toes, Feet	1,811	7.0	1.3*	1,410	5.5	0.9*	401	12.3*	2.9*
Other Absence	1,031	20.8	4.4*	451	19.9	2.6*	581	21.4	5.8*
Complete Paralysis in Extremity	617	52.7	26.1	340	50.6	23.7	277	55.3	28.9
Cerebral Palsy	274	69.7	22.8	189	70.3	20.4*	85	68.3	28.2*
Partial Paralysis in Extremity	578	59.6	27.5	319	66.8	27.3	259	50.8	27.7
Paralysis in Other Sites (Complete/Partial)	247	47.8	14.1*	138	60.0	10.9*	109	32.4*	18.0*
Curvature of Back or Spine	4,689	14.7	1.4	1,443	15.4	1.2*	3,246	14.4	1.4*
Other Orthopedic Impairment of Back	9,898	27.7	2.8	4,550	27.0	2.0	5,348	28.2	3.5
Orthopedic Impairment in Upper Extremity	3,106	27.9	2.9	1,728	25.8	1.0*	1,377	30.6	5.4
Orthopedic Impairment in Lower Extremity	10,893	26.5	4.8	5,622	26.3	2.5	5,271	26.7	7.3
Other Orthopedic Impairments	316	58.7	14.3*	154	56.6	10.0*	161	60.8	18.4*
Speech Impairment	2,469	18.3	2.3*	1,633	18.8	1.6*	836	17.4	3.7*
Blind in Both Eyes	396	64.5	38.1	191	74.8	48.1	205	54.9	28.8
Cataracts	5,173	10.6	4.4	1,633	10.2	2.2*	3,541	10.8	5.4
Glaucoma	1,707	14.9	5.1	727	12.8	3.7*	980	16.5	6.1
Other Visual Impairment/Retinal Disorders	8,596	14.0	5.4	5,076	11.0	3.2	3,520	18.3	6.6
Deaf in Both Ears	1,700	16.4	3.2*	959	13.5	3.0*	741	20.1	3.5*
Other Hearing Impairments	19,254	4.6	0.9	10,854	4.4	0.7	8,400	4.8	1.2
Mental Retardation	1,202	84.1	19.9	762	86.9	18.7	440	79.3	22.0
Other Selected Impairments	1,371	13.6	2.5*	756	15.9	3.3*	615	10.7	1.7*
Total	75,701	18.5	4.1	39,247	18.1	3.1	36,455	19.0	5.1

Table 13 (Continued). Average Annual Number of Selected Chronic Conditions and Percent of Conditions Causing Limitation of Activity by Nature of Limitation and Gender All Ages: United States, 1983-1986 (Continued)

Chronic Condition	Both Genders			Males			Females		
	Number of Conditions (1,000s)	Percent Causing		Number of Conditions (1,000s)	Percent Causing		Number of Conditions (1,000s)	Percent Causing	
		Any Activity Limitation	Need for Help in Basic Life Activities <sup>+</sup>		Any Activity Limitation	Need for Help in Basic Life Activities <sup>+</sup>		Any Activity Limitation	Need for Help in Basic Life Activities <sup>+</sup>
<b>Digestive</b>									
Ulcers	4,469	9.7	1.0*	2,107	11.8	0.9*	2,362	7.8	1.1*
Abdominal Hernia	4,830	12.5	2.4	2,427	11.3	1.2*	2,403	13.7	3.6
Enteritis and Colitis	2,392	7.2	0.8*	721	8.7	0.4*	1,671	6.6	1.0*
Cancer of Digestive Sites	228	45.3	15.9*	107	45.1	10.5*	121	45.4	20.6*
Other Selected Digestive Disorders	20,556	3.6	0.8	7,296	3.1	0.3*	13,260	3.9	1.1
Total	32,475	6.3	1.2	12,658	6.8	0.7	19,817	6.0	1.5
<b>Circulatory</b>									
Rheumatic Fever	1,536	15.7	1.9*	537	11.2	0.6*	999	18.2	2.6*
Ischemic Heart Disease	6,948	35.0	8.1	3,978	36.1	4.4	2,970	33.6	13.0
Heart Rhythm Disorders	7,404	7.2	1.5	2,735	8.1	1.4*	4,669	6.7	1.5
Other Heart Disease/Disorders	4,708	46.9	13.6	2,075	48.7	11.7	2,633	45.4	15.0
Hypertension	28,689	12.4	2.2	12,242	9.9	1.2	16,446	14.2	2.9
Cerebrovascular Disease	2,599	38.2	22.9	1,269	39.6	20.3	1,331	36.8	25.3
Arteriosclerosis	3,008	12.1	5.1	1,532	12.0	3.8*	1,476	12.2	6.5
Phlebitis, Varicose Veins	7,891	5.5	0.8	1,584	7.5	0.8*	6,306	4.9	0.8*
Other Selected Circulatory	11,519	3.8	1.2	5,153	4.0	0.8*	6,365	3.6	1.5
Total	74,302	15.1	3.9	31,105	15.0	3.1	43,195	14.4	4.5
<b>Respiratory</b>									
Chronic Bronchitis	11,196	3.6	0.6	4,465	3.4	0.5*	6,732	3.8	0.7*
Asthma	8,869	20.6	1.3	4,069	19.1	0.7*	4,800	21.8	1.7
Hay Fever	20,431	1.5	0.0	9,424	1.7	0.0	11,007	1.3	0.1*
Sinusitis	31,969	0.4	0.1*	13,455	0.5	0.1*	18,514	0.4	0.1*
Emphysema	2,074	43.6	9.6	1,399	44.0	8.4	675	42.8	12.2
Lung or Bronchial Cancer	200	74.8	34.5	110	79.9	32.4*	90	68.7	37.1*
Pneumoconiosis/Asbestosis	368	38.5	8.1*	346	40.0	8.6*	22*	13.7*	0.0
Other Selected Respiratory	8,729	5.5	1.2	3,417	8.1	1.4*	5,312	3.7	1.0
Total	83,836	5.2	0.7	36,685	6.2	0.8	47,152	4.4	0.7

Table 13 (Continued). Average Annual Number of Selected Chronic Conditions and Percent of Conditions Causing Limitation of Activity by Nature of Limitation and Gender All Ages: United States, 1983-1986 (Continued)

Chronic Condition	Both Genders			Males			Females		
	Number of Conditions (1,000s)	Percent Causing		Number of Conditions (1,000s)	Percent Causing		Number of Conditions (1,000s)	Percent Causing	
		Any Activity Limitation	Need for Help in Basic Life Activities <sup>†</sup>		Any Activity Limitation	Need for Help in Basic Life Activities <sup>†</sup>		Any Activity Limitation	Need for Help in Basic Life Activities <sup>†</sup>
Miscellaneous									
Diabetes	6,096	35.4	9.4	2,609	32.3	5.8	3,487	37.8	12.0
Anemias	3,409	4.6	0.3*	547	1.5*	0.0	2,862	5.2	0.3*
Kidney Disorders	3,559	9.8	2.4	1,187	9.0	1.0*	2,371	9.9	3.2
Female Genital Disorders	6,379	3.7	0.2*	na	na	na	6,379	3.7	0.2*
Epilepsy	1,162	41.0	6.3	578	36.4	2.0*	584	45.5	10.5
Multiple Sclerosis	171	70.6	40.7	48*	36.7*	20.0*	123	84.0	48.9
Migraine Headache	7,934	2.9	0.3*	2,023	4.0	0.0	5,911	2.6	0.4*
Cancer of Female Breast	443	27.4	4.6*	na	na	na	443	27.4	4.6*
Cancer of Genitourinary Sites	302	41.8	8.5*	100	55.3	15.3*	202	35.2	5.1*
Other Selected Miscellaneous	15,602	4.0	1.0	4,251	4.7	0.6*	11,352	3.8	1.1
Total	45,357	10.2	2.3	11,343	13.4	2.0	33,714	9.1	2.4

\*Figure has low statistical reliability or precision (relative standard error exceeds 30 percent).

<sup>†</sup>Includes Activities of Daily Living (persons aged 6 years and over) and Instrumental Activities of Daily Living (persons aged 18 years and over).

Source: National Health Interview Survey, 1983-1986. Data are estimates based on household interviews of the civilian non-institutionalized population, as presented in LaPlante, M. P., Disability Risks of Chronic Illness and Impairments. Disability Statistics Report 2 (National Institute on Disability and Rehabilitation Research, 1991), Table 1.

**Table 14. Average Annual Number of Days of Restricted Activity from Selected Chronic Conditions and Number of Days per Condition, by Age and Sex: United States, 1986-88**

### **Highlights**

- Among reported chronic conditions, orthopedic impairments, collectively, caused the greatest number of restricted activity days, or 416.5 million annually. Arthritis and heart disease were second and third, respectively, with 377.7 and 338.5 million restricted activity days. This follows a pattern similar to the conditions causing activity limitation, as shown in the previous table.
- These three conditions caused the greatest number of restricted activity days in both males and females but in different orders. For males the sequence was orthopedic impairments, heart disease, and arthritis. For females it was arthritis, orthopedic impairments, and heart disease.
- Age influenced these patterns, with orthopedic impairments causing the greatest number of restricted activity days among those under 65 years of age and arthritis for those above that age. Persons 65 years of age and over had a higher number of days per condition than their younger counterparts, except for ischemic (coronary) heart disease.
- Regardless of the prevalence, malignant neoplasms (cancer) of lung, bronchus, and other respiratory sites caused the greatest number of restricted activity days per condition (88.1), followed by complete paralysis (39.2), disorders of bone or cartilage (37.7), and cerebrovascular disease (36.7).

### **Explanatory Notes**

Data for this table come from the National Health Interview Survey (NHIS) for the years 1986-1988. The figures are average annual estimates for these three years. See Table 1 for a description of the NHIS annual sample. Except for persons who are bed-ridden, restrictive activity days measure the short-term (though recurring) effects of long-term disability. The number of restricted activity days is the number of days a person experienced at least one of the following:

- 1) a bed day, during which a person stayed in bed more than half a day because of illness or injury,
- 2) a work-loss day, on which a currently employed person 18 years of age or over missed more than half a day from a job or business,
- 3) a school loss day, on which a student 5-17 years of age missed more than half a day from the school in which he or she was currently enrolled, or
- 4) a cut-down day, on which a person cuts down for more than half a day on things he usually does.

The restricted activity days are *condition days*, that is the number of days during which a chronic condition caused a person to restrict his or her activity. A person may have more than one condition causing the same day of restricted activity or be counted more than once within a particular category, e.g. heart disease. For this reason the number of condition days exceeds the number of persons involved.

Only conditions for which the total number of restricted activity days for all persons exceeded 14 million days are used, which is the cutoff for reliability.

Table 14. Average Annual Number of Days of Restricted Activity from Selected Chronic Conditions and Number of Days Per Condition, by Age and Sex: United States, 1986-88

Selected Chronic Conditions	All Persons		Age				Sex			
	Number of Days in Thousands	Days Per Condition	Under 65 Years		65 Years and Older		Male		Female	
			Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition
<b>Circulatory Conditions</b>										
Heart Disease	338,541	17.4	157,624	14.0	180,917	22.1	173,602	19.4	164,939	15.7
Ischemic Heart Disease	173,129	24.1	100,161	30.3	72,968	18.8	101,959	24.1	71,170	24.0
Heart Rhythm Disorders	29,777	3.9	17,083	3.0	12,694*	6.1*	4,622*	1.7*	25,155	5.1
Other Selected Diseases of the Heart (Excludes hypertension)	127,871	33.0	37,664	21.0	90,208	43.4	62,403	38.5	65,468	29.1
Rheumatic Fever with or Without Heart Disease	15,487	8.9	10,111*	7.5*	5,376*	13.6*	4,139*	7.8*	11,349*	9.3*
High Blood Pressure (Hypertension)	116,834	4.1	66,347	3.6	50,587	4.7	48,905	3.9	68,030	4.2
Cerebrovascular Disease	98,261	36.7	25,644	24.4	72,617	44.6	49,384	39.5	48,877	34.2
Hardening of the Arteries	42,155	16.4	12,644*	14.5*	29,512	17.3	25,769	19.2	16,386	13.2
Poor Circulation	18,099	19.1	4,851*	12.1*	13,248*	24.3	6,000*	16.9*	12,099*	20.5*
<b>Respiratory Conditions</b>										
Chronic Bronchitis	58,725	4.9	42,976	4.2	15,750	8.4	22,999	4.7	35,726	5.0
Emphysema	55,010	27.8	22,674	26.3	32,336	28.9	33,894	26.9	21,116	29.2
Asthma	88,742	9.1	65,029	7.6	23,713	20.6	36,783	7.9	51,959	10.2
Hay Fever or Allergic Rhinitis Without Asthma	30,000	1.3	24,865	1.2	5,135*	2.6*	11,298*	1.1*	18,701	1.6
Chronic Sinusitis	51,651	1.6	46,411	1.6	5,240*	1.1*	13,284*	1.0*	38,367	2.0
Malignant Neoplasms of Lung Bronchus and other Respiratory Sites	16,563	88.1	6,782*	92.9*	9,781*	85.1*	12,964*	111.8*	3,599*	50.0*
Other Diseases of the Lung	27,902	23.3	15,985	17.9	11,916*	39.2*	10,652*	21.8	17,249	24.2
<b>Digestive Conditions</b>										
Ulcer, Gastric, Duodenal and/or Peptic	29,224	6.8	23,372	6.7	5,852*	6.9*	13,205*	6.7*	16,019	6.9
Hernia of Abdominal Cavity	36,786	7.9	28,122	9.6	8,664*	5.1*	22,754	9.7	14,032	6.1
Gastritis and Duodenitis	14,328	5.1	12,918*	5.8*	1,410*	2.3*	6,436*	5.9*	7,892*	4.5*
Enteritis and Colitis	19,135	8.3	14,042	8.0	5,093*	9.4*	2,954*	4.2*	16,181	10.1

Table 14. Average Annual Number of Days of Restricted Activity from Selected Chronic Conditions and Number of Days Per Condition, by Age and Sex: United States, 1986-88

Selected Chronic Conditions	All Persons		Age				Sex			
	Number of Days in Thousands	Days Per Condition	Under 65 Years		65 Years and Older		Male		Female	
			Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition
Impairments										
Blindness and Other Visual Impairments	34,986	4.3	22,248	3.9	12,738*	5.2*	11,938*	2.4*	23,048	6.9
Absence of Extremities or Parts of Extremities (Excluding absence of tips of fingers or toes only)	21,086	12.7	10,764*	10.3*	10,322*	16.7*	14,669	11.2	6,417*	18.0*
Absences of Bone, Joint, Muscle of Extremity	14,274	23.6	3,537*	11.0*	10,737*	38.3*	3,024*	9.9*	11,250*	37.5*
Paralysis of Extremities, Complete or Partial	42,778	31.2	27,741	29.6	15,038	34.6	23,332	30.6	19,446	31.9
Paralysis of Extremities, Complete	18,901	39.2	16,234	45.1	2,668*	21.9*	14,472	54.6	4,430*	20.3*
Paralysis of Extremities, Partial	23,877	26.9	11,507*	20.0*	12,370*	39.5*	8,861*	17.8*	15,016	38.4
Orthopedic Impairments, Total	416,479	13.1	329,094	12.6	87,385	15.6	200,533	13.1	215,946	13.1
Orthopedic Impairments of Back	195,289	12.3	156,433	11.7	38,856	15.5	87,910	12.9	107,380	11.8
Curvature of Other Impairments of Back or Spine	39,152	8.2	36,530	9.4	2,621*	3.0*	16,268	11.1	22,884	6.9
Orthopedic Impairments of Upper Extremities	62,292	19.5	54,342	20.7	7,950*	14.1*	36,533	20.6	25,759	18.2
Orthopedic Impairment - Shoulder	48,358	22.4	42,406	23.3	5,952*	17.8*	30,573	24.4	17,785	19.7
Orthopedic Impairments of Lower Extremities	153,541	12.5	114,285	11.6	39,256	16.0	73,209	11.2	80,333	13.9

Table 14. Average Annual Number of Days of Restricted Activity from Selected Chronic Conditions and Number of Days Per Condition, by Age and Sex: United States, 1986-88

Selected Chronic Conditions	All Persons		Age				Sex			
	Number of Days in Thousands	Days Per Condition	Under 65 Years		65 Years and Older		Male		Female	
			Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition
<b>Musculoskeletal</b>										
Arthritis	377,703	12.1	198,389	11.2	170,314	13.2	92,421	8.6	285,282	13.9
Sciatica (Including lumbago)	23,632	12.1	18,662	13.2	4,971*	9.0*	5,628*	8.6*	18,004	13.8
Intervertebral Disc Disorders	124,113	30.0	101,835	29.1	22,279	34.7	69,319	29.4	54,794	30.7
Bone Spur or Tendinitis, Not Otherwise Specified	22,716	10.7	18,264	10.5	4,452*	11.5*	11,300*	11.8*	11,416	9.8*
Disorders of Bone or Cartilage	50,792	37.7	33,823	41.4	17,149	32.1	17,531	44.2	33,441	35.1
Bursitis, Not Elsewhere Classified	30,799	7.0	25,806	7.7	4,993*	4.8*	8,228*	4.7*	22,570	8.5
<b>Miscellaneous</b>										
Conditions of Nervous System and Sense Organs										
Cataracts	24,510	4.4	7,466*	6.5*	17,044	3.9	10,298*	5.6*	14,213	3.8
Epilepsy	20,048	17.4	20,048	18.9	-*	-*	11,631*	22.8*	8,418*	13.1*
Migraine Headache	46,758	5.3	42,046	5.1	4,712*	9.1*	12,747*	5.7*	34,011	5.2
Other Headache (Excludes tension headache)	34,493	3.9	31,439	4.0	3,054*	3.3*	11,857*	4.5*	22,636	3.7
Endocrine, Nutritional and Metabolic Diseases and Immunity Disorders										
Gout	15,794	7.2	9,002*	6.9*	6,793*	7.6*	8,807*	5.8*	6,987*	10.5*
Diabetes	100,719	15.5	59,965	15.9	40,754	15.0	40,240	13.3	60,479	17.5
Diseases of the Blood and Blood Forming Organs										
Anemias	17,619	5.1	12,022*	4.2	5,597*	8.9*	6,154*	8.9*	11,465*	4.1*
Genitourinary Conditions										
Kidney Infections	14,531	9.3	13,800*	10.6*	730*	2.8*	3,072*	12.0	11,458*	8.8
Other Disorders of Female Genital Organs	23,164	11.8	21,638	11.7	1,525*	11.9*	-	-	23,164	11.8

\*Relative standard error is equal to or greater than 30 percent of the estimate - The number of cases is too small for a valid estimate.

**Table 15. Average Annual Days of Bed Disability from Selected Chronic Conditions and Number of Days per Condition, by Age and Sex: United States, 1986-88**

**Highlights**

- Heart disease, arthritis, and orthopedic impairments were responsible for the greatest annual number of bed disability days, with 143.8 million, 126.7 million, and 120.1 million days, respectively.
- For males, heart disease caused the most bed disability days (62.4 million days), while for females it was arthritis (95.7 million days).
- Regardless of their overall prevalence, the greatest number of bed disability days per condition were caused by cerebrovascular disease (19.2), paralysis of extremities, complete or partial (16.4), and emphysema (13.1).
- For persons under 65 years of age, orthopedic impairments caused the greatest number of bed disability days, while heart disease caused the most number of days for those 65 and over.

**Explanatory Notes**

Data for this table come from the National Health Interview Survey (NHIS) for the years 1986-1988. The figures are average annual estimates for these three years. See Table 1 for a description of the annual NHIS sample.

A bed disability day is a day during which a person stayed in bed more than half a day because of illness or injury. The bed disability days are *condition days*, that is the number of days during which a chronic condition caused a person to stay in bed. A person may have more than one condition causing the same day of bed disability or be counted more than once within a particular condition category, e.g., heart disease. For this reason the number of condition days exceeds the number of persons involved.

Only conditions for which the total number of bed disability days for all persons exceeded 14 million days are used, which is the cutoff for reliability.

Table 15. Average Annual Number of Days of Bed Disability from Selected Chronic Conditions and Number of Days Per Condition, by Age and Sex: United States, 1986-88

Selected Chronic Conditions	All Persons		Age				Sex			
	Number of Days in Thousands	Days Per Condition	Under 65 Years		65 Years and Older		Male		Female	
			Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition
<b>Circulatory Conditions</b>										
Heart Disease	143,786	7.4	59,484	5.3	84,302	10.3	62,434	7.0	81,353	7.7
Ischemic Heart Disease	70,900	9.9	36,986	11.2	33,914	8.7	38,695	9.1	32,205	10.9
Other Selected Diseases of the Heart (Excludes hypertension)	56,185	14.5	13,744*	7.7*	42,440	20.4	19,509	12.1	36,576	16.2
High Blood Pressure (Hypertension)	40,249	1.4	21,103	1.2	19,146	1.8	20,341	1.6	19,908	1.2
Cerebrovascular Disease	51,531	19.2	9,292*	8.9*	42,239	25.9	23,370	18.7	28,161	19.7
Hardening of the Arteries	17,543	6.8	2,624*	3.0*	14,919	8.8	9,708*	7.2*	7,835*	6.3*
<b>Respiratory Conditions</b>										
Chronic Bronchitis	26,963	2.2	16,799	1.7	10,164*	5.4*	12,204*	2.5*	14,758	2.1
Emphysema	25,896	13.1	12,749*	14.8	13,147*	11.8*	13,782*	10.9*	12,114*	16.8*
Asthma	39,217	4.0	25,511	3.0	13,706*	11.9*	16,023	3.4	23,194	4.6
Chronic Sinusitis	16,144	0.5	14,084	0.5	2,060*	0.5*	3,708*	0.3*	12,436*	0.6*
<b>Impairments</b>										
Paralysis of Extremities, Complete or Partial	22,426	16.4	15,372	16.4	7,054*	16.2	11,842*	15.5	10,584	17.4*
Orthopedic Impairments; Total	120,079	3.8	97,523	3.7	22,555	4.0	45,349	3.0	74,730	4.5
Orthopedic Impairment of Back	74,602	4.7	63,056	4.7	11,546*	4.6	27,553	4.0	47,049	5.2
Orthopedic Impairments of Lower Extremities	34,847	2.8	25,434	2.6	9,412*	3.8*	13,423*	2.1	21,424	3.7
<b>Musculoskeletal</b>										
Arthritis	126,693	4.1	60,777	3.4	65,916	4.9	30,982	2.9	95,711	4.7
Intervertebral Disc Disorders	47,375	11.4	40,958	11.7	6,417*	10.0*	23,612	10.0	23,763	13.3
Disorders of Bone or Cartilage	14,663	10.9	10,267*	12.6*	4,397*	8.2	5,950*	15.0*	8,713*	9.1

Table 15. Average Annual Number of Days of Bed Disability from Selected Chronic Conditions and Number of Days Per Condition, by Age and Sex: United States, 1986-88

Selected Chronic Conditions	All Persons		Age				Sex			
	Number of Days in Thousands	Days Per Condition	Under 65 Years		65 Years and Older		Male		Female	
			Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition	Number of Days in Thousands	Days Per Condition
Miscellaneous										
Conditions of Nervous System and Sense Organs										
Other Headache (Excludes Tension Headache)	15,775	1.8	13,597*	1.7*	2,178*	2.3*	3,338*	1.3*	12,437*	2.0
Endocrine, Nutritional and Metabolic Diseases and Immunity Disorders										
Diabetes	51,884	8.0	26,608	7.0	25,276	9.3	17,516	5.8	34,368	9.9

\*Relative standard error is equal to or greater than 30 percent of the estimate - The number of cases is too small for a valid estimate.

Source: National Center for Health Statistics, National Health Interview Survey, Vital and Health Statistics, upcoming Series 10 Report.

### **III. Disability, Health Status, and Health Care Utilization**

**Table 16. Percent and Number of Persons by Activity Limitation and Health Status:  
United States, 1984-88**

### Highlights

- The overwhelming majority of persons in the population were not limited in activity and were in good to excellent health (82.1 percent).
- Of the remaining 17.9 percent of the population, 6.1 percent had both a limitation in activity and were in fair or poor health, 7.7 percent were limited in activity but in good to excellent health, and 4.1 percent were in only fair or poor health but were not limited in activity.
- The percentages of each of the groups who had an activity limitation and/or fair or poor health increased with age. For persons 65 years of age and older, 48.1 percent were limited in activity, in fair or poor health, or both, compared to only 7.0 percent of persons under age 18. Persons 65 and over were also more likely than their younger counterparts to be *both* limited in activity and in fair or poor health.
- Differences based on gender were relatively small when compared to other demographic characteristics. About 83.0 percent of males and 81.2 percent of females reported both good to excellent health and no activity limitation.
- For persons in families with an annual income of \$10,000 or less, nearly one-third (32.6 percent) were limited in activity, in fair or poor health, or both. The corresponding figures for persons with family incomes of \$35,000 or more was 10 percent.
- White persons were less likely to be limited in activity and in fair to poor health than black persons, 17.5 percent versus 21.2 percent.
- While persons with activity limitation and in fair to poor health made up only 6.1 percent of the population, they comprised 36.6 percent of restricted activity days, 19.8 percent of physician contacts, and 40.5 percent of the short-stay hospital days (see source document, page 3).

### Explanatory Notes

Data in this table come from the National Health Interview Survey (NHIS), a continuous, cross-sectional nationwide survey conducted by household interview. For a detailed description of the NHIS, see Table 1. Persons with disabilities (activity limitation due to chronic conditions and impairments) constitute a relatively small proportion of the population when cross-classifying in terms of health status and demographic characteristics. To reduce the associated sampling error, the NHIS sample for the five years 1984-88 was used, consisting of about 194,000 eligible households, containing approximately 504,000 persons living at the time of the interview. The total non-interview rate for NHIS was about 4.3 percent. Estimates were produced by summing the frequencies for the five-year period and dividing by five. Thus, the frequencies, percents and rates represent average annual estimates for this five-year period and not estimates for the whole period.

The sampling errors associated with the estimates shown in this table may be obtained by consulting Appendix I of the NCHS Current Estimates report for 1989 and using the appropriate formulas and the parameters for five years of data shown in the Advance data report from which this data and text come.

Population estimates restricted to age, sex, or race categories are adjusted to U.S. Bureau of the Census estimates and therefore have no sampling variation.

Table 18. Average Annual Percent Distribution and Number of Persons by Limitation of Activity Due to Chronic Conditions and Respondent-Assessed Health Status, According to Selected Socio-demographic Characteristics: United States 1984-88

Characteristic	Total <sup>1</sup>	Limited in Activity		Not Limited in Activity		Total <sup>2</sup>
		Fair or Poor Health	Good to Excellent Health	Fair or Poor Health	Good to Excellent Health	
	Percent Distribution					
All persons <sup>3</sup>	100.0	6.1	7.7	4.1	82.1	236,122
Age						
Under 18 years	100.0	0.9	4.2	1.9	93.0	63,035
Under 5 years	100.0	0.7	1.6	2.3	95.5	18,154
5-17 years	100.0	1.0	5.3	1.7	92.0	44,882
18-44 years	100.0	2.6	5.9	3.2	88.3	100,740
18-24 years	100.0	1.2	4.5	2.9	91.4	26,790
25-44 years	100.0	3.1	6.4	3.4	87.2	73,950
45-64 years	100.0	12.3	10.6	5.9	71.2	44,788
65 years and over	100.0	21.1	17.3	9.7	52.0	27,558
65-69 years	100.0	20.5	17.5	5.9	55.1	9,477
70-74 years	100.0	18.4	13.9	11.7	56.0	7,485
75 years and over	100.0	23.5	19.4	10.7	46.4	10,587
Sex and Age						
Male, all ages	100.0	5.6	7.7	3.7	83.0	114,181
Under 5 years	100.0	0.7	1.8	2.5	95.0	9,290
5-17 years	100.0	1.1	6.2	1.5	91.2	22,936
18-24 years	100.0	1.1	5.0	2.2	91.7	13,082
25-44 years	100.0	2.8	6.9	2.8	87.6	36,172
45-64 years	100.0	11.8	10.2	5.7	72.4	21,347
65 years and over	100.0	21.0	16.7	10.0	52.4	11,354
Female, all ages	100.0	6.6	7.6	4.5	81.2	121,941
Under 5 years	100.0	0.6	1.5	2.0	95.9	8,864
5-17 years	100.0	0.9	4.2	1.9	92.9	21,946
18-24 years	100.0	1.3	4.1	3.6	91.0	13,708
25-44 years	100.0	3.3	6.0	3.9	86.8	37,778
45-64 years	100.0	12.7	11.0	6.1	70.2	23,441
65 years and over	100.0	21.1	17.7	9.4	51.8	16,204
Race and Age						
White, all ages	100.0	5.8	8.0	3.7	82.4	200,424
Black, all ages	100.0	8.7	5.8	6.7	78.8	28,543
Family Income						
Less than \$10,000	100.0	14.8	10.6	7.2	67.4	33,392
\$10,000-\$19,999	100.0	8.0	8.7	5.5	77.8	45,832
\$20,000-\$34,999	100.0	3.7	7.0	3.2	86.1	62,655
\$35,000 or more	100.0	2.0	6.1	1.9	90.0	62,667

<sup>1</sup> Excludes persons whose health status was not assessed.

<sup>2</sup> Includes persons whose health status was not assessed.

<sup>3</sup> Includes persons of races other than white or black and persons with unknown family income.

Source: National Center for Health Statistics, 1984-88 National Health Interview Survey, *Advance Data from Vital and Health Statistics*, Number 197

**Table 17: Restricted Activity Days by Activity Limitation and Health Status: United States, 1984-88**

**Highlights**

- The estimated number of restricted activity days per person annually ranges from a low of 7.4 days for those with good to excellent health and no activity limitation, to a high of 88.2 days for those with both activity limitation and fair to poor health status.
- The average annual number of restricted activity days per year was similar for the two mixed groups -- those with limitation in activity but good to excellent health (28.5 days per person), and those without a limitation but fair to poor health (26.3 per person). The same pattern existed for the number of physician contacts (Table 18) and short-stay hospital days (Table 19) as well. This suggests that for these three measures of morbidity (restricted activity days, physician contacts, and short-stay hospital days) health status and disability status have similar effects.
- As with other measures of disability, the number of restricted activity days increased with age, low income status, and for females and black persons.

**Explanatory Notes**

A restricted activity day is a day on which a person stays in bed, misses work or school, or cuts down on his or her usual activity because of illness, impairment, or injury. For a detailed description of restricted activity days, see Table 14.

Unlike Table 14 which uses condition days, Table 17 measures restricted activity in person days. Also, contrary to Table 14 where the restricted activity shown is caused only by chronic conditions, the Table 17 figures include days associated with chronic conditions, acute conditions, or both. However, according to the source document, inclusion of acute conditions does not affect the strong, positive correlation between activity limitation (long-term disability) and restricted activity.

Data in this table come from the National Health Interview Survey (NHIS) for the years 1984-88. For a detailed description of the NHIS see Table 1. For a description of this sample, see Table 16.

For another perspective on this subject, using the 1984 Survey of Income and Program Participation (SIPP), see Tables O and P in the introduction.

Table 17. Average Annual Number Per Person Per Year and Number of Restricted-Activity Days, by Limitation of Activity Due to Chronic Conditions, Respondent-Assessed Health Status, and Selected Sociodemographic Characteristics: United States, 1984-88

Characteristic	Total <sup>1</sup>	Limited in Activity		Not Limited In Activity		Total <sup>1</sup>
		Fair or Poor Health	Good to Excellent Health	Fair or Poor Health	Good to Excellent Health	
Number Per Person Per Year						
All persons <sup>2</sup>	14.8	63.2	28.5	26.3	7.4	3,492,089
<b>Age</b>						
Under 5 years	10.2	84.4	24.9	34.6	8.8	184,942
5-17 years	8.8	56.9	18.0	22.2	7.5	385,341
18-24 years	9.6	71.4	25.0	26.9	7.5	258,194
25-44 years	12.1	91.5	31.3	27.7	7.3	897,053
45-64 years	19.8	88.6	29.7	21.4	6.3	886,192
65 years and over	31.6	90.1	30.7	29.7	8.4	870,369
<b>Sex and Age</b>						
Male, all ages	12.9	83.2	25.6	23.2	6.5	1,468,806
Under 5 years	10.3	81.4	25.9	33.8	8.8	95,678
5-17 years	8.2	52.3	16.4	21.0	6.9	186,981
18-24 years	7.7	67.1	22.4	21.2	5.8	100,399
25-44 years	10.4	90.4	28.3	21.9	6.1	377,990
45-64 years	18.2	85.1	29.3	19.9	5.6	389,108
65 years and over	28.1	82.3	25.9	26.9	7.0	318,651
Female, all ages	16.6	92.2	31.2	28.8	8.3	2,023,283
Under 5 years	10.1	87.9	23.7	35.5	8.8	89,263
5-17 years	9.5	62.4	20.5	23.1	8.2	208,360
18-24 years	11.5	75.3	28.0	30.2	9.1	157,795
25-44 years	13.7	92.5	34.6	31.7	8.5	519,063
45-64 years	21.2	91.5	30.1	22.7	6.9	497,084
65 years and over	34.0	95.5	33.9	31.8	9.4	551,718
<b>Race and Ages</b>						
White, all ages	14.7	87.7	28.1	27.3	7.6	2,943,152
Black, all ages	16.7	89.8	32.6	24.3	6.8	477,113
<b>Family Income</b>						
Less than \$10,000	25.2	94.7	31.7	28.7	8.5	841,379
\$10,000 - \$19,999	16.9	85.1	28.9	25.8	7.9	772,558
\$20,000 - \$34,999	12.4	83.6	26.6	24.1	7.7	776,856
\$35,000 or more	10.0	82.8	26.8	25.5	6.9	627,806

<sup>1</sup>Includes persons whose health status was not assessed.

<sup>2</sup>Includes persons of races other than white or black and persons with unknown family income.

Source: National Center for Health Statistics, 1984-88 National Health Interview Survey, Advance Data from Vital and Health Statistics, Number 197.

**Table 18: Physician Contacts by Activity Limitation and Health Status: United States, 1984-88**

**Highlights**

- Physician contacts range from 3.8 per person per year for those not limited in activity and in good health, to 17.1 per person per year for those who were limited in activity and in fair to poor health.
- The average annual number of physician contacts per year was similar for the two mixed groups - those with limitation in activity but good to excellent health (9.5 contacts per person), and those without a limitation but fair to poor health (8.8 contacts per person). The same pattern existed for the number of restricted activity days (Table 17) and short-stay hospital days (Table 19) as well. This suggests that for these three measures of morbidity (restricted activity days, physician contacts, and short-stay hospital days) health status and disability status have similar effects.
- Persons with annual family incomes below \$10,000 who were both limited in activity and in fair to poor health were less likely to use physician services than their counterparts with incomes of \$35,000 or over (16.0 versus 22.9 contacts). This was in spite of the fact that low income is associated with disability, and disability is associated with utilization of physician services. A similar pattern existed for those of advanced age and black persons.

**Explanatory Notes**

A physician contact is defined as a contact with a physician or a medical assistant working under the supervision of a physician for the purposes of treatment, diagnosis, or consultation. Contacts of this nature over the telephone are included, but contacts with medical personnel while an overnight patient in a hospital are not. Visits to a hospital clinic or emergency room are included.

Data in this table come from the National Health Interview Survey (NHIS) for the years 1984-88. For a detailed description of the NHIS, see Table 1. For a description of this sample, see Table 16.

For another perspective on this subject, using the 1984 Survey of Income and Program Participation (SIPP), see Tables O and P in the introduction.

Table 18. Average Annual Number Per Person Per Year and Number of Physician Contacts, by Limitation of Activity Due to Chronic Conditions, Respondent-Assessed Health Status, and Selected Sociodemographic Characteristics: United States, 1984-88

Characteristic	Total <sup>1</sup>	Limited in Activity		Not Limited in Activity		Total <sup>1</sup>
		Fair or Poor Health	Good to Excellent Health	Fair or Poor Health	Good to Excellent Health	
Number Per Person Per Year						
All persons <sup>2</sup>	5.3	17.1	9.5	8.8	3.8	1,244,439
<b>Age</b>						
Under 5 years	6.6	28.2	14.3	14.8	6.1	119,676
5-17 years	3.3	16.4	7.7	6.6	2.8	146,154
18-24 years	4.2	17.2	8.5	9.2	3.6	111,521
25-44 years	4.8	20.1	9.9	9.6	3.7	355,082
45-64 years	6.1	18.9	9.6	7.5	3.7	275,332
65-74 years	8.0	15.8	9.7	8.7	4.7	135,885
75 years and over	9.5	16.2	10.1	9.4	5.9	100,788
<b>Sex and Age</b>						
Male, all ages	4.4	15.6	8.1	7.7	3.2	503,891
Under 18 years	4.2	19.4	8.1	9.5	3.8	136,841
18-44 years	3.3	17.0	7.5	7.2	2.5	162,419
45-64 years	5.3	15.4	8.2	6.6	3.1	113,258
65 years and over	8.0	14.7	9.1	8.7	4.9	91,374
Female, all ages	6.1	18.3	10.8	9.6	4.4	740,548
Under 18 years	4.2	18.3	8.9	9.4	3.8	128,989
18-44 years	5.9	22.0	12.0	11.0	4.8	304,185
45-64 years	6.9	18.1	10.8	8.2	4.1	162,075
65 years and over	9.0	16.8	10.4	9.2	5.2	145,299
<b>Race and Age</b>						
White, all ages	5.4	17.6	9.6	9.4	4.0	1,065,630
Black, all ages	4.6	15.0	8.7	6.9	3.0	132,190
<b>Family Income</b>						
Less than \$10,000	6.5	16.0	8.9	8.2	3.8	216,542
\$10,000 - \$19,999	5.3	15.9	9.2	8.2	3.6	245,088
\$20,000 - \$34,999	5.1	19.0	10.1	9.5	3.9	318,026
\$35,000 or more	5.1	22.9	10.3	12.0	4.2	321,016

<sup>1</sup>Includes persons whose health status was not assessed.

<sup>2</sup>Includes persons of races other than white or black and persons with unknown family income.

Source: National Center for Health Statistics, 1984-88 National Health Interview Survey, Advance Data from Vital and Health Statistics, Number 197.

**Table 19. Average Annual Number per 100 Persons per Year and Number of Short-Stay Hospital Days by Activity Limitation due to Chronic Conditions and Respondent-Assessed Health Status, and Selected Sociodemographic Characteristics: United States, 1984-88.**

### **Highlights**

- Persons not limited in activity who were in good to excellent health had 33.2 hospital days per 100 persons per year, compared to 530.2 for those limited in activity and in fair to poor health.
- The average annual number of short-stay hospital days per year was similar for the two mixed groups -- those with limitation in activity but good to excellent health (175.9 days per person), and those without a limitation but fair to poor health (167.0 days per person). The same pattern existed for the number of restricted activity days (Table 17) and physician contacts (Table 18) as well. This suggests that for these three measures of morbidity (restricted activity days, physician contacts and short-stay hospital days) health status and disability status have similar effects.
- For those limited in activity and in fair to poor health, children under five years of age had more short-stay hospital days per 100 persons (1,582.2) than any other age group shown in the table.
- Despite of their limitation in activity and poor health status, persons with family incomes below \$10,000 had fewer short-stay hospital days than their higher income counterparts in this group.

### **Explanatory Notes**

Hospital days are the number of nights a person spent as an admitted patient in a short-stay hospital.

Data in this table come from the National Health Interview Survey (NHIS) for the years 1984-88. For a detailed description of the NHIS, see Table 1. For a description of this sample, see Table 16.

For another perspective on this subject, using the 1984 Survey of Income and Program Participation (SIPP), see Tables O and P in the introduction.

Table 19. Average Annual Number Per 100 Persons Per Year and Number of Short-Stay Hospital Days, by Limitation of Activity Due to Chronic Conditions, Respondent-Assessed Health Status, and Selected Sociodemographic Characteristics: United States, 1984-88

Characteristic	Total <sup>1</sup>	Limited in Activity		Not Limited in Activity		Total <sup>1</sup>
		Fair or Poor Health	Good to Excellent Health	Fair or Poor Health	Good to Excellent Health	
	Number Per 100 Persons Per Year					
All Persons <sup>2</sup>	80.2	530.2	175.9	167.0	33.2	189,252
<b>Age</b>						
Under 5 Years	51.7	1,582.2	220.0	321.7	31.9	9,387
5-17 Years	20.2	345.6	88.5	65.3	11.8	9,045
18-24 Years	47.2	476.8	146.8	134.3	33.9	12,648
25-44 Years	58.4	466.5	149.9	136.4	34.3	43,153
45-64 Years	110.7	489.8	168.8	150.0	34.9	49,558
65-74 Years	207.6	570.6	219.1	242.4	69.9	35,211
75 Years and Over	285.5	613.9	306.1	253.6	119.1	30,251
<b>Sex and Age</b>						
Male, all Ages	75.5	600.5	171.3	178.8	26.4	86,161
Under 18 Years	28.0	378.2	96.5	137.3	18.4	9,038
18-44 Years	41.4	522.9	144.8	107.2	19.1	20,399
45-64 Years	128.6	612.0	203.6	163.3	36.5	27,461
65 Years and Over	257.7	655.7	241.1	297.7	93.1	29,263
Female, All Ages	84.5	474.7	180.2	158.1	39.8	103,091
Under 18 Years	30.5	871.4	113.4	171.9	17.0	9,394
18-44 Years	68.8	422.7	154.3	154.5	48.7	35,402
45-64 Years	94.3	387.1	139.5	101.8	33.3	22,096
65 Years and Over	223.4	542.7	267.2	209.9	82.3	36,200
<b>Race and Age</b>						
White, All Ages	79.4	529.1	174.6	178.7	33.6	159,105
Black, All Ages	95.7	549.5	205.4	136.7	34.0	27,316
<b>Family Income</b>						
Less Than \$10,000	136.4	495.1	213.4	163.1	43.0	45,530
\$10,000 - \$19,999	98.9	540.1	179.2	183.1	38.5	45,337
\$20,000 - \$34,999	63.7	570.4	150.0	155.1	31.4	39,939
\$35,000 or More	45.9	531.4	128.0	145.0	27.4	28,757

<sup>1</sup>Includes persons whose health status was not assessed.

<sup>2</sup>Includes persons of races other than white or black and persons with unknown family income.

Source: National Center for Health Statistics, 1984-88 National Health Interview Survey, Advance Data from Vital and Health Statistics, Number 197.

**Table 20. Persons Using Special Aids for Getting Around, by Age and Sex: Civilian Non-institutionalized Population: United States, 1977, and Types of Special Equipment Used by Persons Who Need Assistance in Basic Life Activities, 1987**

**Highlights**

- As shown in Table 20A on the facing page, in 1977 nearly .5 million non-institutionalized persons, or 30 out of every one thousand, were using one or more special aids for getting around. Of these persons, close to 1.2 million required two or more aids. Total rates of usage varied from a low of 11.2 per thousand in the 15-44 age group to a high of 224 per thousand in the 75 and older age group.
- The most common type of mobility aid was a cane or walking stick, used by 2.7 million persons or 13 per thousand. Special shoes were the second most common type of mobility aid. They were used by 1.5 million persons or 7.0 per thousand. Special shoes were the only aid whose usage among children under 15, at 11 per thousand, approached the usage by persons 65 and older. Here the usage by the elderly was only marginally higher than that by children.
- Only one of the ten individual types of aid had its highest usage rate in an age group other than 65 and over. Braces other than leg or foot were used by 11 per thousand persons 45-64 compared to 8.8 per thousand among the elderly. Braces of this variety were the third most common type of special aid, used by one million persons.
- In general, men and women showed very similar frequencies and patterns of usage. The most striking exceptions were artificial limbs, used more frequently by men, and walkers, used more often by women. The former difference presumably reflects the higher accident rate among men while the latter may arise from the relatively higher proportion of women than men at advanced ages.
- As shown in Table 20B, below, in 1987 over 5.3 million persons who had difficulty performing basic life activities (ADLs and IADLs) used one or more of the listed assistive devices. Of this total, more than 3.3 million used a walker, cane, or crutches, about 2.3 million used grab-bars or railings, approximately 1.4 million used a seat in the shower or tub, and nearly 1.1 million used a wheelchair.

**Explanatory Notes**

The data presented in Table 20A are based on information collected in a special supplement to the 1977 National Health Interview Survey, conducted by the National Center for Health Statistics. For a brief description of the National Health Interview see the explanatory notes to Table 1. This table appeared in the 1984 version of the *Digest* (see acknowledgments page at the beginning of this publication). This study was repeated in the 1990 NHIS, data from which was not available when this *Digest* was produced.

The data presented in Table 20B come from a recent summary tabulation of Round 1 of the National Medical Expenditure Survey conducted in 1987. This round of the survey was designed to be representative of the total civilian non-institutionalized U.S. population (all ages).

Table 20B. Types of Special Equipment Used by Persons Who Need Assistance in Basic Life Activities, 1987	
Type of Equipment	Number of Persons (in thousands)
Walker, cane, or crutches	3,332
Grab-bars or railings	2,337
Seat in shower or tub	1,415
Wheelchair	1,072
Any equipment	5,321

Source: 1987 National Medical Expenditure Survey, Round 1, as presented in LaPlante, M. P. and Miller, K. S., "People with Disabilities in Basic Life Activities," *Disability Statistics Abstract* (National Institute on Disability and Rehabilitation Research, 1992), Figure 2.

Table 20A. Persons Using Special Aids for Getting Around, by Age and Sex:  
Civilian Noninstitutionalized Population: United States, 1977

Age and Sex	Persons Using 1 or More Special Aids			Persons Using Individual Types of Special Aids									
	Total	1 Type Only	2 or More Types	Cane or Walking Stick	Special Shoes	Brace		Walker	Wheel-Chair	Crutches	Artificial Limb		Other Mobility Aid
						Leg or Foot	Other				Leg or Foot	Arm or Hand	
Thousands of persons using special aids	6,459	5,292	1,157	2,714	1,492	398	1,004	689	645	613	205	66	205
SEX													
Male	3,106	2,519	586	1,239	732	241	539	203	294	348	146	49	124
Female	3,353	2,773	581	1,475	760	157	465	486	351	265	60	16*	81
AGE													
Under 15 years	732	651	81	0*	572	76	51	22*	47	50	13*	6*	21*
15-44 years	1,067	906	161	153	265	133	296	26*	116	211	46	11*	36
45-64 years	1,674	1,333	342	550	401	119	460	93	148	202	82	26*	79
65 years and over	2,985	2,401	584	2,011	253	70	196	549	334	151	64	22*	68
65-74 years	1,194	913	281	723	162	44	134	168	151	97	40	9*	32*
75 years and over	1,791	1,488	303	1,287	92	27*	62	381	183	54	24*	13*	37
Number using aids per 1,000 population	30.4	24.9	5.5	12.8	7.0	1.9	4.7	3.2	3.0	2.9	1.0	0.3	1.0
SEX													
Male	30.3	24.6	5.7	12.1	7.2	2.4	5.3	2.0	2.9	3.4	1.4	0.5	1.2
Female	30.5	25.3	5.3	13.4	6.9	1.4	4.2	4.4	3.2	2.4	0.5	0.1*	0.7
AGE													
Under 15 years	14.2	12.6	1.6	0.0*	11.1	1.5	1.0	0.4*	0.9	1.0	0.3*	0.1*	0.4*
15-44 years	11.2	9.5	1.7	1.6	2.8	1.4	3.1	0.3*	1.2	2.2	0.5	0.1*	0.4
45-64 years	38.6	30.7	7.9	12.7	9.2	2.7	10.6	2.1	3.4	4.7	1.9	0.6*	1.8
65 years and over	134.1	107.8	26.2	90.3	11.4	3.1	8.8	24.7	15.0	6.8	2.9	1.0*	3.1
65-74 years	83.7	64.0	19.7	50.7	11.4	3.1	9.4	11.8	10.6	6.8	2.8	0.6*	2.2*
75 years and over	223.7	185.8	37.8	160.7	11.5	3.4*	7.7	47.6	22.9	6.7	3.0*	1.6*	4.6

\*Figure has low statistical reliability or precision (relative standard error exceeds 30 percent).

Source: National Center for Health Statistics, 1977 National Health Interview Survey, *Vital and Health Statistics*, Series 10, No. 135, Tables 1 and 2.

Note: The 1990 National Health Interview Survey included a supplement on assistive devices, and published data should be available from NCHS in 1992.

**Table 21. Acquired Immunodeficiency Syndrome (AIDS) Cases and Deaths, According to Age at Diagnosis, Sex, and Race/Ethnicity: United States, 1984-90 (Data are based on reporting by state health departments)**

### Highlights

- During 1989, 33,710 adolescent and adult AIDS cases were reported, 88 percent of which were males. Another 605 cases were reported among children under 13 years of age.
- Among the black non-Hispanic and American Indian population, the number of incident cases of AIDS tripled between 1986 and 1989 for those 13 years of age and older. For the white non-Hispanic, Hispanic, and Asian population, the increase was between 2.4 and 2.6 times.
- A total of 147,525 AIDS cases have been reported through September 30, 1990 among which there have been 90,914 deaths.
- For males, the age group with the largest number of cases is 30 to 39 years (46.8 percent of all cases) followed by 40 to 49 years (22.8 percent of all cases) and 20 to 29 years (19.7 percent of all cases). This pattern has remained relatively consistent across the reporting periods.
- For females, the age groups with the highest number of cases is also 30 to 39 years (47.2 percent of all cases); however, the second group is 20 to 29 years (26.6 percent of all cases) followed by those 40 to 49 years (14.4 percent of all cases). The relative order has remained the same for all reporting periods.
- The distribution of both cases and deaths among the demographic groups is, understandably, similar.

### Explanatory Notes

Current estimates of the total number of persons infected with HIV in the United States range from 800,000 to 1.3 million.<sup>4</sup>

Acquired immunodeficiency syndrome (AIDS) surveillance is conducted by health departments in each state, territory and the District of Columbia. These tables exclude residents of U.S. Territories. The AIDS case definition was changed in September 1987 to allow for the presumptive diagnosis of AIDS-associated diseases and conditions and to expand the spectrum of human immunodeficiency virus-associated diseases reportable as AIDS.

The first table presents data on persons ever diagnosed with AIDS; the second table shows the corresponding number of deaths.

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<sup>4</sup>National Center for Health Statistics. *Health United States, 1990*. Hyattsville, Maryland: Public Health Service, 1991. p. 24.

Table 21. Acquired Immunodeficiency Syndrome (AIDS) Cases, According to Age at Diagnosis, Sex, and Race/Ethnicity: United States, 1984-90 (Data are based on reporting by state health departments)

Age at Diagnosis, Sex, and Race/Ethnicity	All Years <sup>1,2</sup>	1984	1985	1986	1987	1988	1989 <sup>2</sup>	1990 <sup>2</sup>	All Years <sup>1,2</sup>
	Number, by Year of Report								Percent
Total <sup>3</sup>	147,525	4,436	8,181	13,123	21,114	30,850	33,710	33,215	...
<b>Male</b>									
All males, 13 years and over <sup>3</sup>	131,390	4,110	7,530	11,967	19,114	27,234	29,728	29,050	100.0
White, not Hispanic	79,414	2,602	4,788	7,506	12,336	16,155	17,575	16,865	60.4
Black, not Hispanic	33,831	949	1,712	2,762	4,326	7,153	8,066	8,156	25.7
Hispanic	16,797	537	973	1,588	2,256	3,663	3,710	3,696	12.8
American Indian <sup>4</sup>	183	3	6	19	23	30	52	49	0.1
Asian or Pacific Islander <sup>5</sup>	844	16	49	79	126	167	210	192	0.6
13-19 Years	419	17	29	44	70	37	89	75	0.3
20-29 Years	25,941	844	1,477	2,483	3,827	5,494	5,769	5,484	19.7
30-39 Years	61,462	1,982	3,606	5,644	8,883	12,623	13,933	13,477	46.8
40-49 Years	29,993	896	1,657	2,551	4,286	6,119	6,832	7,060	22.8
50-59 Years	9,918	306	600	922	1,462	2,012	2,258	2,148	7.5
60 Years and Over	3,657	65	161	323	586	839	847	806	2.8
<b>Female</b>									
All females, 13 years and over <sup>3</sup>	13,666	276	523	971	1,679	3,047	3,377	3,599	100.0
White, not Hispanic	3,852	78	142	272	544	856	948	969	28.2
Black, not Hispanic	7,531	142	284	524	892	1,654	1,892	2,042	55.1
Hispanic	2,147	56	93	162	229	502	498	560	15.7
American Indian <sup>4</sup>	29	-	3	1	3	5	9	7	0.2
Asian or Pacific Islander <sup>5</sup>	75	-	1	8	11	22	19	12	0.5
13-19 Years	132	4	4	12	11	24	29	45	1.0
20-29 Years	3,636	95	175	277	479	779	884	868	26.6
30-39 Years	6,450	127	232	449	748	1,508	1,624	1,699	47.2
40-49 Years	1,971	25	49	130	228	413	511	593	14.4
50-59 Years	731	6	26	47	91	146	172	229	5.3
60 Years and Over	746	17	37	56	122	177	157	175	5.5
<b>Children</b>									
All Children, under 13 years <sup>3</sup>	2,469	50	128	185	321	569	605	566	100.0
White, not Hispanic	565	10	25	42	85	151	115	127	22.9
Black, not Hispanic	1,352	28	84	106	162	302	342	300	54.8
Hispanic	531	12	19	36	71	111	140	135	21.5
American Indian <sup>4</sup>	5	-	-	-	2	-	2	1	0.2
Asian or Pacific Islander <sup>5</sup>	12	-	-	1	1	4	3	3	0.5
Under 1 Year	629	6	32	36	89	160	140	160	25.5
1-12 Years	1,840	44	96	149	232	409	465	406	74.5

<sup>1</sup> Includes cases prior to 1984.

<sup>2</sup> Data are as of September 30, 1990, and reflect reporting delays.

<sup>3</sup> Includes all other races not shown separately.

<sup>4</sup> Includes Aleut and Eskimo.

<sup>5</sup> Includes Chinese, Japanese, Filipino, Hawaiian (includes part Hawaiian), and other Asian or Pacific Islander.

Notes: The AIDS case definition was changed in September 1987 to allow for the presumptive diagnosis of AIDS-associated diseases and conditions and to expand the spectrum of human immunodeficiency virus-associated diseases reportable as AIDS. Excludes residents of U.S. territories.

Source: Centers for Disease Control, Center for Infectious Diseases, AIDS Program, as presented in *Health, United States, 1990* (National Center for Health Statistics, 1991), Tables 44 and 45.

Table 21 (Continued). Deaths Among Acquired Immunodeficiency Syndrome (AIDS) Cases, According to Age at Diagnosis, Sex, and Race/Ethnicity: United States, 1984-90

Age at Diagnosis, Sex, and Race/Ethnicity	All Years <sup>1,2</sup>	1984	1985	1986	1987	1988	1989 <sup>2</sup>	1990 <sup>2</sup>	All Years <sup>1,2</sup>
	Number, by Year of Death								Percent Distribution
Total <sup>3</sup>	90,914	3,276	6,430	11,012	14,710	18,379	22,616	12,294	...
<b>Male</b>									
All males, 13 years and over <sup>3</sup>	81,434	2,983	5,821	9,992	13,117	16,312	20,172	11,015	100.0
White, not Hispanic	49,174	1,833	3,648	6,247	7,815	9,537	12,027	6,968	60.4
Black, not Hispanic	21,245	732	1,443	2,370	3,459	4,479	5,378	2,806	26.1
Hispanic	10,265	395	755	1,298	1,728	2,137	2,555	1,122	12.6
American Indian <sup>4</sup>	111	3	4	12	21	19	26	25	0.1
Asian or Pacific Islander <sup>5</sup>	498	17	29	50	76	102	142	77	0.6
13-19 Years	246	12	23	37	44	41	55	29	0.3
20-29 Years	15,194	577	1,138	1,898	2,481	3,069	3,650	1,966	18.7
30-39 Years	37,139	1,366	2,690	4,600	5,991	7,313	9,221	5,041	45.6
40-49 Years	19,049	684	1,295	2,258	2,960	3,807	4,852	2,746	23.4
50-59 Years	6,988	270	545	841	1,105	1,443	1,721	889	8.6
60 Years and Over	2,818	74	190	358	536	639	673	324	3.5
<b>Female</b>									
All females, 13 years and over <sup>3</sup>	8,171	244	444	879	1,333	1,801	2,149	1,139	100.0
White, not Hispanic	2,352	58	144	249	416	513	573	359	28.8
Black, not Hispanic	4,512	138	214	475	734	986	1,221	644	55.2
Hispanic	1,229	47	82	144	175	284	331	127	15.0
American Indian <sup>4</sup>	16	-	3	-	2	1	5	4	0.2
Asian or Pacific Islander <sup>5</sup>	51	1	-	7	6	16	14	5	0.6
13-19 Years	66	1	5	11	11	11	12	11	0.8
20-29 Years	2,089	90	130	240	348	443	494	282	25.6
30-39 Years	3,787	106	201	401	588	839	1,067	514	46.3
40-49 Years	1,161	22	48	102	175	265	337	192	14.2
50-59 Years	470	9	18	43	87	101	124	73	5.8
60 Years and Over	588	16	42	82	124	142	115	67	7.3
<b>Children</b>									
All Children, under 13 years <sup>3</sup>	1,309	49	105	141	260	266	295	140	100.0
White, not Hispanic	323	9	29	34	67	67	78	28	24.7
Black, not Hispanic	695	28	59	76	124	141	147	88	53.1
Hispanic	278	12	16	29	66	55	67	23	21.2
American Indian <sup>4</sup>	3	-	-	-	2	-	1	-	0.2
Asian or Pacific Islander <sup>5</sup>	9	-	1	2	1	3	1	1	0.7
Under 1 Year	303	5	24	37	60	60	71	38	23.1
1-12 Years	1,006	44	81	104	200	206	224	102	76.9

<sup>1</sup> Includes cases prior to 1984.

<sup>2</sup> Data are as of September 30, 1990, and reflect reporting delays.

<sup>3</sup> Includes all other races not shown separately.

<sup>4</sup> Includes Aleut and Eskimo.

<sup>5</sup> Includes Chinese, Japanese, Filipino, Hawaiian (includes part Hawaiian), and other Asian or Pacific Islander.

NOTES: The AIDS case definition was changed in September 1987 to allow for the presumptive diagnosis of AIDS-associated diseases and conditions and to expand the spectrum of human immunodeficiency virus-associated diseases reportable as AIDS. Excludes residents of U.S. territories.

Source: Centers for Disease Control, Center for Infectious Diseases, AIDS Program, as presented in *Health, United States, 1990* (National Center for Health Statistics, 1991), Tables 44 and 45.

## **IV. Work Disability**

**Table 22. Percent of Persons 16 to 64 Years Old with a Work Disability, by Selected Characteristics: United States, 1988**

### Highlights

- Of persons age 16 to 64, 8.6 percent had a work disability, defined as a health problem or disability which prevents persons from working or limits the kind or amount of work they can do. Of this figure, over half (4.8 percent) had a severe work disability, defined as unable to work because of the health problem or disability, or under 65 years of age and receiving Medicare or Supplemental Security Income (SSI). Patterns between males and females were similar across the age categories presented in the table.
- The percentage of the population 16-64 with a work disability increased with age. The 16-24 age group had the lowest percentage with a work disability, at 3.8 percent. This percentage increased to 22.3 percent for those 55-64 years of age.
- The percentage of the population with a work disability decreased with the level of educational attainment, measured in years of school completed. Persons with less than 8 years of schooling had a work disability rate of 29.7 percent, compared to only 3.8 percent for those with at least 16 years of formal education. This education-based disparity increased for persons with a severe work disability. Those with less than 8 years of school completed had a severe work disability rate of 23.4 percent versus 1.3 percent for those with at least 16 years of formal education. This means that virtually all of the work disability was severe among those with little schooling, while most of the work disability among college graduates was not severe.
- The income to poverty ratio shows the extent of financial well-being, with a figure "less than 1.00" indicating below poverty level status, and "2.00 and over" representing family incomes at least twice the U.S. Census poverty threshold. Percentages of the population with a work disability fall as the income rises (e.g., as the income to poverty ratio increases). Almost 22 percent of the population below the poverty level had a work disability, compared to only 5.6 percent for those in the highest income category.
- Blacks have a much higher rate of work disability (13.7 percent) than either whites (7.9 percent) or persons of Hispanic origin (8.2 percent) (the white - Hispanic difference is not statistically significant).

### Explanatory Notes

These data come from the U.S. Census Bureau's March 1988 Current Population Survey, covering the 50 states and the District of Columbia. As its primary method for collecting this information, the CPS asks if persons have a health problem or disability which prevents them from working or limits the kind or amount of work they can do. This table measures work disability among the total non-institutionalized population, including persons in and out of the labor force.

While this was the most recent published source of work disability data it is not the only one available. Depending on the particular survey involved, work disability can vary from 8.5 percent (1980 U.S. Census) to 17.2 percent (1966 and 1978 Social Security Administration Survey of Disability and Work); however, the most authoritative source for the *number* of persons with a work disability is Wave 3 of the Census Bureau's 1984 Survey of Income and Program Participation, which places the figure with a work disability at 18.2 million persons 16 to 64 years, including 8.0 million who were prevented from working.<sup>5</sup> See the introduction which precedes the tables for a detailed discussion of work disability concepts.

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<sup>5</sup> McNeil, John M., P. A. Franklin and L. I. Mars, "Work Status, Earnings, and Rehabilitation of Persons with Disabilities," In S. Thompson-Hoffman and I. F. Stork (Eds.), *Disability in the United States: A Portrait from National Data*, 135 and 136. (New York, NY: Springer Publishing Company, 1991).

Table 22. Percent of Persons 16 to 64 Years Old with a Work Disability,  
by Selected Characteristics: United States, 1988

Characteristics	Both Sexes		Males		Females	
	Total	Severe	Total	Severe	Total	Severe
Total	8.6	4.8	8.7	4.9	8.4	4.6
Age						
16 to 24 years	3.8	1.7	4.1	1.9	3.6	1.6
25 to 34 years	5.6	2.7	5.9	3.1	5.4	2.4
35 to 44 years	7.1	3.6	7.7	4.3	6.5	3.0
45 to 54 years	10.3	6.0	10.3	6.0	10.2	6.0
55 to 64 years	22.3	14.0	22.4	13.7	22.2	14.2
Years of School Completed <sup>1</sup>						
Less than 8 years	29.7	23.4	29.1	23.2	30.2	23.7
8	24.6	16.8	23.9	15.8	25.2	17.8
9 to 11	17.7	11.6	17.5	11.7	17.9	11.4
12	8.8	4.5	9.3	5.1	8.4	4.1
13 to 15	7.5	3.2	8.4	3.4	6.7	3.0
16 or more	3.8	1.3	3.8	1.4	3.8	1.2
Income to Poverty Ratio						
Less than 1.00	21.9	15.5	24.4	17.9	20.3	13.8
1.00 to 1.24	17.8	12.4	19.0	14.6	16.8	10.5
1.25 to 1.49	13.4	8.3	13.4	8.6	13.4	8.1
1.50 to 1.99	11.3	6.9	12.8	8.4	9.9	5.6
2.00 and over	5.6	2.4	5.8	2.4	5.3	2.3
Race and Hispanic Origin <sup>2</sup>						
White	7.9	4.1	8.2	4.3	7.7	3.9
Black	13.7	9.9	13.7	10.3	13.8	9.5
Hispanic Origin	8.2	5.6	8.4	5.9	7.9	5.2

<sup>1</sup>Universe is persons 25 to 64 years old.

<sup>2</sup>Persons of Hispanic origin may be of any race.

Source: U.S. Bureau of the Census, 1988 Current Population Survey, Current Population Reports, Series P-23, No. 160, Table E.

**Table 23. Labor Force Status by Work Disability Status, Persons 16 to 64 Years: United States, 1988**

### **Highlights**

- As an initial consideration, work disability affects whether or not one participates in the labor force at all. Of those with a work disability only 35.7 percent of males and 27.5 percent of females were even in the labor force in 1988, compared to 88.9 and 69.5 percent, respectively, for those without a work disability.
- For those in the labor force, both males and females with a work disability had an unemployment rate of 14.2 percent, compared to 6.2 and 5.2 percent, respectively for those without a work disability. Concerning full-time employment, only 23.4 percent of males and 13.1 percent of females with a work disability were employed full time, compared to 74.8 percent for males and 47.1 for females without a work disability.
- Age was a significant factor in labor force participation. For males in the 25 to 34 age group, for example, only about half (49.5 percent) with a work disability were in the labor force, compared to 96.2 percent for males with no work disability. In the 55 to 64 age group, the difference rose to about four times: 20.7 percent versus 80.5 percent, respectively, for males with and without a work disability.
- Females in the 25 to 34 age group with a work disability had a labor force participation rate of 41.9, compared to 74.5 percent for those without a work disability. In the 55 to 64 age group, the labor force participation rates for women were 13.1 percent for those with a work disability and 51.1 percent for those without a work disability.
- Years of schooling also strongly affected participation in the work force, relative to work disability. For males with less than a high school education only 23.8 percent of those with a work disability were in the labor force, compared to 50.3 percent for those with a work disability who had a college degree.
- For females without a high school diploma only 14.8 percent of those with a work disability were in the labor force, compared to 46.5 percent of those with a work disability who had a college degree.

### **Explanatory Notes**

These data come from the U.S. Census Bureau's March 1988 Current Population Survey, covering the 50 states and the District of Columbia. The table covers various labor force statuses according to work disability and demographic characteristics of the population 16 to 64 years of age. The labor force consists of persons who are employed or seeking employment, but it excludes discouraged workers and others who are unemployed and not actively looking for a job. Persons with a work disability include those who are in and outside the labor force. See Table 22 for a discussion of variations in work disability figures.

Table 23. Labor Force Status by Work Disability Status, Persons 16 to 64 Years: United States, 1988

Characteristic	With a Work Disability			With No Work Disability		
	Percent		Unemployment Rate	Percent		Unemployment Rate
	In Labor Force	Employed Full Time		In Labor Force	Employed Full Time	
<b>Males</b>						
Total	35.7	23.4	14.2	88.9	74.8	6.2
<b>Age</b>						
16 to 24 years	40.4	17.7	22.6	69.5	38.0	12.8
25 to 34 years	49.5	32.4	15.9	96.2	85.4	6.1
35 to 44 years	43.7	31.2	14.0	98.0	90.3	4.3
45 to 54 years	38.6	29.1	12.4	97.3	90.4	3.4
55 to 64 years	20.7	12.7	9.2	80.5	70.8	4.1
<b>Years of School Completed<sup>1</sup></b>						
Less than 12	23.8	14.1	18.5	91.0	75.5	9.3
12	38.2	26.3	14.8	94.8	85.7	5.8
13 to 15	49.1	37.6	8.6	95.2	87.5	3.7
16 or more	50.3	36.8	5.0	96.1	90.3	1.6
<b>Race and Hispanic Origin<sup>2</sup></b>						
White	38.9	26.2	12.9	89.9	76.7	5.3
Black	20.6	10.8	25.0	83.1	62.7	13.9
Hispanic	28.2	13.9	28.4	89.2	72.0	9.0
<b>Females</b>						
Total	27.5	13.1	14.2	69.5	47.1	5.2
<b>Age</b>						
16 to 24 years	43.9	17.3	28.0	62.4	29.1	10.6
25 to 34 years	41.9	22.3	13.9	74.5	54.9	5.1
35 to 44 years	40.9	21.3	14.7	77.6	56.3	3.9
45 to 54 years	22.9	11.3	13.0	73.3	54.4	2.6
55 to 64 years	13.1	5.0	3.9	51.1	35.6	2.3
<b>Years of School Completed<sup>1</sup></b>						
Less than 12	14.8	5.5	16.5	54.1	35.7	7.9
12	29.5	14.8	12.6	70.3	50.3	4.3
13 to 15	38.5	22.1	8.2	77.3	56.4	3.2
16 or more	46.5	25.1	6.4	82.2	65.0	1.8
<b>Race and Hispanic Origin<sup>2</sup></b>						
White	28.9	14.3	11.4	69.5	46.8	4.3
Black	22.7	6.2	27.4	70.9	50.0	11.9
Hispanic	17.8	9.7	17.7	59.1	40.1	6.8

<sup>1</sup>Universe is persons 25 to 64 years old.

<sup>2</sup>Persons of Hispanic origin may be of any race.

Source: U.S. Bureau of the Census, 1988 Current Population Survey, Current Population Reports, Series P-23, No. 160, Table F.

**Table 24. Mean Earnings of Workers 16 to 64 Years Old, by Work Disability Status: United States, 1987**

**Highlights:**

- Work disability and earnings are inversely correlated, but the patterns vary depending on if one works year-round, full-time. For males who had worked at all in 1987, mean earnings for those with a work disability were only 64.3 percent of those without a work disability (\$15,497 versus \$24,095). However, this disparity is in part a function of reduced rates of full-time employment for those with a work disability, as shown in Table 22. The difference for those who had worked year-round, full-time was not so great as for all types of employment, and in this case males with a work disability earned 80.0 percent of their counterparts without a work disability (\$24,000 versus \$29,994).
- Among females who had worked at all in 1987, including part-time employees, mean earnings for those with a work disability were 62.1 percent of those without a work disability (\$8,075 versus \$13,000). As with males, however, the mean earnings disparity for year-round, full-time female workers was not so great, and those with a work disability earned 83.6 percent as much as their counterparts without a work disability (\$15,796 versus \$18,894).
- Education, at least for males, is directly related to the earnings disadvantage, that is, as education rises, the earnings differences increase between those with and without a work disability. For example, among males, little difference exists between earnings for high school graduates (\$23,773 with a work disability versus \$26,270 without one, or a ratio of .90). Among college graduates, however, those with a work disability earn only 79 percent as much as their counterparts without a work disability (\$33,901 versus \$43,124). According to the Census Bureau, this shows that males with a work disability face a dual burden of relatively low levels of education and fewer advancements when they do receive additional schooling than their counterparts without a work disability. The comparable figures for females (specifically, college graduates with a work disability) were too small to satisfy statistical tests of significance.
- For males, the negative effects of work disability on earnings increased with age. For example, the earnings disparity between those with and without a work disability, in the 45 to 64 age group, was over \$10,000 for persons working year round, full time, compared to less than \$3,500 for those in the 25 to 34 age group. This relationship may be a function of educational attainment, which enhances earnings and decreases with age.<sup>6</sup>

**Explanatory Notes**

These data come from the U.S. Census Bureau's March 1988 Current Population Survey, covering the 50 states and the District of Columbia. For a description of this and other surveys on work disability, see the explanatory notes in Table 22.

This table shows only individual earnings, as opposed to family income, and does not include dollar amounts from other family members and sources.

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<sup>6</sup>McNeil, John M., Franklin, P. A. and Mars, L. I. "Work Status, Earnings, and Rehabilitation of Persons with Disabilities," In S. Thompson-Hoffman and I. F. Stork (Eds.), *Disability in the United States: A Portrait from National Data*, 135-136. (New York, NY: Springer Publishing Company, 1991).

Table 24. Mean Earnings of Workers 16 to 64 Years Old, by Work Disability Status: United States, 1987

Characteristics	Worked in 1987		Worked Year-Round Full-Time in 1987	
	With a Work Disability	With No Work Disability	With a Work Disability	With No Work Disability
<b>Males</b>				
Total	\$15,497	\$24,095	\$24,000	\$29,994
<b>Age</b>				
16 to 24 years	6,463	7,851	(B)	14,985
25 to 34 years	14,102	22,362	22,249	25,637
35 to 44 years	18,388	31,082	27,524	34,223
45 to 54 years	20,385	33,775	26,618	36,681
55 to 64 years	15,187	28,899	22,601	33,116
<b>Years of School Completed<sup>1</sup></b>				
Less than 12	11,012	17,705	17,224	21,041
12	16,480	23,573	23,773	26,270
13 to 15	18,776	27,903	28,200	30,722
16 or more	26,241	39,983	33,901	43,124
<b>Race and Hispanic Origin<sup>2</sup></b>				
White	15,869	24,943	24,454	30,773
Black	11,876	16,195	20,790	21,361
Hispanic Origin	12,213	16,804	(B)	21,177
<b>Females</b>				
Total	8,075	13,000	15,796	18,884
<b>Age</b>				
16 to 24 years	4,910	6,403	(B)	13,078
25 to 34 years	8,612	14,151	15,840	18,819
35 to 44 years	9,306	15,857	15,809	20,834
45 to 54 years	8,502	15,406	16,380	20,022
55 to 64 years	7,747	13,372	17,073	18,547
<b>Years of School Completed<sup>1</sup></b>				
Less than 12	4,840	8,947	10,150	12,883
12	7,863	12,563	14,955	16,863
13 to 15	10,398	15,552	17,223	20,313
16 or more	15,632	21,480	24,591	26,582
<b>Race and Hispanic Origin<sup>2</sup></b>				
White	8,340	13,027	16,202	19,068
Black	6,432	12,367	12,620	17,191
Hispanic Origin	7,559	11,062	(B)	16,213

(B) Base less than 75,000.

<sup>1</sup> Universe is persons 25 to 64 years old.

<sup>2</sup> Persons of Hispanic origin may be of any race.

Source: U.S. Bureau of the Census, 1988 Current Population Survey, Current Population Reports, Series P-23, No. 160, Table G.

**Table 25. Occupation and Industry in 1987--Employed Persons 16 to 64 Years Old, by Work Disability Status, Race, Hispanic Origin, and Sex: United States, 1988**

**Highlights:**

- Work disability has a strong influence on the types of occupations which persons are able to pursue. Among males and females without a work disability, 26.3 and 25.6 percent, respectively, were employed in managerial and professional activity. This compares to only 18.2 percent for males and 16.0 percent for females with a work disability who were employed in this occupational category.
- Conversely, both men and women with a work disability were more likely to be employed in service occupations (12.5 and 27.3 percent, respectively) than their counterparts without a work disability (9.2 and 17.0 percent, respectively). This pattern also held for operators, fabricators, and laborers which had a greater representation among those with a work disability (27.4 and 13.3 percent, respectively, for males and females) than among those without one (20.9 and 8.7 percent, respectively).
- This pattern differed somewhat for black males, where the rates in the managerial and professional ranks were lower and varied less, regardless of work disability, than for white males. While the rates for white males in this occupational category were 18.6 versus 27.4 percent for those with and without a work disability, the corresponding figures for black males was 10.7 versus 13.7 percent. For black females, however, work disability was associated with a large drop in the rate of managerial and professional occupations (7.5 to 18.4 percent, respectively, for those with and without a work disability). Males of Hispanic origin exhibited a similar pattern to black females, where work disability was associated with a near 50 percent drop in employment in managerial and professional occupations, from 13.0 percent for those with no work disability to 6.9 percent for persons with a work disability.
- Concerning industries, males with a work disability had the highest rates of employment in services (25.7 percent), manufacturing (21.0 percent) and construction (12.6 percent). For females with a work disability the most frequently occurring were services (47.3 percent), retail trade (19.3 percent), and manufacturing (12.2 percent). The corresponding industry figures for those without a work disability were, for males, manufacturing (23.5 percent), services (22.4 percent), and retail trade (14.7 percent). For females without a work disability the figures were services (43.7 percent), retail trade (18.9 percent), and manufacturing (13.7 percent).
- Black persons and those of Hispanic origin showed a greater change in the industry of employment than their white counterparts, relative to work disability. For example, among white males, work disability was associated with only a small increase in service industry employment, from 21.9 to 24.3 percent. For white females the corresponding increase was from 43.3 to 44.9 percent. However, the increase was from 25.5 to 38.5 percent among black males and from 48.3 to 61.8 percent for black females. For females of Hispanic origin, the corresponding increase in service industry employment was from 40.9 percent for those without a work disability to 50.1 percent for those with one.

**Explanatory Notes**

These data come from the U.S. Census Bureau's March 1988 Current Population Survey, covering the 50 states and the District of Columbia. For a description of this and other surveys on work disability, see the explanatory notes in Table 22. The first page of this table shows persons with a work disability; the second page shows persons without one.

Table 25. Occupation and Industry in 1987—Employed Persons 16 to 64 Years Old, by Work Disability Status, Race, Hispanic Origin, and Sex: United States, 1988

With a Work Disability Occupation, industry, class of worker, and pension and health plan coverage	All Races		White		Black		Hispanic Origin <sup>1</sup>	
	Male	Female	Male	Female	Male	Female	Male	Female
Number Employed (in thousands)	2,052	1,582	1,826	1,318	176	226	106	72
Occupation Group (percent distribution)	100%	100%	100%	100%	100%	100%	100%	100%
Managerial and professional specialty	18.2	16.0	18.6	17.7	10.7	7.5	6.9	13.3
Executive, administrative, and managerial	10.2	6.0	10.7	6.7	5.4	3.3	5.9	4.8
Professional specialty	7.9	9.9	7.8	11.0	5.2	4.2	1.0	8.7
Technical, sales, and administrative support	17.5	39.5	18.6	41.2	7.7	28.3	21.1	28.5
Technicians and related support	2.9	2.4	3.1	2.5	1.7	2.2	7.4	—
Sales	9.4	12.4	10.1	13.5	3.1	7.1	5.1	1.5
Administrative support, including clerical	5.2	24.6	5.2	25.0	2.9	19.0	8.6	26.9
Service	12.5	27.3	10.4	23.7	31.8	47.7	15.5	31.8
Private household	—	3.1	—	2.0	—	10.1	—	1.2
Protective service	2.7	.8	2.6	.4	4.0	2.9	6.3	—
Service, except protective and household	9.8	23.3	7.7	21.1	27.8	34.6	9.2	30.5
Farm, forestry, and fishing	4.6	1.4	4.4	1.5	7.7	.8	10.4	2.9
Farm operators and managers	2.0	.2	2.1	.3	1.9	—	.9	—
Farm workers and related occupations	2.2	1.1	2.1	1.1	3.8	.8	9.5	2.9
Forestry and fishing	.3	—	.2	—	2.1	—	—	—
Precision, production, craft, and repair	19.6	2.2	20.8	2.4	10.5	.5	13.9	4.6
Mechanics and repairers	5.9	.2	6.3	.3	2.6	—	6.0	—
Construction trades	9.2	.3	9.6	.3	6.1	—	6.0	—
Precision production	4.1	1.6	4.4	1.7	1.7	.5	1.8	4.6
Operators, fabricators, and laborers	27.4	13.3	27.0	13.2	31.3	14.9	31.7	18.6
Machine operators, assemblers, and inspectors	10.4	10.7	9.8	10.7	17.3	10.7	15.7	15.4
Transportation and material moving	8.8	.7	9.0	.7	5.2	1.0	9.7	3.1
Handlers, equipment cleaners, helpers, and laborers	8.3	1.8	8.1	1.7	8.7	3.0	6.2	—
Industry Group (percent distribution)	100%	100%	100%	100%	100%	100%	100%	100%
Agriculture	3.9	1.9	3.9	2.1	4.9	.8	10.9	3.5
Forestry and fishing	.2	.1	—	.2	2.1	—	—	—
Mining	1.1	—	1.1	—	1.0	—	2.3	—
Construction	12.6	1.1	13.4	1.3	7.4	—	7.8	1.4
Manufacturing	21.0	12.2	21.6	13.5	14.4	5.1	25.4	19.7
Nondurable	7.2	4.9	7.5	5.5	4.4	2.3	10.8	11.5
Durable	13.7	7.2	14.1	7.9	10.0	2.8	14.6	8.2
Transportation, communication, and other public utilities	9.2	3.8	9.2	3.8	9.9	4.4	3.1	1.4
Wholesale trade	5.2	1.8	5.8	1.6	.6	3.0	3.0	3.1
Retail trade	11.4	19.3	11.5	21.6	6.8	8.7	8.8	7.5
Finance, insurance, and real estate	4.5	7.2	4.3	6.8	6.7	6.9	3.7	9.1
Services	25.7	47.3	24.3	44.9	38.5	61.8	27.5	50.1
Business services	4.6	6.5	4.5	6.0	4.8	9.9	10.7	3.4
Repair services	3.1	.4	3.3	.5	1.1	—	3.9	2.9
Personal services	3.3	10.8	2.7	9.1	8.8	20.0	1.9	14.9
Entertainment and recreational services	1.4	1.0	1.3	.8	1.2	2.6	1.7	—
Professional and related services	13.2	28.3	12.2	28.2	22.4	29.2	9.0	28.8
Public administration	4.7	4.8	4.4	3.8	7.0	8.8	7.0	4.1

<sup>1</sup> Persons of Hispanic origin may be of any race.

Source: U. S. Bureau of the Census, Current Population Survey, Current Population Reports, Series P-23, Number 160, Table 6.

Table 25. (Continued) Occupation and Industry in 1987--Employed Persons 16 to 64 Years Old, by Work Disability Status, Race, Hispanic Origin, and Sex: United States, 1988

With no Work Disability Occupation, industry, class of worker, and pension and health plan coverage	All Races		White		Black		Hispanic Origin <sup>1</sup>	
	Male	Female	Male	Female	Male	Female	Male	Female
Number Employed (in thousands)	57,584	48,141	50,773	41,288	5,065	5,349	4,556	3,121
Occupation Group (percent distribution)	100%	100%	100%	100%	100%	100%	100%	100%
Managerial and professional specialty	26.3	25.6	27.4	26.5	13.7	18.4	13.0	15.8
Executive, administrative, and managerial	13.8	10.7	14.5	11.2	7.1	6.8	6.9	7.4
Professional specialty	12.4	14.9	12.8	15.3	6.5	11.5	6.0	8.3
Technical, sales, and administrative support	19.9	45.3	20.0	46.3	16.6	38.9	15.2	41.4
Technicians and related support	3.0	3.3	3.0	3.2	2.0	3.7	1.8	1.5
Sales	11.1	12.8	11.8	13.4	4.9	8.7	7.1	12.8
Administrative support, including clerical	5.6	29.1	5.1	29.6	9.6	26.4	6.2	27.0
Service	9.2	17.0	8.1	15.9	18.1	26.7	14.7	21.2
Private household	-	1.4	-	1.3	.1	2.3	-	3.9
Protective service	2.5	.4	2.3	.4	4.5	.8	1.8	.3
Service, except protective and household	6.6	15.1	5.7	14.1	13.4	23.5	12.8	16.9
Farm, forestry, and fishing	3.7	.8	3.9	.9	2.2	.2	6.0	1.4
Farm operators and managers	1.4	.2	1.6	.3	.1	-	.2	-
Farm workers and related occupations	2.0	.5	2.0	.6	1.9	.2	7.7	1.3
Forestry and fishing	.2	-	.2	-	.1	-	.1	-
Precision, production, craft, and repair	19.8	2.2	20.5	2.1	15.1	2.3	20.7	3.4
Mechanics and repairers	7.2	.3	7.5	.3	4.8	.4	6.5	.4
Construction trades	7.4	.1	7.7	.2	5.9	-	7.9	.1
Precision production	4.9	1.7	5.0	1.6	4.2	1.8	6.0	2.8
Operators, fabricators, and laborers	20.9	8.7	19.8	7.9	34.0	13.3	28.1	16.5
Machine operators, assemblers, and inspectors	7.7	6.4	7.4	5.7	10.4	10.6	12.8	13.5
Transportation and material moving	6.8	.8	6.4	.8	11.4	1.0	6.1	.6
Handlers, equipment cleaners, helpers, and laborers	6.3	1.4	5.8	1.4	12.1	1.5	9.1	2.3
Industry Group (percent distribution)	100%	100%	100%	100%	100%	100%	100%	100%
Agriculture	3.3	1.1	3.6	1.3	1.5	.2	6.8	1.6
Forestry and fishing	.1	-	.1	-	-	-	-	-
Mining	.9	.3	1.0	.3	.2	-	.7	-
Construction	10.2	1.1	10.6	1.2	7.9	.3	10.9	.7
Manufacturing	23.5	13.7	23.6	13.4	23.2	15.3	24.0	18.6
Nondurable	8.4	6.9	8.3	6.6	9.8	9.4	9.6	10.4
Durable	15.1	6.8	15.2	6.7	13.4	5.9	14.4	8.2
Transportation, communication, and other public utilities	9.3	4.2	9.1	3.9	12.9	6.8	7.3	4.1
Wholesale trade	5.3	2.4	5.5	2.5	3.6	1.4	4.7	2.1
Retail trade	14.7	18.9	14.6	19.5	13.7	12.9	16.3	18.6
Finance, insurance, and real estate	4.7	9.5	4.8	9.8	3.9	7.2	4.1	8.6
Services	22.4	43.7	21.9	43.3	25.5	48.3	21.2	40.9
Business services	4.0	4.5	3.9	4.6	4.7	4.8	4.3	5.4
Repair services	2.6	.6	2.7	.6	1.7	-	3.7	.8
Personal services	1.8	5.9	1.5	5.7	3.3	8.2	2.9	10.2
Entertainment and recreational services	1.3	.9	1.3	1.0	1.3	.6	1.4	.8
Professional and related services	12.6	31.5	12.3	31.2	14.2	34.4	8.8	23.6
Public administration	5.0	4.5	4.7	4.1	7.0	7.1	3.4	4.2

<sup>1</sup> Persons of Hispanic origin may be of any race.

Source: U. S. Bureau of the Census, Current Population Survey, Current Population Reports, Series P-23, Number 160, Table 6.

## **V. Prevalence of Disability in Institutions**

**Table 26. Number of Nursing Home Residents by Selected Functional Statuses, Age, Sex, and Race: United States, 1985**

**Highlights:**

- There were 1,491,400 nursing home residents in 1985, 88.4 percent or 1.3 million of whom were 65 years of age or over, and 40 percent were 85 or over.
- Of the total for all ages, 28.4 percent were male and 71.6 percent female.
- Many of the residents of nursing homes required assistance with activities of daily living (ADLs) or could not perform an ADL at all. The table lists many functional dimensions, six of which are ADLs: bathing (88.7 percent required assistance), dressing (75.4 percent), eating (39.3 percent), transferring (into or out of a bed or chair) (59.9 percent), using toilet room (60.9 percent, including persons requiring assistance at 48.9 percent, and persons who do not use toilet room at 12.0 percent), and continence (51.9 percent were incontinent - bowels, bladder, or both).
- In terms of the number of ADL dependencies, 28.9 percent required assistance with all six, and 9.8 percent needed no help in this regard.
- The level of ADL dependency among nursing home residents increased with age. The resident population under the age of 65 had an average of 2.8 dependencies per person. The 65-74 age group had an average of 3.4, while there were 3.8 dependencies in the 75-84 age bracket, and those 85 and over had an average of 4.1 dependencies.
- Nearly 85 percent of the nursing home residents received help with instrumental activities of daily living (IADLs), which involve more complex functions than ADLs and include care of personal possessions (73.5 percent received help), handling money (75.3 percent), securing personal items (76.3 percent), and using the telephone (62.7 percent).
- IADL dependency also increased with age. Of those under 65 years of age, 75.1 percent had IADL dependencies. This increased to 89.0 percent for the residents 85 years of age or over.
- Among all residents, 63.5 percent used eyeglasses or contact lenses, and 6.5 percent used a hearing aid.
- Of the total, 22.7 percent had a vision impairment, 20.7 had a hearing impairment, and 70.7 percent required assistance in mobility.

**Explanatory Notes**

Data for this table come from the 1985 National Nursing Home Survey, conducted by the National Center for Health Statistics. The study included all types of nursing and related care homes with three or more beds set up and staffed for use by residents and routinely providing nursing and personal care services. The facilities included were either freestanding establishments or nursing care units of hospitals, retirement centers or similar institutions maintaining financial and employee records separate from those larger facilities. Institutions operated solely as mental health or mental retardation facilities are excluded, as were either board and care homes or residential care facilities. Facilities in Alaska and Hawaii were not included in the survey.

As with other studies which measure ADL and IADL dependency, the prevalence figures are affected by the number and specific types of activities a survey includes. Studies with relatively long lists of activities produce relatively high prevalence estimates of persons with a dependency with one or more activities (or the average number of dependencies per person). See Table 6 and the introduction for cross-study issues regarding Activities of Daily Living.

Table 26. Number of Nursing Home Residents by Selected Functional Statuses, Age, Sex, and Race: United States, 1985

Functional Status	All Residents	Age					Sex		Race		
		Under 65 Years	65 Years and Over			Male	Female	White	Black and Other		
			Total	65-74 Years	75-84 Years				85 Years and Over	Total	Black
<b>Total</b>	1,491,400	173,100	1,318,300	212,100	509,000	597,300	423,800	1,067,700	1,374,600	116,800	104,400
<b>Aids Used<sup>1</sup></b>											
Eyeglasses or contacts	947,400	70,400	877,100	112,200	335,700	429,200	223,400	724,100	903,400	44,100	38,700
Hearing Aid	96,800	*	95,100	5,800	24,600	64,700	24,700	72,100	93,300	*	*
<b>Vision<sup>2</sup></b>											
Not impaired	1,132,600	153,300	979,400	176,700	396,100	406,600	334,700	797,900	1,044,400	88,300	77,900
Partially impaired <sup>3</sup>	217,800	10,200	207,600	21,200	72,200	114,200	54,900	162,900	200,100	17,700	16,400
Severely impaired	83,300	*	80,100	9,100	20,800	50,200	18,400	65,000	79,100	*	*
Completely lost	37,100	*	32,800	*	10,700	19,300	10,300	26,900	31,100	6,100	*
Unknown	20,500	*	18,400	*	9,300	7,000	*	15,000	20,000	*	*
<b>Hearing<sup>1</sup></b>											
Not impaired	1,171,200	166,400	1,004,800	191,600	420,600	392,600	337,300	833,300	1,074,700	96,500	86,300
Partially impaired <sup>3</sup>	248,700	*	243,300	15,800	75,100	152,400	68,100	180,600	232,000	16,700	14,700
Severely impaired	51,000	*	50,800	*	7,700	40,700	12,700	38,300	48,900	*	*
Completely lost	8,800	*	8,500	*	*	*	*	6,300	8,100	*	*
Unknown	11,800	*	10,900	*	*	6,700	*	8,600	10,900	*	*
<b>Bathing</b>											
Independent	168,200	50,100	118,100	22,300	49,200	36,600	74,800	93,400	157,300	10,900	9,100
Requires assistance	1,323,200	123,000	1,200,200	179,700	459,800	560,700	349,000	974,300	1,217,300	105,900	95,300
<b>Dressing</b>											
Independent <sup>4</sup>	366,900	71,200	295,700	63,300	122,800	109,500	136,400	230,500	343,500	23,400	19,900
Requires assistance; includes those who do not dress	1,124,600	101,900	1,022,700	148,800	386,200	487,700	287,300	837,200	1,031,200	93,400	84,400
<b>Eating</b>											
Independent <sup>4</sup>	905,200	118,600	786,500	141,200	110,000	335,300	281,800	623,400	839,000	66,100	57,400
Requires assistance; includes those who are tube or intravenously fed	586,300	54,500	531,800	70,900	199,000	261,900	142,000	444,300	535,600	50,700	47,000

Table 26. Number of Nursing Home Residents by Selected Functional Statuses, Age, Sex, and Race: United States, 1985

Functional Status	All Residents	Age					Sex		Race		
		Under 65 Years	65 Years and Over				Male	Female	White	Black and Other	
			Total	65-74 Years	75-84 Years	85 Years and Over				Total	Black
<b>Mobility</b>											
Walks independently <sup>4</sup>	436,900	88,400	348,500	84,000	154,800	109,700	159,200	277,700	407,700	29,200	24,300
Walks with assistance	369,500	23,300	346,200	43,200	126,000	176,900	92,500	278,900	344,700	24,700	22,900
Chairfast	588,800	50,700	538,100	71,500	196,900	269,700	152,000	436,800	532,200	56,700	51,600
Bedfast	96,300	10,700	85,600	13,300	31,300	41,000	20,000	76,300	90,100	6,200	*
<b>Transferring<sup>5</sup></b>											
Independent	598,000	104,600	493,400	101,800	204,900	186,900	205,900	392,100	555,800	42,200	36,000
Requires assistance	893,400	66,500	824,900	110,400	304,100	410,400	217,800	675,600	818,900	74,600	68,300
<b>Using Toilet Room</b>											
Independent <sup>4</sup>	583,900	98,800	485,000	92,100	201,800	191,100	202,300	381,500	540,900	43,000	37,200
Requires assistance	728,700	54,500	674,200	97,200	243,100	333,900	181,800	546,900	673,300	55,400	51,300
Does not use toilet	178,900	19,800	159,100	22,800	64,000	72,200	39,600	139,300	160,400	18,500	15,900
<b>Continence</b>											
No difficulty controlling bowels or bladder <sup>4</sup>	717,000	117,200	599,800	121,000	228,800	250,000	224,000	483,000	661,700	55,300	47,700
Difficulty controlling bowels	28,800	*	26,200	*	8,900	13,100	9,500	19,300	27,700	*	*
Difficulty controlling bladder	153,000	11,200	141,900	14,300	55,800	71,700	39,400	113,700	144,400	8,600	7,600
Difficulty controlling both bowels and bladder	472,400	29,100	443,300	58,400	171,000	213,900	116,300	356,100	432,300	39,500	36,500
Ostomy in either bowels or bladder	120,100	13,000	107,100	14,100	44,500	48,500	34,500	85,700	107,900	12,300	11,500
<b>Number of dependencies in activities of daily living<sup>6</sup></b>											
None	146,200	45,800	100,400	28,000	43,800	28,500	67,800	78,300	136,400	9,800	7,900
1	166,700	20,300	146,500	29,700	59,300	57,500	52,000	114,700	157,700	9,000	7,600
2	151,800	21,700	130,100	23,700	49,000	57,500	44,300	107,500	141,000	10,800	9,500
3	115,300	12,500	102,800	15,400	44,400	43,100	35,100	80,200	102,600	12,700	11,300
4	195,600	18,300	177,300	29,300	65,200	82,800	51,400	144,200	178,200	17,400	15,000
5	284,200	23,600	260,600	35,200	99,000	126,400	72,700	211,500	262,700	21,500	19,600
6	431,700	31,000	400,700	50,700	148,400	201,500	100,300	331,300	396,000	35,700	33,400
Average number of dependencies	3.8	2.8	3.9	3.4	3.8	4.1	3.3	3.9	3.7	3.9	4.0

Table 26. Number of Nursing Home Residents by Selected Functional Statuses, Age, Sex, and Race: United States, 1985

Functional Status	All Residents	Age					Sex		Race		
		Under 65 Years	65 Years and Over				Male	Female	White	Black and Other	
			Total	65-74 Years	75-84 Years	85 Years and Over				Total	Black
Receives help in instrumental activities of daily living <sup>1</sup>											
Does not receive help <sup>4</sup>	227,300	43,200	184,100	39,500	79,200	65,400	86,300	140,900	212,200	15,000	12,900
Receives help	1,264,200	129,900	1,134,300	172,600	429,900	531,800	337,400	826,800	1,162,400	101,000	91,400
Care of personal possessions	1,095,800	104,600	991,300	148,300	377,100	465,900	283,000	812,800	1,004,700	91,100	82,200
Handling money	1,123,700	115,100	1,008,600	149,800	382,300	476,500	296,800	826,900	1,036,200	87,600	77,400
Securing personal items such as newspapers, toilet articles, snack food	1,137,400	108,000	1,029,400	152,800	386,600	490,000	295,500	841,900	1,045,700	91,600	82,900
Using the telephone	935,700	83,000	852,700	124,700	325,800	402,200	244,300	691,400	853,800	81,900	74,800

<sup>1</sup> Figures do not add to totals because resident may not have used glasses, contacts, or hearing aid.

<sup>2</sup> Status at best correction, that is, with corrective lenses or hearing aid, if applicable.

<sup>3</sup> Includes a small number of residents who were impaired but whose level of impairment is unknown.

<sup>4</sup> Includes a small number of unknowns.

<sup>5</sup> Transferring refers to getting in or out of a bed or chair.

<sup>6</sup> Activities of daily living include bathing, dressing, eating, transferring, using toilet room, and continence. Unknowns were considered not dependent.

\* Figure has low statistical reliability or precision (relative standard error exceeds 30 percent).

Note: Figures may not add to totals because of rounding.

Source: National Center for Health Statistics, 1985 National Nursing Home Survey, *Vital and Health Statistics*, Series 13, No. 87, Table 27.

**Table 27. Residents of Nursing Homes by Age, Sex, and Diagnoses of Selected Impairments and Chronic Conditions at Time of Survey: 1985**

### **Highlights**

- At the time of the survey, the 1,491,400 nursing home residents were diagnosed with 4,971,700 conditions, an average of 3.33 conditions per resident. Those residents below 65 were diagnosed with the fewest conditions per person at 2.75, while residents 85 and older had an average of 3.51 diagnosed conditions. Women had a higher average number of conditions per person (3.4) than men (3.2).
- The most frequently diagnosed conditions were circulatory at 1,520,800 (30.6 percent of all diagnoses), mental disorders at 690,110 (13.9 percent), nervous system and sense organ diseases at 509,400 (10.2 percent), musculoskeletal system and connective tissue disease at 429,300 (8.6 percent), and endocrine, nutritional, and metabolic and immunity disorders at 293,300 (5.9 percent). Within these five categories, the most prevalent diagnoses were heart disease, senile dementia or organic brain syndrome, cerebrovascular disease, arthritis or rheumatism, essential hypertension, diabetes mellitus, and psychoses other than senile dementia.
- Residents below age 65 were most frequently found to have mental disorders followed by nervous system and sense organ diseases, and symptoms, signs and ill defined conditions. Residents 65 years of age and over were diagnosed most frequently with circulatory system diseases, mental disorders, diseases of the nervous system and sense organs, and musculoskeletal system and connective tissue disease.
- Men were more likely than women to have malignant neoplasms (cancer), mental retardation, and chronic obstructive pulmonary disease. Women were more likely than men to have senile dementia or organic brain syndrome, essential hypertension, heart disease, arthritis or rheumatism, senility without psychosis, osteoporosis, and hip and other fractures.

### **Explanatory Notes**

Data for this table come from the 1985 National Nursing Home Survey conducted by the National Center for Health Statistics. For a description of this sample survey, see Table 26.

The figures in the table are counts of conditions, not persons, and one individual may be counted more than once for a particular condition category, such as heart disease, and may have more than one condition.

Table 27. Residents of Nursing Homes by Age and Sex and All-Listed Diagnoses of Selected Impairments and Chronic Conditions at Time of Survey: 1985

Selected Impairments and Chronic Conditions	Total	Sex		Age				
		Male	Female	Under 65 years	Total 65 years and over	65-74 years	75-84 years	85 years and over
All Diagnoses	4,971,700	1,368,200	3,603,500	476,300	4,495,500	703,300	1,696,300	2,095,900
Chapter 2. Neoplasms	96,900	34,800	62,100	7,100	89,800	14,500	36,600	38,800
Malignant Neoplasms	82,600	31,900	50,600	5,900	76,700	12,900	31,400	32,300
Chapter 3. Endocrine, Nutritional, and Metabolic Diseases and Immunity Disorders	293,300	76,500	216,800	30,300	263,000	54,000	119,300	89,700
Diabetes Mellitus	186,200	50,600	135,600	20,500	165,700	35,100	74,600	56,000
Chapter 4. Diseases of the Blood and Blood-Forming Organs	75,300	21,400	54,000	4,200*	71,200	10,100	23,200	37,800
Anemias	70,600	20,200	50,400	4,200*	66,400	8,700	21,400	36,400
Chapter 5. Mental Disorders	690,100	209,000	481,100	124,300	565,700	114,200	228,400	223,200
Senile Dementia or Organic Brain Syndrome	357,900	85,500	272,400	16,800	341,100	39,900	135,500	165,700
Psychoses Other than Senile Dementia	170,400	57,900	112,500	51,500	118,800	39,200	44,800	34,900
Neurotic and Personality Disorders	36,100	12,500	23,600	10,700	25,300	5,400*	11,800	8,100
Mental Retardation	50,600	22,600	27,900	29,900	20,700	12,300	7,200	1,100*
Other Mental Disorders	75,200	30,600	44,600	15,400	59,800	17,400	29,100	13,300
Chapter 6. Diseases of the Nervous System and Sense Organs	509,400	165,000	344,400	80,700	428,600	83,900	165,600	179,100
Alzheimer's Disease and Other Specified and Unspecified Degeneration of the Brain	73,900	20,300	53,600	3,200	70,700	16,000	32,000	22,700
Parkinson's Disease	70,900	24,400	46,500	4,200	66,800	12,100	32,600	22,100
Glaucoma	35,800	7,400	28,500	1,100	34,700	4,200*	10,200	20,300
Cataract	45,900	13,100	32,800	1,800	44,100	4,000*	12,100	28,000

Table 27 (Continued). Residents of Nursing Homes by Age and Sex and All-Listed Diagnoses of Selected Impairments and Chronic Conditions at Time of Survey: 1985

Selected Impairments and Chronic Conditions	Total	Sex		Age				
		Male	Female	Under 65 years	Total 65 years and over	65-74 years	75-84 years	85 years and over
All Diagnoses	4,971,700	1,368,300	3,603,500	476,300	4,495,500	703,300	1,696,300	2,095,900
Chapter 7. Diseases of the Circulatory System	1,520,800	375,700	1,145,000	72,800	1,448,000	187,300	519,000	741,700
Essential Hypertension	233,600	51,600	182,000	21,500	212,000	31,100	85,400	95,400
Heart Disease	814,400	197,500	616,900	29,000	785,400	84,100	267,300	434,000
Ischemic Heart Disease	395,600	97,100	298,500	14,200	381,400	44,100	130,200	207,100
Congestive Heart Failure	159,400	29,900	129,400	5,100*	154,300	14,500	55,800	84,000
Other Heart Disease	259,400	70,400	189,000	9,700	249,700	25,600	81,300	142,900
Cerebrovascular Disease	291,800	79,900	211,900	17,800	274,000	47,700	111,200	115,200
Atherosclerosis	111,400	26,500	84,900	1,800*	109,600	13,000	32,500	64,200
Chapter 8. Disease of the Respiratory System	153,400	63,300	90,200	11,700	141,700	29,400	59,700	52,600
Chronic Obstructive Pulmonary Disease and Allied Conditions	111,100	47,700	63,400	8,000	103,100	24,400	43,900	34,800
Chapter 9. Diseases of the Digestive System	201,400	57,600	143,900	15,000	186,500	22,400	69,300	94,700
Ulcer of Stomach, Duodenum, Peptic Ulcer, or Unspecified Site	24,300	7,600	16,800	1,500*	22,900	3,000*	9,100	10,800
Chapter 10. Diseases of the Genitourinary System	133,000	46,000	87,000	11,000	122,000	19,900	46,400	55,700
Urinary Tract Infection	58,000	14,000	44,000	3,300*	54,600	6,900	22,200	25,500
Chapter 12. Diseases of the Skin and Subcutaneous Tissue	53,700	18,000	35,700	6,100	47,600	10,100	17,500	19,900
Chapter 13. Diseases of the Musculoskeletal System and Connective Tissue	429,300	78,300	351,000	19,000	410,300	46,400	141,500	222,400
Arthritis or Rheumatism	271,500	40,400	231,100	6,500	265,000	25,700	88,000	151,300
Osteoporosis	49,100	3,700*	45,300	1,000*	48,000	3,200*	16,400	28,500

Table 27 (Continued). Residents of Nursing Homes by Age and Sex and All-Listed Diagnoses of Selected Impairments and Chronic Conditions at Time of Survey: 1985

Selected Impairments and Chronic Conditions	Total	Sex		Age				
		Male	Female	Under 65 years	Total 65 years and over	65-74 years	75-84 years	85 years and over
All Diagnoses	4,971,700	1,368,300	3,603,500	476,300	4,495,500	703,300	1,696,300	2,095,900
Chapter 16. Symptoms, Signs, and Ill-defined Conditions	267,500	73,200	194,200	35,800	231,700	41,900	88,400	101,400
Senility Without Psychoses	57,400	6,400	51,000	1,700*	55,700	3,800*	16,200	35,700
Chapter 17. Injury and Poisoning	100,700	20,700	80,000	10,900	89,800	7,100	28,300	54,400
Fracture of Neck of Femur	39,100	5,900	33,200	1,600*	37,500	2,000*	11,100	24,400
Other Fractures	35,600	4,200	31,300	2,100*	33,500	3,100*	9,900	20,400
Other Fractures	377,500	110,200	267,400	31,700	345,800	49,700	131,900	164,200
Supplementary Classifications								
Persons with Potential Health Hazards Related to Personal and Family History	230,800	59,000	171,800	17,100	213,800	28,100	81,800	103,900
Persons with a Condition Influencing Their Health Status	132,600	45,100	87,500	13,400	119,200	20,100	44,700	54,500
Mean Conditions Per Person	3.33	3.23	3.38	2.75	3.41	3.32	3.33	3.51

\*Relative standard error is equal to or greater than 30 percent of the estimate -- The number of cases is too small for a valid estimate.

Source: U.S. Department of Health and Human Services, National Center for Health Statistics, 1985 National Nursing Home Survey: Vital and Health Statistics, Series 13 Number 102, Table 9.

**Table 28. Number of Nursing Home Residents and Percent Distribution by Total, Average, and Median Lengths of Stay, According to Selected Characteristics: United States, 1985**

### **Highlights**

- Most of the 1,491,400 nursing home residents had experienced relatively long stays at the time of the survey. Of the total, 63.5 percent had resided in the facility for one year or longer (the sum of the last three columns of percentages in the table), and those who had resided for over five years made up 18.1 percent. Those with stays of less than three months comprised 12.9 percent, and those staying less than six months accounted for 22.4 percent (the sum of the first two percentage break-downs).
- The mean (average) length of stay for all residents was 1,059 days, or 2.9 years, with a median stay of 614 days (1.7 years). The median length of stay is the point in the distribution where half of the residents have shorter stays and half have longer stays. Those residents with very long stays raise the average relative to the median.
- The average length of stay did not vary significantly by sex, race, or Hispanic origin. However, residents under 65 years of age had longer stays (3.6 years) than their older counterparts (2.8 years).
- The vast majority of nursing home residents were white, 1,374,600 or 92.2 percent. All others represent 7.8 percent of the population (116,800) of which 104,400 were black. Persons of Hispanic origin, who can be of any race, made up 2.8 percent of the resident population.
- Only 12.6 percent of the residents were married. Their average length of their stay, 675 days, was the lowest of all groupings. The majority of residents, 61.3 percent, had outlived their spouses and had a mean length of stay of 990 days. The 271,400 residents who never married represented 18.2 percent of the population and had the longest average stay, at 1,582 days, of all the marital status groups.

### **Explanatory Notes**

Data for this table come from the 1985 National Nursing Home Survey, conducted by the National Center for Health Statistics. For a detailed description of this study, see the explanatory notes accompanying Table 26.

Table 28. Number of Nursing Home Residents and Percent Distribution by Total, Average, and Median Lengths of Stay, According to Selected Characteristics, United States, 1985

Length of Stay Since Admission										
Characteristics	Number of Residents	Total	Less Than 3 Months	3 Months to Less Than 6 Months	6 Months to Less Than 12 Months	1 Year to Less than 3 Years	3 Years to Less than 5 Years	5 Years or More	Average Length of Stay Since Admission	Median Length of Stay Since Admission
Both sexes, all ages	1,491,400	100.0	12.9	9.5	14.1	17.5	13.0	18.1	1,059	614
Under 65 years	173,100	100.0	14.2	12.7	12.1	4.0	13.0	24.0	1,311	654
65 Years and Over	1,318,300	100.0	12.7	9.0	14.3	32.5	14.0	17.3	1,026	611
65-74 years	212,100	100.0	15.1	10.0	14.3	31.1	12.3	17.1	1,055	528
75-84 years	509,000	100.0	12.7	9.6	15.8	33.2	13.6	15.0	948	554
85 years and over	597,300	100.0	11.9	8.2	13.1	32.4	15.0	19.4	1,081	677
Male, All Ages	423,800	100.0	15.5	9.8	13.8	31.7	12.2	16.9	1,031	575
Under 65 years	89,300	100.0	16.5	14.2	11.7	24.7	11.3	21.6	1,192	563
65 Years and Over	334,400	100.0	15.3	8.6	14.4	33.6	12.5	15.7	987	581
65-74 years	80,600	100.0	16.1	7.5	13.1	32.6	11.7	19.0	1,150	622
75-84 years	141,300	100.0	15.3	9.2	16.2	33.9	11.6	13.9	912	522
85 years and over	112,600	100.0	14.8	8.5	13.2	33.9	14.1	15.5	966	617
Female, All Ages	1,067,700	100.0	11.8	9.4	14.2	31.5	14.6	18.6	1,070	630
Under 65 years	83,800	100.0	11.8	11.0	12.7	23.1	14.8	26.6	1,437	838
65 Years and Over	983,900	100.0	11.8	9.2	14.3	32.2	14.5	17.9	1,039	624
65-74 years	131,500	100.0	14.5	11.5	15.1	30.2	12.7	15.9	997	477
75-84 years	367,700	100.0	11.7	9.8	15.6	33.0	14.4	15.5	962	560
85 years and over	484,700	100.0	11.2	8.1	13.1	32.1	15.2	20.3	1,108	708
White	1,374,600	100.0	13.0	9.4	14.1	31.3	14.0	18.3	1,061	614
All Other	116,800	100.0	11.6	10.7	14.0	34.4	13.1	16.2	1,037	599
Black	104,400	100.0	11.3	10.6	13.2	35.8	12.8	16.4	1,041	621
Hispanic	41,000	100.0	14.2	9.1*	12.8*	37.6	15.0	11.2*	928	612
Non-Hispanic	1,450,400	100.0	12.9	9.5	14.1	31.4	13.9	18.3	1,063	614
Married	188,200	100.0	20.9	12.8	16.5	30.1	10.6	9.1	675	357
Widowed <sup>1</sup>	914,800	100.0	11.7	8.9	14.5	33.0	15.0	16.9	990	629
Divorced or Separated	117,000	100.0	15.8	11.0	15.0	29.6	13.5	15.1	997	538
Never Married	271,400	100.0	10.2	8.4	10.5	28.3	12.6	29.9	1,582	865

\*Standard error is equal to or greater than 30 percent of the estimate - the number of cases is too small for a valid estimate.

<sup>1</sup>Data include a small number of unknowns.

Note: Figures may not add to totals because of rounding.

Source: National Center for Health Statistics, 1985 National Nursing Home Survey, *Vital and Health Statistics*, Series 13, No. 102, Table 3.

**Table 29. Number and Percent Distribution of Nursing Home Residents, by Living Arrangement Prior to Admission: United States, 1985**

### **Highlights**

- The majority, 57.8 percent, of the 1.5 million nursing home residents were admitted from another health care facility, most frequently, 37.4 percent, from a general or short-stay hospital. Transfers among nursing homes were made by 12.2 percent of the residents. Thirty eight percent moved from a private or semiprivate residence, 18.5 percent had lived with family members, while 13.5 percent lived alone.
- Residents under the age of 65 were more likely to have come from another health care facility than their elderly counterparts (70.0 versus 56.3 percent). However, within the health facility category, those under 65 were less likely to have come from a general or short-stay hospital than their older counterparts (27.1 versus 38.7 percent) but much more likely to have come from a mental facility than the elderly residents (17.6 versus 2.8 percent).
- Prior living arrangements varied by age. Within the 65-74 age group, 29.2 percent came from private or semiprivate residences, compared to 43.2 percent of those over 85 years of age. Those 65 to 74 years of age were more likely to have come from another health facility than their counterparts 85 years and over (66.8 versus 52.8 percent).
- Elderly male residents were more likely to be admitted from a mental facility than elderly females (4.7 versus 2.1 percent), a pattern which reversed somewhat for those below age 65.
- The percent living alone prior to admission increased with age.

### **Explanatory Notes**

Data for this table come from the 1985 National Nursing Home Survey, conducted by the National Center for Health Statistics. For a detailed description of this study, see the explanatory notes accompanying Table 26.

Medicare's prospective payment system, introduced in 1983-1984, may have increased the number of nursing home residents admitted from short-stay hospitals. According to the source document, because patients were discharged after shorter hospital stays than was previously the case, they are more functionally dependent than in the past and, therefore, more likely than before to need nursing home care.

Table 29. Number and Percent Distribution of Nursing Home Residents, by Living Arrangement Prior to Admission: United States, 1985

Sex and Living Arrangement Prior to Admission	Age					
	Total	Under 65 Years	65 Years and Over			
			Total	65-74 Years	75-84 Years	85 Years and Over
Number And Percent Distribution						
All Residents	1,491,400	173,100	1,318,300	212,100	509,000	597,300
Private or semiprivate residence	38.0	23.6	39.9	29.2	40.5	43.2
Alone	13.5	4.3	14.7	8.2	14.7	16.9
With family members	18.5	15.2	18.9	16.0	19.8	19.1
With non-family members	3.2	2.2*	3.4	3.1	3.3	3.5
Unknown if with others	2.9	1.8*	3.0	1.8*	2.7	3.7
Another health facility	57.8	70.0	56.3	66.8	55.9	52.8
Another nursing home	12.2	12.7	12.1	12.9	12.6	11.5
General or short-stay hospital <sup>1</sup>	37.4	27.1	38.7	39.5	38.2	38.9
Mental facility <sup>2</sup>	4.5	17.6	2.8	7.0	2.9	1.1
Veterans hospital	2.0	6.4	1.4	4.6	0.9*	0.7*
Other health facility	2.3	5.8	1.9	3.3	1.8	1.4
Unknown or other arrangement	3.2	4.7	3.0	2.9	2.8	3.3
Male						
All Males	423,800	89,300	334,400	80,600	141,300	112,600
Private or semiprivate residence	33.0	20.8	36.3	23.2	37.2	44.6
Alone	9.9	3.2*	11.7	6.2	12.2	14.9
With family members	17.9	12.8	19.3	12.0	18.9	24.9
With non-family members	3.1	2.6*	3.2	3.4	3.6*	*2.6
Unknown if with others	2.2	2.2*	2.2	1.6*	2.5*	*2.2
Another health facility	62.3	72.0	59.6	72.4	58.5	52.0
Another nursing home	12.9	12.1	13.1	13.8	13.1	12.4
General or short-stay hospital <sup>1</sup>	33.2	25.7	35.2	35.4	36.5	33.5
Mental facility <sup>2</sup>	6.9	15.5	4.7	9.2	4.1	*2.1
Veterans hospital	6.9	12.5	5.4	11.6	3.2*	*3.8
Other health facility	2.6	5.5*	1.9	3.3*	1.7*	*1.0
Unknown or other arrangement	3.6	5.3*	3.2	3.2*	3.6*	*2.7
Female						
All Females	1,067,700	83,800	983,900	131,500	367,700	484,700
Private or semiprivate residence	40.0	26.6	41.1	32.8	41.8	42.8
Alone	14.9	5.5*	15.7	9.4	15.7	17.4
With family members	18.7	17.8	18.8	18.5	20.2	17.7
With non-family members	3.3	1.8*	3.4	2.9*	3.2	3.7
Unknown if with others	3.1	1.5*	3.3	2.0*	2.7	4.0
Another health facility	56.1	67.8	55.1	63.3	54.9	53.0
Another nursing home	11.9	13.3	11.8	12.4	12.4	11.2
General or short-stay hospital <sup>1</sup>	39.0	28.6	39.9	42.1	38.9	40.1
Mental facility <sup>2</sup>	3.5	19.9	2.1	5.6	2.5	*0.9
Veterans hospital	0.0*	-	0.0*	0.3*	-	-
Other health facility	2.2	6.1*	1.9	3.2*	1.9	1.5
Unknown or other arrangement	3.0	4.1*	3.0	2.8*	2.4	3.4

<sup>1</sup> Psychiatric units are excluded.

<sup>2</sup> Includes mental hospitals, facilities for the mentally retarded, general or short-stay hospital psychiatric units, and mental health centers.

\* Relative standard error is equal to or greater than 30 percent - The number of cases is too small for a valid estimate.

Note: Figures may not add to total because of rounding.

Source: National Center for Health Statistics, 1985 National Nursing Home Survey, *Vital and Health Statistics*, Series 13, No. 102, Table 15.

**Table 30. Mental Health Inpatients at End of Year, Average Daily Census, Annual Additions, and Episodes, by Type of Facility: 1986**

### Highlights

- At the end of 1986, 237,845 individuals were receiving inpatient treatment for mental disorders. Approximately one half, 46.8 percent, were receiving their treatment in state or county mental hospitals. Non-Federal general hospitals with separate psychiatric services were serving the next largest inpatient population with 34,474 residents (14.5 percent of the total). The remaining types of facilities were each providing care to approximately ten percent of the inpatient population.
- During 1986 the number of new patient additions was greatest for non-federal general hospitals with separate psychiatric services, with 849,306 admissions. These hospitals admitted over twice as many patients as the next nearest care provider, the state and county mental hospitals. Among residential treatment centers (RTCs) for emotionally disturbed children, there were 24,511 additions for the year.
- The number of inpatient episodes, or cases treated, is defined as persons on the service rolls at the beginning of the year plus inpatient additions during the year. The number of inpatient episodes during 1986 totaled 2,055,571. Almost half, 43 percent, or 883,119, were treated in non-federal general hospitals. The state and county mental hospitals provided treatment to less than half the number of the non-federal general hospital patients.
- The mean length of stay for inpatient treatment (see explanatory notes) varies considerably among the various types of facilities. Emotionally disturbed children in RTCs receive approximately six months of care per visit while non-federal general hospital stays are of two weeks in duration. The other types of facilities provide treatment involving more than a month in duration.
- A total of 3,039 facilities were providing inpatient services at the end of 1986. While state and county mental hospitals accounted for only 285 of this total, they served nearly half (46.8 percent) of the inpatient population (in terms of average daily census). Non-federal general hospitals, on the other hand, numbered 1,287 but served only 15.1 percent of the inpatient population.

### Explanatory Notes

The data in this table were collected through inventories of mental health organizations conducted by the Survey and Reports Branch, Division of Biometry and Applied Sciences, National Institute of Mental Health (NIMH). The average daily inpatient census is computed by dividing the total annual inpatient days by the number of days in the year. Inpatient additions include new admissions, readmissions, returns from long term leave, and transfers from non-inpatient divisions of the same hospital.

The mean length of stay per episode can be approximated by the ratio of the average daily census to the total inpatient additions; the result is expressed in years. This result is approximate because inpatient movements into and out of facilities may be distributed unevenly over the year and because growth rates and mean length of stay may be changing.

This table shows only *inpatient* figures; however, NIMH also collects data on the number of persons receiving mental health services in other settings. *Outpatient* mental health organizations had 1.4 million persons under care and 2.1 million admissions during 1986. *Partial care* organizations had 133,194 persons under care and 156,912 admissions during that year. NIMH classifies inpatient facilities as providing 24 hour care, outpatient organizations as providing ambulatory services for less than three hours at a single visit, and partial care as a planned program of treatment generally in visits of three or more hours. See Table 31 for additional detail.

Table 30. Mental Health Inpatients at End of Year, Average Daily Census, Annual Additions and Episodes, by Type of Facility: United States, 1986								
Type of facility	Number of facilities	Average daily inpatient census	Inpatients at end of year		Inpatient additions		Inpatient episodes	
			Number	Percent	Number	Percent	Number	Percent
All organizations	3,039	228,530	237,845	100.0	1,819,189	100.0	2,055,571	100.0
State and county mental hospitals	285	107,056	111,135	46.8	332,884	18.3	445,181	21.6
Private psychiatric hospitals	314	23,475	24,581	10.3	234,663	12.9	258,255	12.6
Non-Federal general hospitals with separate psychiatric services	1,287	34,437	34,474	14.5	849,306	46.7	883,119	43.0
VA medical centers	124	21,242	24,322	10.2	179,964	9.9	203,851	9.9
Federally funded community mental health centers	-	-	-	-	-	-	-	-
Residential treatment centers for emotionally disturbed children	437	22,650	23,171	9.7	24,511	1.3	47,204	2.3
All other organizations	592	19,670	20,152	8.5	197,861	10.9	217,961	10.6

Source: National Institute of Mental Health, Mental Health, United States, 1990, Tables 1.3, 1.4, 1.6 and 1.7.

**Table 31. Inpatient Under Care and Admissions - Number and Percent of Total Persons Under Care, by Selected Principal Diagnoses and Type of Inpatient Psychiatric Service: United States, April 1, 1986**

### Highlights

- The most frequently occurring principal psychiatric diagnoses for those under care were schizophrenia at 44 percent and affective disorders at 22 percent. However, variations occurred among types of facilities, with private psychiatric hospitals and non-federal general hospitals having affective disorders as the most frequently occurring, at 50 and 37 percent, respectively.
- Alcohol-related disorders for those under care, while averaging only 6 percent, ranged from highs of 19 and 12 percent, respectively, for VA medical centers and non-federal general hospitals, to lows of 3 percent, each, for state and county mental hospitals and private psychiatric hospitals.
- As with the patients under care, the same two conditions were the most prevalent among admissions, but in the opposite order, with affective disorders at 31 percent and schizophrenia at 23 percent.
- For admissions, alcohol-related disorders constituted 15 percent, as compared to only 6 percent for those under care. However, the rate was nearly half this amount at private psychiatric hospitals.

### Explanatory Notes

The data in this table were collected through a sample survey of mental health organizations conducted by the Survey and Reports Branch, Division of Biometry and Applied Sciences, National Institute of Mental Health (NIMH), in cooperation with the state mental health agencies and the American Hospital Association (AHA).

The table shows selected principal diagnoses for the mental health inpatient population in the United States. NIMH divides this population into two groups for descriptive purposes. The first is patients *under care* as of April 1, 1986, which represents the long-term caseload. A total of 160,862 inpatients were estimated to be under care at that time. The second category is annual *admissions* during 1986. There were 1.6 million inpatients admitted during this period. These two total figures are used for computing the percentages shown which do not add to 100 percent because the table includes only selected diagnoses. Because the median length of stay for inpatients is short -- 15 days -- the number of inpatient admissions far exceeds the number under care.

Excluded from the NIMH data collection are psychiatric services of all types of hospitals operated by federal agencies other than the Department of Veterans Affairs (e.g., Public Health Service, Indian Health Service, Department of Defense, Bureau of Prisons); general hospitals which have no separate psychiatric services but admit psychiatric patients to non-psychiatric units; and psychiatric services of halfway houses, community residential organizations, local and county jails, state prisons, and other human service providers.

Table 31. Inpatient Under Care - Number and Percent of Total Persons Under Care, by Selected Principal Diagnoses and Type of Inpatient Psychiatric Service: United States, April 1, 1986

Selected Principal Diagnoses	Total, All Inpatient Services	State and County Mental Hospitals	Private Psychiatric Hospitals	VA Medical Centers	Non-Federal General Hospitals	Multiservice Mental Health Organizations
Alcohol-Related Disorders	10,008	2,740	500	2,484	4,036	248
Drug-Related Disorders	4,829	1,460	591	527	1,981	*
Affective Disorders	34,722	11,719	8,158	2,130	11,845	870
Schizophrenia	69,994	54,277	2,184	5,359	6,115	2,059
Personality Disorders	3,883	2,400	601	255	550	*
Adjustment Disorders	6,301	2,458	650	113	2,835	245
Organic Disorders	9,001	6,603	470	783	954	181
	Percent of Total Persons Under Care					
Alcohol-Related Disorders	6.2%	2.9%	3.0%	18.8%	12.5%	5.3%
Drug-Related Disorders	3.0	1.5	3.6	4.0	6.1	*
Affective Disorders	21.6	12.4	49.7	16.1	36.8	18.6
Schizophrenia	43.5	57.5	13.3	40.6	19.0	44.0
Personality Disorders	2.4	2.5	3.7	1.9	1.7	*
Adjustment Disorders	3.9	2.6	4.0	0.9	8.8	5.2
Organic Disorders	5.6	7.0	2.9	6.0	3.0	3.9

Table 31. (Continued) Inpatient Admissions - Number and Percent of Total Admissions, by Selected Principal Diagnoses and Type of Inpatient Psychiatric Service: United States, April 1, 1986

Selected Principal Diagnoses	Total, All Inpatient Services	State and County Mental Hospitals	Private Psychiatric Hospitals	VA Medical Centers	Non-Federal General Hospitals	Multiservice Mental Health Organizations
Alcohol-Related Disorders	236,917	53,788	15,715	57,506	99,044	10,864
Drug-Related Disorders	105,096	20,768	14,525	16,785	48,437	4,581
Affective Disorders	490,891	54,571	100,254	27,301	291,680	17,185
Schizophrenia	369,402	118,852	23,588	47,298	151,407	28,257
Personality Disorders	29,910	6,360	2,230	4,135	13,588	3,597
Adjustment Disorders	121,330	20,408	13,413	7,019	69,914	10,578
Organic Disorders	47,796	10,412	4,795	6,018	23,420	3,151
	Percent of Total Admissions					
Alcohol-Related Disorders	14.8%	16.5%	7.6%	32.1%	12.5%	12.1%
Drug-Related Disorders	6.6	6.4	7.0	9.4	6.1	5.1
Affective Disorders	30.8	16.7	48.3	15.2	36.7	19.2
Schizophrenia	23.1	36.5	11.4	26.4	19.1	31.5
Personality Disorders	1.9	2.0	1.1	2.3	1.7	4.0
Adjustment Disorders	7.6	6.3	6.5	3.9	8.8	11.8
Organic Disorders	3.0	3.2	2.3	3.4	2.9	3.5

\*Estimate based on five or fewer sample cases or estimate not shown because it does not meet standards of reliability (relative standard error of 50 percent or higher).

Source: National Institute of Mental Health, *Mental Health, United States, 1990*, Tables 2.6 and 2.7.

**Table 32. Average Daily Inpatient and Residential Treatment Census and Number of Inpatient Episodes, by Type of Mental Health Organization: United States, Selected Years, 1969-86**

### **Highlights**

- For all mental health inpatient organizations, the average daily census has declined by more than 50 percent between 1969 and 1986; however this pattern varied among the types of organizations and particular time periods involved. The overall trend was a decrease between 1969 and 1981, followed by an increase through 1986, the last year for which statistics are available.
- The net decrease in average daily census between 1969 and 1986 is the result of a steady decline for state and county mental hospitals and VA medical centers during this period. All other categories of organizations have generally experienced increases in their average daily census.
- The number of inpatient episodes, or cases treated, is defined as persons on the service rolls at the beginning of the year plus inpatient additions during the year. Overall, this number has increased by over 20 percent between 1969 and 1986; however this pattern varied among the types of organizations and particular time periods involved. For example, all categories experienced an increase in the number of inpatient episodes, with the exception of state and county mental hospitals which showed a decline of 42 percent during this period. An increase in the number of episodes despite a decline in the average daily inpatient census is a function of relatively short stays, which in 1986 had a median length of only 15 days.

### **Explanatory Notes**

The data in this table were collected through inventories of mental health organizations conducted by the Survey and Reports Branch, Division of Biometry and Applied Sciences, National Institute of Mental Health (NIMH).

Some organizations were reclassified between 1969 and 1986 as a result of changes in reporting procedures and definitions. In addition, concerted efforts by NIMH to identify general hospitals with separate psychiatric services (beginning in 1980) and residential treatment centers (beginning in 1983), resulted in increased reporting among these types of organizations in the recent years. These factors influence the comparability of data over time.

Also, the inventory of community mental health centers was discontinued in 1981, and inpatient counts for these organizations were subsumed under either non-federal general hospitals with a separate psychiatric service, or multiservice mental health organizations which are included in the "all other organizations" category.

Table 32. Average Daily Inpatient and Residential Treatment Census and Number of Inpatient Episodes, by Type of Mental Health Organization: United States, Selected Years, 1969-86

Type of Organization	1969	1975	1979	1981	1983	1986
	Average Daily Inpatient Census					
All organizations	468,831	287,588	233,384	211,024	224,169	228,530
State and county mental hospitals	367,629	193,380	138,600	122,073	116,236	107,056
Private psychiatric hospitals	11,608	12,058	13,901	15,281	16,467	23,475
Non-Federal general hospitals with psychiatric services	17,808	22,874	23,110	29,307	34,328	34,437
VA medical centers	47,140	32,123	28,693	20,798	20,342	21,242
Federally funded community mental health centers	5,270	10,186	9,886	-	-	-
Residential treatment centers for emotionally disturbed children	12,406	16,164	18,054	16,786	15,826	22,850
All other organizations	970	803	1,140	6,779	20,970	19,670
	Number of Inpatient Episodes					
All organizations	1,710,372	1,817,108	1,779,587	1,720,392	1,860,613	2,055,571
State and county mental hospitals	767,115	598,993	526,690	499,169	459,374	445,181
Private psychiatric hospitals	102,510	137,025	150,535	176,513	180,822	258,255
Non-Federal general hospitals with psychiatric services	535,493	565,696	571,725	676,941	820,030	883,119
VA medical centers	186,913	214,264	217,507	205,580	170,508	203,851
Federally funded community mental health centers	65,000	246,891	254,288	-	-	-
Residential treatment centers for emotionally disturbed children	21,340	28,302	33,729	34,426	32,544	47,204
All other organizations	32,001	25,937	25,113	127,763	197,335	217,961

Source: National Institute of Mental Health, Mental Health, United States 1990, Tables 1.4 and 1.6.

**Table 33. Demographic Characteristics of Residents of Facilities for the Mentally Retarded by Type of Facility, United States, January 1, 1987.**

### **Highlights**

- In 1987, a total of 211,712 persons resided in facilities for the mentally retarded with three or more beds. Of these, 38.5 percent were in primarily large (16 beds or more) state institutions, 32.4 percent in large non-state facilities, and 29.1 percent in small (3-15 beds) non-state residential facilities.
- The majority, 57.3 percent, of all residents are young adults ages 22-44. The second most populous group is middle age adults ages 45-64 at 19.2 percent, followed by children and the elderly with 14.4 and 9.1 percent, respectively. Of the total, 56.3 percent were male and 43.7 percent female.
- Of all residents in facilities for the mentally retarded, 35 percent had another developmental disability such as epilepsy, autism, cerebral palsy, or spina bifida. Nearly 20 percent had a visual impairment and almost 12 percent had a hearing impairment. Fifty-eight percent had difficulty talking while almost 19 percent had other chronic physical health problems. In addition, nearly 64 percent had difficulty performing at least one activity of daily living such as bathing and dressing, while over one third had difficulty with three or more ADLs.
- Concerning the severity of retardation, 21.4 percent had borderline/mild, 20.9 percent moderate, 20.5 percent severe and 37.2 percent profound.
- There is a direct relationship between the size of the institution and the severity of the retardation of the residents. Over 60 percent of those living in mostly large state facilities had a profound level of retardation compared to less than 15 percent for small facilities of 3-15 beds.
- A similar pattern existed in terms of capacity for independent living. For residents of large facilities, over half of those in the mostly large state institutions and over 30 percent in other large facilities had difficulty with three or more ADLs, compared to only 16.8 percent for small, non-state facilities.

### **Explanatory Notes**

The data for this table were collected through Phase 1 of the Institutional Population Component (IPC) of the 1987 National Medical Expenditure Survey (NMES). The survey was designed to provide unbiased national estimates for the civilian population in facilities for the mentally retarded. Facilities eligible for inclusion within the sample include only those facilities either certified by Medicaid as an intermediate care facility for the mentally retarded or licensed or under State contract to provide living quarters for the mentally retarded or had at least three beds and provided personal care or protective oversight to other than family members.

The estimates derived are lower than those made for other surveys (see Table 44), which may result from the exclusion of one and two bed facilities and those also classifiable under another category. Within the estimated population 19,999 were not classified as mentally retarded yet were residents of the facilities. The size of this inpatient population is declining approximately 5 percent annually.

Information on facilities for the mentally retarded among the individual states also is shown in Table 44.

Table 33. Demographic Characteristics of Residents of Facilities for the Mentally Retarded by Type of Facility, United States, January 1, 1987

Resident Characteristics	Total Population	All Facilities	State Institutions	Other Residential Facilities	
				3-15 Beds	16 Beds or More
Number <sup>a</sup>	211,712	211,712	81,442	61,561	68,709
Percent		100.0	38.5	29.1	32.4
	Percent of Residents				
Age in years					
Less than 21	30,466	14.4	13.6	12.9	16.6
22-44	121,308	57.3	63.6	58.8	48.4
45-64	40,743	19.2	16.1	20.0	22.3
65 or order	19,216	9.1	6.7	8.3	12.7
Sex					
Male	119,121	56.3	59.8	52.2	55.7
Female	92,591	43.7	40.2	47.8	44.3
Racial background					
White	170,150	80.4	77.3	84.0	80.8
Black	29,728	14.0	16.3	10.6	14.5
Other	11,834	5.6	6.4	5.4	4.7
Level of retardation <sup>b</sup>					
Borderline/mild	41,046	21.4	8.6	32.1	29.2
Moderate	40,099	20.9	11.0	30.6	25.6
Severe	39,263	20.5	20.3	22.5	18.7
Profound	71,305	37.2	60.1	14.9	26.5
Difficulties with activities of daily living					
Bathing	125,853	59.5	77.2	41.7	54.4
Dressing	112,210	53.0	72.4	36.2	45.0
Using toilet	68,698	32.5	49.4	14.3	28.7
Does not use the toilet at all	19,042	9.1	15.4	1.9	8.2
Transferring	43,109	20.4	31.9	6.3	19.3
Does not transfer at all	9,630	4.6	6.1	1.0*	5.9*
Feeding self	47,925	22.6	35.7	8.8	19.5
Does not feed self at all	13,453	6.4	11.0	1.2*	5.6
Walking	50,141	23.7	34.8	9.8	22.9
Does not walk at all	27,488	13.0	20.7	2.6	13.2
No ADL difficulties	76,578	36.2	19.6	52.0	41.7
One or two ADL difficulties	60,268	28.5	26.8	31.2	28.0
Three or more ADL difficulties	74,866	35.4	53.6	16.8	30.3

Table 33 (Continued). Demographic Characteristics of Residents of Facilities for the Mentally Retarded by Type of Facility, United States, January 1, 1987

Resident Characteristics	Total Population	All Facilities	State Institutions	Other Residential Facilities	
				3-15 Beds	16 Beds or More
Number <sup>a</sup>	211,712	211,712	81,442	61,561	68,709
Percent		100.0	38.5	29.1	32.4
	Percent of Residents				
Handicaps and disabilities					
Epilepsy	56,903	27.1	40.6	17.3	19.8
Cerebral palsy	22,239	10.6	11.6	7.5	12.0
Autism	6,792	3.2	2.5	3.2	4.1*
Spina bifida	-	-	-	-	-
One or more conditions	74,026	35.0	46.8	24.4	30.5
Difficulty seeing	41,005	19.7	26.8	14.7	15.7
Blind	8,723	4.1	6.3	2.4	3.1
Difficulty hearing	24,780	11.8	13.3	11.4	10.5
Deaf	3,229	1.5	2.2	1.4*	0.9*
Difficulty talking	122,645	58.0	74.8	48.0	46.8
Does not talk at all	64,518	30.5	49.8	14.6	21.8
Physical health problem <sup>c</sup>					
None	172,098	81.3	85.4	79.0	78.5
One or more	39,614	18.7	14.6	21.0	21.5

<sup>a</sup>Includes residents with unknown ADL, handicap, and health problem status.

<sup>b</sup>Excludes persons without mental retardation.

<sup>c</sup>Includes heart disease, high blood pressure, arthritis, cancer, arteriosclerosis, rheumatism, and emphysema.

\*Relative standard error is equal to or greater than 30 percent - The number of cases is too small for a valid estimate.

\*\*Getting in and out of bed or chair

Source: Agency for Health Care Policy and Research, National Medical Expenditure Survey, Research Findings 6, Tables 4 and 6.

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**Table 34. Type of Educational Environment for Children and Youth 6-21 Years Old Served Under the Education of the Handicapped Act (Chapter 1 of ESEA (SOP) and EHA-B), by Handicapping Condition: School Year 1987-88**

### **Highlights**

- Special education placements varied depending on the particular handicapping condition. For speech impaired students, 94.5 percent were served in the integrated settings of either regular classrooms or resource rooms, compared to only 16.1 percent for deaf-blind students.
- Separate classrooms were the setting for 57.6 percent of mentally retarded students, 45.9 percent of multi-handicapped students, 35.2 percent of hearing impaired students, and 34.6 percent of emotionally disturbed students.
- The most restrictive settings - separate schools, residential facilities, or home/hospital placements - involved nearly half of the deaf-blind students and more than one-third of multi-handicapped students. These settings occurred only infrequently for children with learning disabilities and speech impairments.
- For all conditions, the most frequently occurring placement was the resource room (40.0 percent), followed by the regular classroom (28.9 percent), and a separate class (24.7 percent). Collectively, a total of 6.4 percent of all placements were in separate schools, residential facilities, or home/hospital.

### **Explanatory Notes**

This table presents data for students served under the Elementary and Secondary Education Act of 1965, commonly called Chapter 1 of ESEA (State Operated Programs) and Part B of the Education of the Handicapped Act (EHA-B). One intent of this legislation is to provide for a free public education for all handicapped students. Amendments to the legislation have extended coverage of the laws to all children; however, available placement data are combined for both laws for school age children ages 6-21. Beginning with data for the 1989-90 school year, children served by each law will be reported separately. The most recent placement data were for the 1987-88 school year.

While not available by both placement and condition, the 1988-89 school year figure for all children served under EHA-B and Chapter 1 of ESEA (SOP) was 4.6 million for children ages 0-21 years. This figure excludes infants and toddlers 0-2 years of age served under Part H of EHA.

Regular class is defined as settings where special education is made available to the student for less than 21% of the school day. Resource rooms settings provide special education more than 21% of the time but less than 60%. Separate class settings provide special education to students more than 60% of the school day. Separate school and residential facility settings both provide schooling for more than 50% of the day. In all the above settings the time not spent in special education programs is devoted to regular classroom instruction. Home/hospital programs are instances where the child's education is totally provided for in either the home or hospital.

Table 34. Type of Educational Environment for Children and Youth 6-21 Years Old Served Under the Education of the Handicapped Act (Chapter 1 of ESEA (SOP) and EHA-B), by Handicapping Condition: School Year 1987-88

Handicapping Condition	Number of Persons	Total	Regular Class	Resource Room	Separate Class	Separate School	Residential Facility	Home/Hospital
Learning Disabled	1,912,082	100%	17.6%	59.2%	21.7%	1.4%	0.1%	0.1%
Speech Impaired	940,886	100%	74.8%	19.7%	3.8%	1.5%	0.1%	0.1%
Mentally Retarded	583,796	100%	5.7%	24.0%	57.6%	11.4%	1.0%	0.3%
Emotionally Disturbed	374,328	100%	12.6%	32.9%	34.6%	14.3%	3.5%	2.2%
Hard of Hearing and Deaf	55,719	100%	24.4%	20.9%	35.2%	10.8%	8.6%	0.2%
Multi-handicapped	75,637	100%	6.4%	13.3%	45.9%	27.2%	4.0%	3.1%
Orthopedically Impaired	47,222	100%	27.8%	18.0%	31.8%	13.2%	1.0%	8.3%
Other Health Impaired	48,354	100%	30.6%	20.8%	18.7%	9.5%	0.8%	19.6%
Visually Handicapped	21,883	100%	37.7%	25.6%	20.8%	5.4%	10.0%	0.6%
Deaf-Blind	1,556	100%	8.9%	7.2%	35.1%	21.0%	24.2%	3.7%
All Conditions	4,071,463	100%	28.9%	40.0%	24.7%	4.9%	0.8%	0.7%

Notes: Totals include data from the 50 States, District of Columbia, and Puerto Rico. Educational placements for children ages 3-5 are not reported by handicapping condition. This table also does not include children 0-2 years served under Chapter 1 of ESEA (SOP) and infants and toddlers 0-2 years served under Part H of EHA.

Source: U.S. Department of Education, Twelfth Annual Report to Congress on the Implementation of The Education of the Handicapped Act (1980), Tables 1.8 and AB2.

**Table 35. Number and Average Monthly Amount of Social Security Disability Insurance Benefits Paid to Disabled Workers, and Number of Supplemental Security Income Benefits Paid to the Blind and Disabled, by Age and Sex: 1989**

### Highlights

- During 1989 a total of 415,500 new awards were made to disabled workers. The majority, 64.6 percent or 268,600 of these new additions were males, the remaining 146,900 female. The average monthly amount of these new awards was \$562.10. Males averaged a higher monthly benefit payment than women overall, \$634.40 versus \$429.90. The difference between the male and female average monthly benefits is a related to the earnings differential and increases with advancing years. In the under 30 group, female monthly benefits averaged \$386.30 versus \$397.60 for males. In the 60-64 group female benefits were \$440.50 versus \$701.40 for males.
- Average monthly benefit amount for all program participants on record as of year end 1989 was \$555.80. All males averaged \$616.50 and females \$439.20. Monthly benefits for those under 30 averaged \$375.30. It increased for each age group until peaking at \$581.00 for the 40-49 year old cohort.
- Supplemental Security Income recipients at the end of calendar year 1989 consisted of 82,765 blind and 3,071,251 disabled persons.

### Explanatory Notes

Data for this table come from the Social Security Disability Insurance (SSDI) and Supplemental Security Income (SSI) administrative records. The SSI program consists of three eligibility categories -- aged, blind, and disabled -- the latter two of which pertain to figures in this table, including all blind or disabled recipients 65 years of age and over.

To be eligible under SSI's blind category, an individual must have a central visual acuity of 20/200 or less in the better eye with use of correcting lenses, or with tunnel vision of 20 degrees or less. Eligibility for disability benefits under either SSDI or SSI requires inability to engage in any substantial gainful activity (SGA) by reason of a medically determinable physical or mental impairment which can be expected to result in death or which has lasted or can be expected to last for a continuous period not less than 12 months. The impairment must be of a degree of severity that renders the individual unable to engage in any kind of substantial gainful work that exists in the national economy, regardless whether such work exists in the immediate area in which he or she lives, or if a specific job vacancy exists for that person, or if he or she would be hired upon application for the work.

SSDI beneficiaries are converted to old age benefits upon reaching age 65; so eligibility is effectively limited to disabled workers under the age of 65. SSDI eligibility is not affected by income from savings, pensions, private insurance or other forms of non-work income. Generally, SSDI benefits can continue during a trial and adjustment period of paid employment up to 12 months. SSDI eligibility and amounts are based on previous employment and directly reflect the disparity in earnings between males and females and younger versus older workers.

SSI eligibility is limited to low income persons, and benefits fall as income rises. Eligible blind and disabled SSI recipients include children under 18 years of age and the elderly 65 and over. For a child under age 18, the disability must be of comparable severity to that of an adult.

This tables does not include data on survivors and dependents of SSDI beneficiaries who, themselves, may have a disability, nor does it include disabled dependents or disabled survivors of retired workers. For example, in 1989 under current payment status, there were 590,360 disabled children 18 years and older of either retired or SSDI beneficiaries and 102,650 disabled widows or widowers.

Table 35. Number and Average Amount of Social Security Disability Insurance Benefits Paid to Disabled Workers, and Number of Supplemental Security Income Benefits Paid to the Blind and Disabled, by Age and Sex: 1989

Age	Social Security Disability Insurance (SSDI)												Supplemental Security Income Recipients December 1989	
	New Awards to Disabled Workers During 1989						Benefits in Current-Payment Status (disabled workers) December 1989							
	Recipients			Average Monthly Amount			Recipients			Average Monthly Amount			Blind <sup>2</sup>	Disabled <sup>3</sup>
	Total	Men	Women	Total	Men	Women	Total	Men	Women	Total	Men	Women		
Total	415,500	268,600	146,900	\$562.10	\$634.40	\$429.90	2,886,590	1,898,800	987,790	\$555.80	\$616.50	\$439.20	82,765	3,071,251
<u>Children</u>														
Under 18	--	--	--	--	--	--	--	--	--	--	--	--	6,700	258,107
18-21	--	--	--	--	--	--	--	--	--	--	--	--	1,210	30,281
<u>Adults</u>														
Under 30	35,000	23,500	11,500	387.90	397.60	386.30	125,180	86,640	38,540	375.06	386.49	349.27	13,399	484,218
30-39	64,800	43,000	21,800	500.60	527.15	448.30	413,330	279,060	134,270	506.02	528.42	459.56	12,201	478,652
40-49	85,600	52,800	32,800	571.20	650.90	442.80	573,840	377,890	195,950	580.85	631.84	483.08	9,057	411,864
50-59	145,000	93,500	51,500	597.24	693.91	421.76	942,310	611,280	331,030	569.82	645.59	429.91	10,779	509,264
60-64 <sup>1</sup>	85,100	55,800	29,300	611.60	701.40	440.50	831,930	543,930	288,000	574.50	654.80	422.60	7,261	331,161
65-69	--	--	--	--	--	--	--	--	--	--	--	--	6,587	250,458
70-74	--	--	--	--	--	--	--	--	--	--	--	--	4,940	166,972
75-79	--	--	--	--	--	--	--	--	--	--	--	--	4,267	125,229
80 and older	--	--	--	--	--	--	--	--	--	--	--	--	6,438	25,046

-- Category not applicable.

<sup>1</sup> Includes a small number of new Social Security Disability Insurance beneficiaries with awards processed after attainment of age 65. New awards to disabled workers include awards to persons age 65 or older at award but whose first month of entitlement preceded the attainment of age 65. These awards are converted to old age benefits when assigned to current payment status.

<sup>2</sup> Average monthly benefit, including state supplementation, was \$319.76. The number of blind persons includes approximately 22,200 persons aged 65 or older.

<sup>3</sup> Average monthly benefit, including state supplementation, was \$308.94. The number of disabled persons includes approximately 565,000 persons aged 65 or older.

Source: Social Security Administration, *Social Security Bulletin, Annual Statistical Supplement, 1990*, Tables 5.A1, 6.A4 and 9.E3.

**Table 36. Social Security Disability Insurance (SSDI), Current Benefits: Number and Percentage Distribution of Disabled Workers, by Diagnostic Group and Sex, at End of 1989**

**Highlights**

- Diagnoses were available for 94.9 percent of disabled workers receiving benefits. The condition most frequently diagnosed as the main cause among all disabled workers was mental disorders which involved 22.7 percent of beneficiaries.
- At 18.9 percent, diseases of the musculoskeletal system were second, followed by diseases of the circulatory system (18.2 percent), and nervous system and sense organ diseases (10.9 percent).
- The relative rankings of diagnoses for each sex remained fairly consistent with the total population, except that men had a higher rate of circulatory conditions than women (20.3 versus 14.2 percent). Conversely, Women has a higher rate of musculoskeletal system disease (primarily arthritis) than men (21.4 versus 17.5 percent).
- Among these four conditions, the prevalence of mental disorders and diseases of the nervous system and sense organs declined with age; for musculoskeletal and circulatory conditions, the prevalence increased with age of the beneficiary (data not shown).

**Explanatory Notes**

Data for this table come from Social Security Administration SSDI records. For a detailed description of the SSDI program, see Table 35.

Diagnostic information is collected as part of the disability determination process, which identifies the principal medical cause of the individual's disabling condition.

Table 36. Social Security Disability Insurance (SSDI), Current Pay Benefits: Number and Percentage Distribution of Disabled Workers by Diagnostic Group and Sex, at end of 1989

Diagnostic group	Number			Percentage Distribution		
	Total	Men	Women	Total	Men	Women
Total	2,873,300	1,876,800	996,500			
Diagnosis available	2,725,900	1,780,900	945,000	100.0	100.0	100.0
Infectious and parasitic diseases	38,000	29,500	8,500	1.4	1.7	.9
Neoplasms (cancer)	91,300	50,100	41,200	3.3	2.8	4.4
Endocrine, Nutritional, and metabolic diseases	96,500	47,700	48,800	3.5	2.7	5.2
Diseases of blood and blood-forming organs	7,000	4,300	2,700	.3	.2	.3
Mental disorders (other than mental retardation)	617,900	399,500	218,400	22.7	22.4	23.1
Mental retardation	136,000	96,300	39,700	5.0	5.4	4.2
Diseases of						
Nervous system and sense organs	298,000	178,700	119,300	10.9	10.0	12.6
Circulatory system	495,800	361,600	134,200	18.2	20.3	14.2
Respiratory system	123,700	78,300	45,400	4.5	4.4	4.8
Digestive system	42,800	27,800	15,000	1.6	1.6	1.6
Genitourinary system	37,800	23,200	14,600	1.4	1.3	1.5
Skin and subcutaneous tissue	8,800	4,300	4,500	.3	.2	.5
Musculoskeletal system	514,600	312,500	202,100	18.9	17.5	21.4
Congenital anomalies	21,200	13,400	7,800	.8	.8	.8
Injuries	179,000	143,400	35,600	6.6	8.1	3.8
Other	17,500	10,300	7,200	.6	.6	.8

Source: Social Security Administration, *Social Security Bulletin, Annual Statistical Supplement, 1990*, Table 5.D5.

**Table 37. Supplemental Security Income (SSI), Number and Percentage Distribution of Blind and Disabled Persons Under Age 65 Receiving Federally Administrated Payments, by Diagnostic Group, December 1989**

### **Highlights**

- As the main cause, approximately half of all SSI blind and disabled recipients under age 65 had a diagnosis of either mental retardation (26.9 percent) or mental disorders other than mental retardation (25.6 percent). Another 12.2 percent had nervous system and sense organ diseases, and 7.6 percent circulatory diseases.
- Nervous system and sense organ disease, which by definition includes visual impairment, is the most frequently diagnosed condition of blind recipients, at 79 percent. None of the other diagnoses among the blind category is found in greater than 10 percent of the blind recipients.
- Almost half, 42 percent of the blind and disabled children are diagnosed as being mentally retarded. Another 25.7 percent have diseases of the nervous system and sense organs and 9.1 percent have congenital anomalies.

### **Explanatory Notes**

Data for this table come from Social Security Administration records on SSI beneficiaries. For a detailed description of the SSI program, see Table 35. The recipient population in this table excludes 254,000 SSI recipients who were transferred from the prior State programs of Aid to the Blind and Aid to the Permanently and Totally Disabled for whom no diagnosis was available. The Social Security Administration also did not include the 22,000 blind and 565,000 disabled SSI recipients who were 65 years of age and over in its diagnostic figures. See Table 35 for counts of SSI blind and disabled beneficiaries 65 years of age and over.

Diagnostic information is collected as part of the SSI disability determination process, which identifies the principal medical cause of the individual's disabling condition.

Table 37. Supplemental Security Income (SSI), Number and Percentage Distribution of Blind and Disabled Persons Under Age 65 Receiving Federally Administrated Payments, By Diagnostic Group, December 1989 (Based on 1-Percent Sample)

Diagnostic group	Number				Percentage distribution			
	Total	Adults		Blind and Disabled Children	Total	Adults		Blind and Disabled Children
		Blind	Disabled			Blind	Disabled	
Total	2,283,200 <sup>1</sup>	39,900	1,944,100	299,200	-	-	-	-
Diagnosis available	1,779,300	32,400	1,484,600	262,300	100.0	100.0	100.0	100.0
Infectious and parasitic diseases	21,100	200	20,000	900	1.2	.6	1.3	.3
Neoplasms	31,600	100	24,900	6,600	1.8	.3	1.7	2.5
Endocrine, nutritional and metabolic diseases	73,000	2,500	67,200	3,300	4.1	7.7	4.5	1.3
Diseases of blood and blood-forming organs	13,200	(2)	7,600	5,600	.7	-	.5	2.1
Mental disorders (other than mental retardation)	454,800	200	438,000	16,600	25.6	.6	29.5	6.3
Mental retardation	478,100	1,000	366,900	110,200	26.9	3.1	24.7	42.0
Diseases of								
Nervous system and sense organs	217,000	25,600	124,100	67,300	12.2	79.0	8.4	25.7
Circulatory system	136,000	400	132,700	2,900	7.6	1.2	8.9	1.1
Respiratory system	51,500	100	46,800	4,600	2.9	.3	3.2	1.8
Digestive system	19,100	(2)	17,600	1,500	1.1	-	1.2	.6
Genitourinary system	17,900	(2)	17,200	700	1.0	-	1.2	.3
Skin and subcutaneous tissue	3,400	(2)	(2)	(2)	-	-	-	-
Musculoskeletal system	133,200	100	129,100	4,000	7.5	.3	8.7	1.5
Congenital anomalies	40,600	1,400	15,300	23,900	2.3	4.3	1.0	9.1
Injuries	56,000	500	53,400	2,100	3.1	1.5	3.6	.8
Other	32,800	100	20,700	12,000	1.8	.3	1.4	4.6

<sup>1</sup> Excludes 254,000 SSI recipients who were transferred from the prior State programs of Aid to the Blind and Aid to the Permanently and Totally Disabled. Diagnoses are for the most part not available for these recipients.

<sup>2</sup> Detailed data not shown where total is fewer than 5,000 recipients.

Source: Social Security Administration, Social Security Bulletin, Annual Statistical Supplement, 1990, Table 9.F1

**Table 38. State Vocational Rehabilitation Agencies: Number and Percent of Persons Rehabilitated, by Major Disability and Occupation Group, National Totals, FY 1988**

### Highlights

- During federal fiscal year 1988, 217,138 persons with a disability were rehabilitated into paid employment or independent living. The majority, 148,864 or 68.6 percent, were classified as having a severe disability, while 68,274 or 31.4 percent had a non-severe one.
- Within the total rehabilitated population, those with orthopedic impairments comprised the highest percentage (20.9 percent), followed by mental illness (16.5 percent), and mental retardation (13.4 percent). The least frequently occurring conditions among those rehabilitated were respiratory conditions (0.4 percent), genito-urinary conditions (1.5 percent), and digestive disorders (1.8 percent).
- Within the severe disability category, over 23 percent of rehabilitated persons had an orthopedic impairment, followed by mental illness (16.0 percent), and mental retardation (15.7 percent). Respiratory conditions were the least prevalent (0.4 percent) among rehabilitated persons with a severe disability.
- Within the non-severe category of rehabilitated persons, mental illness was the most prevalent condition at 17.4 percent, followed by substance abuse (16.3 percent), and orthopedic impairments (15.2 percent). Respiratory conditions, at 0.6 percent, were the least prevalent rehabilitated persons with a non-severe disability.

**Table 39. State Vocational Rehabilitation Agencies: Number and Percent of Persons Rehabilitated, by Severity Status and Occupation Group, National Totals, FY 1988**

### Highlights

- For federal fiscal year 1988, occupational placement information was available for 213,949 rehabilitated persons. The occupations with the highest placement rate were the industrial category, at 27.8 percent, followed by services (22.9 percent), clerical (14.6 percent), and professional occupations (13.3 percent). The smallest percentage of those rehabilitated were placed in the agricultural sector (2.4 percent).
- The rank ordering of occupational placements for rehabilitated workers with a disability is the same for the severe and non-severe disabilities. The largest percentage of placements were in the industrial category, followed by services, clerical, and professional categories. The placement rate for the homemaker category was over twice as high in the severe as the non-severe disability category.

### Explanatory Notes

The information in these tables was reported to the Rehabilitative Services Administration by state vocational rehabilitation agencies during the 1988 fiscal year (10/1/87-9/30/88). All persons receiving state vocational rehabilitation services, as reported in this table, are considered to have a disability. Persons with a severe disability are, in general terms, defined as those (a) having stated types of major disabling conditions such as blindness, deafness and orthopedic impairments involving three or more limbs; or (b) having disabilities as qualified in some instances such as hearing impairments with a certain degree of decibel loss; or (c) being so impaired that they were receiving Social Security Disability Insurance benefits or Supplemental Security Income payments at some time while undergoing rehabilitation services; or (d) having a documented loss of functioning such as the inability to perform sustained work activity for six hours or more and requiring multiple vocational rehabilitation services over an extended period of time (Department of Education definition). Those with a severe disability were also frequently placed into sheltered workshops or unpaid family work neither of which is considered a traditional occupation.

Table 38. Number and Percent of Persons Rehabilitated, by Major Disability and Severity Status, National Totals, FY 1988			
Major Disability	Total	Severity Status	
		Severe	Non-severe
Total Number Percent	217,138 100.0%	148,864 100.0%	68,274 100.0%
Visual Impairments	8.8	10.1	5.8
Hearing Impairments	9.1	9.9	7.3
Orthopedic Impairments	20.9	23.5	15.2
Absence of Limbs	1.9	1.9	2.0
Mental Illness	16.5	16.0	17.4
Substance Abuse	10.5	7.9	16.3
Mental Retardation	13.4	15.7	8.4
Respiratory Conditions	.4	.4	.6
Digestive Disorders	1.8	.8	4.1
Heart/Circulatory	2.4	2.3	2.5
Genito-Urinary	1.5	.8	3.1
Learning Disabilities	4.9	3.7	7.5
All Other Disabilities	7.9	7.0	9.7

Table 39. Number and Percent of Persons Rehabilitated, by Occupation Group and Severity Status, National Totals, FY 1988			
Placement Occupation	Total	Severity Status	
		Severe	Non-severe
Total Number Percent	213,949 100.0%	147,044 100.0%	66,905 100.0%
Professional	13.3	12.4	15.1
Clerical	14.6	14.2	15.4
Sales	5.1	4.8	5.5
Services	22.9	22.5	23.9
Agriculture	2.4	2.3	2.6
Industrial	27.8	25.9	31.9
Homemaker	8.7	10.7	4.3
All Other	5.3	7.2	1.2

Source: U.S. Department of Education, Rehabilitation Services Administration, RSA-IM-91-04, Tables 9 and 44.

Note: Persons rehabilitated were among a total of approximately 700,000 persons receiving state VR services.

**Table 40. Disabled Veterans by Age and Period of Service: September 1989**

### **Highlights**

- As of September 1989, there were 2,775,616 disabled veterans receiving Disability Compensation or a Disability Pension from the Department of Veterans Affairs. Almost 80 percent (2,191,549) were service connected disabilities (entitling the persons to Disability Compensation), while 584,037 had non-service connected disabilities (entitling the persons to a Disability Pension).
- Nearly half (1,351,928) of all disabled veterans were from World War II, followed by the Vietnam era (672,631), peacetime service connected (420,679), the Korean conflict (306,100), and World War I and earlier (24,248).
- Fifty-four percent of disabled veterans are under the age of 65; although nearly three-quarters are 50 years of age and over and primarily World War II veterans.
- Within the under 65 age group, 86.9 percent had service connected disabilities, compared to 69.6 percent in the 65 and over age cohort.
- Approximately two-thirds of non-service connected disability (Disability Pension) is among persons 65 years of age and over, the age where eligibility requirements are less stringent than for veterans under age 65 with a non-service connected disability.

### **Explanatory Notes**

The data in this table was compiled from statistics of the Department of Veterans Affairs. A veteran is entitled to compensation for disability incurred or aggravated while on active duty. The amount of compensation is based on the degree of disability. Also, veterans who served in time of war are eligible for pension benefits for non-service connected disabilities. For a non-service connected disability, the veteran must either be permanently and totally disabled, or be age 65 or older and meet specific income limitations.

Table 40. Disabled Veterans by Age and Period of Service: September 1989

Period of Service and Origin of Disability	Total	Under 65 Years of Age					65 Years and Over			
		Total	Under 30	30-39	40-49	50-64	Total	65-74	75-84	85 and Over
Total	2,775,616	1,497,025	53,614	219,996	456,187	767,228	1,278,591	991,503	246,022	41,066
Service connected	2,191,549	1,301,221	53,614	211,753	436,092	599,762	890,328	726,642	151,835	11,851
Non-service connected	584,037	195,804	-	8,243	20,095	167,466	388,233	264,861	94,185	29,187
World War I and earlier	24,248	-	-	-	-	-	24,248	-	10	24,238
Service connected	4,633	-	-	-	-	-	4,633	-	-	4,633
Non-service connected	19,615	-	-	-	-	-	19,615	-	10	19,605
World War II	1,351,928	205,627	-	-	-	205,627	1,146,301	901,305	230,197	14,799
Service connected	911,791	130,914	-	-	-	130,914	780,877	639,291	136,327	5,259
Non-service connected	440,137	74,713	-	-	-	74,713	365,424	262,014	93,870	9,540
Korean conflict	306,100	270,176	-	-	-	270,176	35,924	29,752	5,591	581
Service connected	211,804	179,032	-	-	-	179,032	32,772	26,936	5,291	545
Non-service connected	94,296	91,144	-	-	-	91,144	3,152	2,816	300	36
Vietnam era	672,631	637,122	-	117,613	371,489	148,020	35,509	32,480	2,925	104
Service connected	642,642	607,175	-	109,370	351,394	146,411	35,467	32,449	2,920	98
Non-service connected	29,989	29,947	-	8,243	20,095	1,609	42	31	11	-
Peacetime (service connected)	420,679	384,100	53,614	102,383	84,698	143,405	36,579	27,966	7,297	1,316

- Category not applicable; age group did not serve during that period.

Source: Department of Veterans Affairs, Annual Report of the Secretary of Veterans Affairs, (1989), Table 49.

## **VII. State Level Data on Disability**

Table 41. Number of Children 6-21 Served Under Chapter 1 of ESEA (SOP) and EHA-B by Handicapping Condition: During School Year 1988-1989

### Highlights

- During the 1988-89 school year a total of 4,190,515 children in the U.S. and insular areas, ages 6-21 were provided special education under P.L. 94-142 and P.L. 89-313.
- Almost half, 47.7 percent, were classified as learning disabled. Speech impairments affected 968,908, the second most frequently occurring condition covered by the program. The mentally retarded and emotionally disturbed accounted for 13.9 percent and 9.0 percent, respectively. Hard of hearing/deaf, multi-handicapped, orthopedically impaired, other health impaired, visually handicapped, and deaf/blind each accounted for 2 percent or less of the special education student population.
- Relative rankings of states within and among handicapping conditions are subject to considerable variation related in part to differences in student populations, classification procedures, and data reporting practices among the states.

### Explanatory Notes

This table presents data on students who were served under the Elementary and Secondary Education Act of 1965, commonly called Chapter 1 of ESEA (State Operated Programs) and Part B of the Education of the Handicapped Act (EHA-B). One intent of this legislation is to provide a free public education for all handicapped students. Amendments to the legislation have extended coverage of the bills to all children; however, published condition-related data were available for only school age children 6-21 years old.

Table 34, above, uses published data for school year 1987-88 (the most recent which identifies both the educational environment and disabling conditions); however, Table 41 only covers conditions for school year 1988-89 which was the most recent published data in this regard.

The category "other health impaired" pertains to those children with any chronic or acute health condition that adversely affects their educational performance but is not defined by the specific condition categories.

Table 41. Number of Children and Youth 6-21 Served Under the Education of the Handicapped Act  
Chapter 1 of ESEA (SOP) and EHA-B) by Handicapping Condition

During School Year 1988-1989

State	All Conditions	Learning Disabled	Speech Impaired	Mentally Retarded	Emotionally Disturbed
Alabama	94,963	32,292	22,507	30,122	6,310
Alaska	12,982	6,985	2,771	1,978	561
Arizona	51,360	28,992	11,435	4,261	3,350
Arkansas	43,202	23,154	6,789	11,150	321
California	397,342	237,648	91,162	24,097	11,598
Colorado	48,668	23,755	7,802	3,235	8,867
Connecticut	58,050	31,011	9,021	3,816	11,671
Delaware	12,262	6,925	1,586	1,241	1,754
District of Columbia	6,626	3,194	1,021	1,066	943
Florida	193,857	82,188	58,039	24,747	21,985
Georgia	86,706	25,430	18,421	22,676	17,458
Hawaii	11,554	6,539	2,081	1,194	785
Idaho	18,331	10,449	3,140	2,848	486
Illinois	222,238	102,848	55,712	26,865	27,728
Indiana	101,187	38,514	35,264	19,758	4,433
Iowa	51,584	22,817	9,293	10,471	6,569
Kansas	39,444	16,548	10,832	5,618	4,392
Kentucky	67,270	21,788	21,338	18,201	2,854
Louisiana	62,510	25,220	18,219	10,566	3,774
Maine	25,114	10,965	5,490	2,789	4,029
Maryland	83,019	42,418	24,355	5,598	4,130
Massachusetts	133,874	47,207	30,712	28,341	18,435
Michigan	147,669	65,677	32,955	20,067	19,796
Minnesota	73,108	34,707	13,831	10,471	10,699
Mississippi	54,045	26,280	17,397	8,525	238
Missouri	96, ?	45,152	25,010	15,099	8,058
Montana	13,552	7,779	3,470	1,125	624
Nebraska	28,754	12,458	7,514	4,289	2,430
Nevada	14,536	8,784	3,011	1,076	875
New Hampshire	16,406	10,043	2,709	991	1,626
New Jersey	158,745	80,152	49,315	6,071	14,176
New Mexico	30,017	14,365	8,684	2,086	3,147
New York	269,580	160,024	23,885	22,619	43,745
North Carolina	106,044	45,904	23,500	20,929	9,070
North Dakota	11,199	5,358	3,477	1,519	429
Ohio	190,402	74,263	49,547	43,286	7,578
Oklahoma	58,910	28,033	15,472	11,341	1,450
Oregon	45,794	24,685	11,508	3,598	2,763

Table 41. Number of Children and Youth 6-21 Served Under the Education of the Handicapped Act  
Chapter 1 of ESEA (SOP) and EHA-B) by Handicapping Condition

During School Year 1988-1989

State	All Conditions	Learning Disabled	Speech Impaired	Mentally Retarded	Emotionally Disturbed
Pennsylvania	190,406	80,839	51,332	34,949	17,869
Puerto Rico	33,040	10,021	1,277	16,214	910
Rhode Island	18,185	12,089	2,914	1,027	1,451
South Carolina	68,814	27,211	17,801	15,090	6,075
South Dakota	12,533	5,640	3,728	1,575	532
Tennessee	94,997	49,250	22,814	13,420	2,492
Texas	296,410	187,419	58,492	24,412	23,941
Utah	40,036	17,637	7,449	3,266	9,114
Vermont	11,680	5,063	3,365	1,693	881
Virginia	96,652	49,340	22,551	13,163	7,718
Washington	66,825	34,738	12,240	7,402	4,251
West Virginia	41,549	18,966	10,636	8,556	2,275
Wisconsin	68,630	23,226	12,859	4,958	10,003
Wyoming	9,361	5,056	2,469	690	564
American Samoa	286	0	104	153	3
Guam	1,604	792	124	479	35
Northern Marianas Trust Territories	700	135	228	110	7
Virgin Islands	191	35	13	9	1
	1,160	254	237	569	36
U.S. and Insular Areas	4,190,515	1,998,422	968,908	581,465	377,295
50 States, D.C. & P.R.	4,186,574	1,997,206	968,202	580,145	377,213

Data as of October 1, 1989

Note: Conditions are not published for children ages 3-5.

Source: U.S. Department of Education, Twelfth Annual Report to Congress on the Implementation of The Education of the Handicapped Act (1990), Table AA4.

Table 41 (Continued). Number of Children and Youth 6-21 Served Under the Education of the Handicapped Act  
Chapter 1 of ESEA (SOP) and EHA-B) by Handicapping Condition

During School Year 1988-1989

State	Hard of Hearing & Deaf	Multi- Handicapped	Orthopedically Impaired	Other Health Impaired	Visually Handicapped	Deaf- Blind
Alabama	964	1,033	535	734	439	27
Alaska	142	294	86	123	41	1
Arizona	959	1,297	445	378	243	0
Arkansas	562	562	143	256	212	53
California	6,658	5,318	6,802	11,636	2,482	141
Colorado	783	3,141	752	0	254	79
Connecticut	628	885	246	323	424	25
Delaware	158	149	229	128	65	27
District of Columbia	39	173	80	59	44	7
Florida	1,591	0	2,043	2,488	755	21
Georgia	1,136	0	749	355	461	20
Hawaii	251	211	273	133	77	10
Idaho	287	228	312	520	61	0
Illinois	2,970	160	2,992	1,795	1,117	51
Indiana	1,152	804	555	136	536	35
Iowa	721	573	941	1	176	32
Kansas	611	553	411	208	224	47
Kentucky	835	1,069	434	286	478	7
Louisiana	1,230	822	919	1,321	419	20
Maine	288	914	231	286	94	8
Maryland	1,259	2,913	639	925	712	70
Massachusetts	1,893	2,964	1,485	1,889	812	136
Michigan	2,407	1,766	3,564	676	761	0
Minnesota	1,327	149	1,159	378	358	29
Mississippi	459	291	663	0	183	9
Missouri	900	434	726	427	282	54
Montana	206	309	97	176	157	9
Nebraska	478	382	642	372	186	3
Nevada	138	267	209	106	68	2
New Hampshire	216	245	151	321	97	7
New Jersey	1,301	6,172	569	524	396	69
New Mexico	394	592	510	75	118	26
New York	3,676	9,106	1,899	3,276	1,316	34
North Carolina	1,775	1,327	889	2,058	573	19
North Dakota	158	0	112	69	64	13
Ohio	2,075	9,152	3,599	0	896	6
Oklahoma	621	1,292	285	136	244	36
Oregon	1,060	0	836	999	329	16

Table 41 (Continued). Number of Children and Youth 6-21 Served Under the Education of the Handicapped Act  
Chapter 1 of ESEA (SOP) and EHA-B) by Handicapping Condition

During School Year 1988-1989

State	Hard of Hearing & Deaf	Multi- Handicapped	Orthopedically Impaired	Other Health Impaired	Visually Handicapped	Deaf- Blind
Pennsylvania	2,734	0	1,393	0	1,184	6
Puerto Rico	1,068	1,715	451	739	586	59
Rhode Island	163	80	148	240	68	5
South Carolina	963	376	721	145	422	10
South Dakota	290	415	175	89	52	37
Tennessee	1,520	1,852	904	1,824	897	24
Texas	4,181	3,860	3,627	8,651	1,761	66
Utah	590	1,162	248	329	197	44

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Table 41 (Continued). Number of Children and Youth 6-21 Served Under the Education of the Handicapped Act Chapter 1 of ESEA (SOP) and EHA-B) by Handicapping Condition

During School Year 1988-1989

State	Hard of Hearing & Deaf	Multi-Handicapped	Orthopedically Impaired	Other Health Impaired	Visually Handicapped	Deaf-Blind
Vermont	195	150	129	145	46	13
Virginia	1,181	989	646	498	565	11
Washington	1,501	2,006	938	3,434	271	44
West Virginia	374	2	327	150	227	16
Wisconsin	217	16,521	402	210	225	9
Wyoming	161	1	146	220	52	2
American Samoa	16	5	2	0	2	1
Guam	29	93	24	10	11	7
Northern Marianas Trust Territories	25	81	83	11	7	13
Virgin Islands	20	1	11	89	12	0
	19	14	5	12	14	0
U.S. and Insular Areas	57,555	84,870	47,392	50,349	22,743	1,516
50 States, D.C. & P.R.	57,446	84,876	47,267	50,227	22,697	1,495

Data as of October 1, 1989

Note: Conditions are not published for children ages 3-5.

Source: U.S. Department of Education, Twelfth Annual Report to Congress on the Implementation of The Education of the Handicapped Act (1990), Table AA4.

**Table 42. Persons Receiving Federally Administered Supplemental Security Income (SSI) Payments for the Blind and Disabled and Social Security Disability Insurance Benefits, by State 1989**

### **Highlights**

- At the end of 1989, 3.2 million blind and disabled adults and children were receiving federally administered Supplemental Security Income (SSI) payments. Among the adults, 2.8 million were disabled and nearly 75,000 were blind. Of the children, 288,388 were disabled and 7,910 were blind.
- A total of 2.8 million disabled workers were receiving Social Security Disability Insurance benefits at the end of 1989.
- The relative numbers of SSI versus SSDI recipients and the division between blind and disabled SSI beneficiaries vary by state.

### **Explanatory Notes**

Data for this table come from Social Security Administration beneficiary records. For a description of the SSI and SSDI programs, see Table 35.

Children are defined as unmarried and under the age of 18; however, students retain their eligibility as children until the age of 21.

Eligibility for SSI and SSDI is not mutually exclusive, and the same individual may qualify for both programs.

For a description of the SSI and SSDI programs, see Table 35.

Table 42. Persons Receiving Federally Administered Supplemental Security Income (SSI) Payments for the Blind and Disabled and Social Security Disability Insurance (SSDI), by State 1989

State	Supplemental Security Income Beneficiaries <sup>1</sup>					Disabled Workers Receiving Social Security Disability Insurance
	Total	Children		Adults		
		Blind	Disabled	Blind <sup>2</sup>	Disabled <sup>2</sup>	
Total	3,154,016	7,910	288,388	74,855	2,782,863	2,888,590
Alabama <sup>3</sup>	79,893	105	8,111	1,593	70,084	65,080
Alaska <sup>3</sup>	3,228	12	332	80	2,804	2,740
Arizona <sup>3</sup>	29,978	79	3,622	617	25,680	40,450
Arkansas	46,001	122	5,049	1,143	39,687	43,400
California	608,759	1,372	26,804	19,790	460,793	265,540
Colorado <sup>3</sup>	26,858	62	3,281	383	23,132	32,000
Connecticut <sup>3</sup>	23,859	77	1,940	403	21,439	29,680
Delaware	6,017	11	693	122	5,191	7,380
District of Columbia	12,548	12	913	205	11,418	5,730
Florida	129,979	290	13,299	2,876	113,514	154,870
Georgia	104,709	181	9,205	2,499	92,824	88,500
Hawaii	7,791	24	509	162	7,096	7,410
Idaho <sup>3</sup>	7,740	36	1,110	119	6,475	9,740
Illinois <sup>3</sup>	134,004	280	12,671	2,114	118,939	116,990
Indiana <sup>3</sup>	46,309	169	5,775	1,012	39,353	67,470
Iowa	23,794	159	2,606	912	20,117	29,860
Kansas	18,238	60	2,140	304	15,734	23,050
Kentucky <sup>3</sup>	79,878	132	6,636	1,832	71,278	64,540
Louisiana	88,388	234	11,856	2,023	74,273	59,580
Maine	16,064	29	1,066	240	14,729	16,990
Maryland	43,033	84	3,549	708	38,692	39,370
Massachusetts	67,890	470	5,516	4,048	57,856	64,480
Michigan	109,218	242	9,176	1,932	97,860	113,110
Minnesota <sup>3</sup>	28,383	120	2,732	535	24,996	36,790
Mississippi	69,432	102	7,706	1,565	60,059	48,410
Missouri <sup>3</sup>	59,666	130	5,912	1,015	52,609	69,040
Montana	7,568	19	887	106	6,556	10,800
Nebraska <sup>3</sup>	11,590	43	1,580	206	9,761	14,320
Nevada	6,310	58	795	450	5,007	12,130
New Hampshire <sup>3</sup>	5,129	11	488	86	4,544	10,080
New Jersey	70,874	130	7,297	1,054	62,193	78,440
New Mexico <sup>3</sup>	20,394	54	2,192	527	17,621	16,470
New York	275,953	392	25,209	3,570	246,782	200,120
North Carolina <sup>3</sup>	95,444	208	7,730	2,418	85,090	96,700
North Dakota <sup>4</sup>	5,175	11	501	71	4,592	6,120
Ohio	123,928	354	13,113	2,096	108,363	132,120
Oklahoma <sup>3</sup>	38,487	109	3,618	846	33,914	34,870
Oregon <sup>3</sup>	23,361	79	2,336	849	20,457	30,120
Pennsylvania	138,939	308	13,706	2,594	122,331	136,880
Rhode Island	11,911	26	992	182	10,711	12,820
South Carolina <sup>3</sup>	59,105	172	5,547	1,618	51,768	53,360
South Dakota	6,787	29	1,016	123	5,619	7,870
Tennessee	93,203	174	7,773	1,779	83,477	75,500
Texas <sup>4</sup>	163,375	636	21,096	4,409	137,235	138,820
Utah	9,532	64	1,450	189	7,829	11,140
Vermont	7,072	11	440	102	6,519	6,380
Virginia <sup>3</sup>	62,636	136	5,117	1,351	56,032	67,800
Washington	45,969	95	4,138	701	41,035	47,790
West Virginia <sup>4</sup>	36,371	74	2,892	585	32,810	36,060
Wisconsin	60,543	116	5,963	1,000	53,464	56,280
Wyoming <sup>3</sup>	2,447	7	303	45	2,092	4,110
Other	460 <sup>5</sup>			19 <sup>5</sup>	441 <sup>5</sup>	87,640 <sup>6</sup>

1. Includes persons with Federal SSI payments and/or federally administered State supplementation, unless otherwise indicated.
2. Includes approximately 22,200 blind and 565,000 disabled persons aged 65 or older.
3. Federal SSI payments only. State has State-administered supplementation.
4. Federal SSI payments only. State supplementary payments not made.
5. Includes adults and children. Includes SSI Blind Beneficiaries: 14 Northern Mariana Islands and 5 unknown; SSI Disabled: 269 Northern Mariana Islands and 172 unknown.
6. Includes OASDI Disability workers: 390 American Samoa, 320 Guam, 75,460 Puerto Rico, 590 Virgin Islands, 10,490 abroad, and 390 unknown.

Sources: Social Security Administration, Social Security Bulletin Annual Statistical Supplement, 1990, Tables 5.J2, 9.B1, and 9.B8.

**Table 43. Patient Movement and Caseload for Inpatient Treatment in State and County Mental Hospitals, by State: 1986**

**Highlights**

- At the end of 1986, there were 239,429 persons receiving mental health inpatient and residential treatment. This contrasts with 1.8 million additions during the course of that year. The reason for the large difference in these two figures is that most inpatient stays are relatively short, with a median of only 15 days in 1986.
- Relative to the total U.S. civilian population, the mental health inpatients at the end of 1986 constituted a rate of 98.7 per 100,000, while the rate for additions was 753. These rates varied considerably among the individual states.

**Explanatory Notes**

Data were collected by the National Institute of Mental Health, Division of Biometry and Applied Sciences from all federal, state, and private facilities providing inpatient mental health treatment services. For a description of this source, see Table 30. The figures in Table 43 come from a facilities inventory and differ somewhat from the figures in Tables 30-32 which are based on a client/patient sample survey.

Rates per 100,000 population are computed from civilian population statistics estimated as of July 1, 1986 by the U.S. Bureau of the Census.

Table 43. Number of Inpatient and Residential Treatment Residents and Additions and Rate Per 100,000 Civilian Population by State, 1986				
State	Additions During Year	Inpatients at End of Year	Rate per 100,000 Civilian Resident Population	
			Additions	Inpatient at End of Year
Total United States	1,828,427	239,429	753.0	98.7
Excluding Territories	1,819,189	237,845	759.9	99.6
Alabama	31,854	3,893	790.9	96.5
Alaska	2,762	259	542.7	51.0
Arizona	15,755	2,679	478.5	81.4
Arkansas	16,363	1,267	692.8	53.6
California	192,022	19,876	719.9	74.5
Colorado	18,405	2,725	571.0	84.4
Connecticut	28,348	4,742	893.4	149.5
Delaware	5,216	711	830.6	113.2
District of Columbia	11,691	1,947	1,888.6	314.5
Florida	92,187	9,669	796.6	83.4
Georgia	69,383	5,529	1,150.3	91.6
Hawaii	6,278	500	625.3	49.8
Idaho	3,839	421	385.4	42.2
Illinois	95,158	8,938	826.6	77.6
Indiana	40,949	5,220	745.0	95.0
Iowa	25,675	2,525	901.0	88.5
Kansas	22,212	2,895	912.1	118.8
Kentucky	29,500	2,600	805.3	70.4
Louisiana	25,475	3,763	569.5	84.2
Maine	12,944	1,356	1,112.0	116.6
Maryland	28,659	5,024	649.6	114.0
Massachusetts	54,209	11,539	931.8	198.2
Michigan	58,981	10,389	645.4	113.7
Minnesota	35,013	5,136	831.8	122.1
Mississippi	14,872	2,148	571.2	82.5
Missouri	48,871	4,929	967.8	97.6
Montana	8,553	550	1,049.5	67.5

Table 43. Number of Inpatient and Residential Treatment Residents and Additions  
and Rate Per 100,000 Civilian Population by State, 1986

State	Additions During Year	Inpatients at End of Year	Rate per 100,000 Civilian Resident Population	
			Additions	Inpatient at End of Year
Total United States	1,828,427	239,429	753.0	98.7
Excluding Territories	1,819,189	237,845	759.9	99.6
Nebraska	14,699	1,289	927.3	81.3
Nevada	5,623	341	590.1	35.8
New Hampshire	6,946	1,020	680.4	100.0
New Jersey	44,141	7,003	580.9	92.2
New Mexico	7,988	702	546.5	48.0
New York	131,147	33,086	739.0	186.5
North Carolina	66,144	5,768	1,062.2	92.6
North Dakota	5,190	589	776.9	88.2
Ohio	82,560	9,358	768.9	87.2
Oklahoma	20,172	1,752	616.5	53.6
Oregon	17,649	2,037	654.6	75.5
Pennsylvania	86,899	14,440	731.7	121.6
Rhode Island	6,253	661	645.9	68.4
South Carolina	19,337	2,675	583.9	80.8
South Dakota	5,835	888	831.1	126.4

Table 43. Number of Inpatient and Residential Treatment Residents and Additions and Rate Per 100,000 Civilian Population for All Types of Mental Health Organizations, by State, 1986				
State	Additions During Year	Inpatients at End of Year	Rate per 100,000 Civilian Resident Population	
			Additions	Inpatient at End of Year
Total United States	1,828,427	239,429	753.0	98.7
Excluding Territories	1,819,189	237,845	759.9	99.6
Tennessee	39,211	3,918	819.8	81.9
Texas	114,484	12,954	692.1	78.4
Utah	10,252	1,085	618.0	65.4
Vermont	3,484	488	644.0	90.2
Virginia	48,950	7,063	871.6	125.8
Washington	28,292	2,803	642.2	63.6
West Virginia	14,052	1,264	732.7	65.9
Wisconsin	39,553	4,456	826.9	93.2
Wyoming	5,149	975	1,023.7	193.9
Guam	-	20	-	15.7
Puerto Rico	9,232	1,547	282.0	47.2
Virgin Islands	6	17	5.5	16.3

Source: National Institute of Mental Health, *Mental Health, United States, 1990*, Tables 1.17, Part A; 1.17, Part B; 1.18, Part A; 1.21, Part A and 1.21, Part B. The 1986 population figures for rate computation were provided by the U.S. Bureau of the Census.

**Table 44. Residential Facilities for Persons with Mental Retardation: United States, 1988**

### **Highlights**

- As Table 44 A shows, there were 171,414 residents in non-state facilities and 97,357 in state facilities for the mentally retarded in 1988. Most non-state facility residents were in relatively small settings of 1-15 beds. Conversely, most residents of state facilities were in large institutions with more than 15 beds.
- Table 44 B shows that there were 36,420 facilities in 1988, most of which were in the relatively small, non-state category with 1-15 beds. Small state facilities (15 or less) were more numerous than large state facilities (16 or more); however, these small state facilities were concentrated in only a few states. There are 35 states which offered no state run facilities designed for 15 or fewer residents.
- As Table 44 C shows, the total population of persons with mental retardation in both private and state residential care facilities as of June 30, 1988 was 268,771. The majority of residential placements were in non-state operated facilities (63.8 percent), and slightly less than half were in relatively small facilities with 1-15 beds. Nation-wide, there was an average of 7.4 residents per facility. The large state facilities had an average of 309 residents each. In contrast, the large non-state facilities averaged only 42 persons each.
- Considerable variation occurred among the states relative to each other and these national patterns.

### **Explanatory Notes**

Data for this table were collected by the Center for Residential and Community Services, University of Minnesota. The survey, supported by a grant from the U.S. Department of Health and Human Services, Administration on Developmental Disabilities, was first conducted in 1978. At that time, the survey population was limited to state-operated residential facilities. In 1986 the survey was expanded to include non-state, i.e., private and county facilities offering around-the-clock care. The 1988 population frame was again increased to collect information from those residential facilities which offered less than full around-the-clock care.

The data were collected through a mail survey with telephone follow-up. State data are compiled by the state's mental retardation/developmental disabilities program director or other designated agency personnel. Item response rates for both state and non-state facilities averaged 96 percent.

The period of coverage for the survey is as of June 30, 1988; however, two states, Arizona and Massachusetts, could only make data available through June 30, 1987. The figures reflect variations in state record keeping and reporting protocols. The university does not believe that any of the differences affect the validity of national estimates. The totals in this table differ from those in Table 33 due, in part, to exclusion by the National Medical Expenditure Survey of facilities with less than three residents.

Table 44 A. Residential Facilities for Persons with Mental Retardation, 1988

State	Residents					
	Non-state			State		
	1-15 Beds	16+ Beds	Total	1-15 Beds	16+ Beds	Total
Alabama	777(e)	110	887	0	1,333	1,333
Alaska	282	0	282	0	57	57
Arizona	1,751(e)	0(e)	1,751	78(e)	388(e)	466
Arkansas	545	261	806	12	1,302	1,314
California	17,457	6,714	24,171	0	6,826	6,826
Colorado	1,877	346	2,223	274	529	803
Connecticut	2,405	59	2,464	394	2,137	2,531
Delaware	314	0	314	0	374	374
District of Columbia	729	21	750	0	256	256
Florida	3,470	2,881	6,351	0	2,019	2,019
Georgia	1,351	209	1,560	0	2,058	2,058
Hawaii	239	0	239	0	210	210
Idaho	1,021(e)	55(e)	1,076	0	236	236
Illinois	4,149	7,218	11,367	0	4,482	4,482
Indiana	3,146	563	3,709	0	2,015	2,015
Iowa	2,185	1,196	3,381	0	1,056	1,056
Kansas	2,251	681	2,932	0	1,237	1,237
Kentucky	581	513	1,094	0	757	757
Louisiana	1,959	1,652	3,611	30	2,789	2,819
Maine	1,427	321	1,748	24	290	314
Maryland	2,802	80	2,882	11	1,418	1,429
Massachusetts	3,738(e)	63(e)	3,801	24(e)	3,367(e)	3,391
Michigan	5,778	580	6,358	0	1,436	1,436
Minnesota	5,464	2,193	7,657	28	1,471	1,499
Mississippi	165	605	770	184	1,505	1,689
Missouri	2,598	920	3,518	15	1,889	1,904
Montana	970	0	970	0	243	243
Nebraska	1,601	328	1,929	0	472	472
Nevada	292	0	292	0	173	173
New Hampshire	931	0	931	0	144	144
New Jersey	3,002	70(e)	3,092	0	5,234	5,234
New Mexico	832	0	832	0	507	507
New York	12,977	1,293	14,270	3,757	9,507	13,264
North Carolina	1,792	546	2,338	0	2,845	2,845
North Dakota	1,122	67	1,189	11	316	327
Ohio	5,576	4,618	10,194	0	2,888	2,888
Oklahoma	804	2,056	2,860	0	1,186	1,186
Oregon	1,778	429	2,207	0	1,098	1,098
Pennsylvania	7,485	2,930	10,415	0	4,606	4,606
Rhode Island	949	15	964	174	261	435
South Carolina	1,312	76	1,388	9	2,437	2,446
South Dakota	1,081	0	1,081	0	434	434
Tennessee	1,496	226	1,722	0	2,017	2,017
Texas	1,928	2,780	4,708	629	7,933	8,562
Utah	789	415	1,204	0	533	533
Vermont	381	0	381	0	186	186
Virginia	1,152	282	1,434	0	2,774	2,774
Washington	3,262(e)	859	4,121	0	1,801	1,801
West Virginia	540	94	634	0	456	456
Wisconsin	4,676	1,582	6,258	0	1,796	1,796
Wyoming	310(e)	0	310	0	419	419
U.S. Total	125,507	45,907	171,414	5,654	91,703	97,357

Note: (e) signifies state estimate.

Source: Lakin, K.C., White, C.C., Hill, B.K., Bruininks, R.H., and Wright, E.A. "Longitudinal Change and Interstate Variability in the Size of Residential Facilities for Persons with Mental Retardation." *Mental Retardation*, Vol. 28, No. 6, December 1990, 349.

Table 44 B. Residential Facilities for Persons with Mental Retardation: United States, 1988

State	Facilities				Total Facilities
	Non-state		State		
	1-15 Beds	16+ Beds	1-15 Beds	16+ Beds	
Alabama	176	2	0	5	183
Alaska	138	0	0	1	139
Arizona	460(e)	0(e)	14(e)	3	477
Arkansas	57	10	1	6	74
California	4,013(e)	170	0	7	4,190
Colorado	430(e)	6	36	3	475
Connecticut	993	3	65	13	1,074
Delaware	141	0	0	1	142
District of Columbia	180	7	0	1	188
Florida	736	80	0	6	822
Georgia	679	3	0	8	690
Hawaii	132	0	0	2	134
Idaho	352(e)	2	0	1	355
Illinois	1,011(e)	117	0	13	1,141
Indiana	948	6	0	9	963
Iowa	413(e)	27	0	2	442
Kansas	299	11	0	4	314
Kentucky	269	6	0	4	279
Louisiana	484(e)	16	5	9	514
Maine	469	20(e)	2	2	493
Maryland	1,009	3	1	7	1,020
Massachusetts	986(e)	16(e)	3(e)	7(e)	1,012
Michigan	1,328(e)	6	0	8	1,342
Minnesota	1,387(e)	49	7	7	1,450
Mississippi	40(e)	5	28	5	78
Missouri	548(e)	30	2	10	590
Montana	432(e)	0	0	2	434
Nebraska	573(e)	2	0	1	576
Nevada	85	0	0	2	87
New Hampshire	325	0	0	2	327
New Jersey	998	2	0	9	1,009
New Mexico	131(e)	0	0	2	133
New York	3,281	40	469	37	3,827
North Carolina	487(e)	9	0	6	502
North Dakota	331(e)	3	1	1	336
Ohio	1,226	102	0	20	1,348
Oklahoma	181	23	0	3	207
Oregon	287(e)	17	0	2	306
Pennsylvania	3,056	162	0	14	3,232
Rhode Island	263	1	21	2	287
South Carolina	357	3	1	5	366
South Dakota	235	0	0	2	237
Tennessee	332(e)	5	0	5	342
Texas	481(e)	52	103	17	653
Utah	182	10	0	1	193
Vermont	167(e)	0	0	1	168
Virginia	178	15	0	5	198
Washington	904(e)	25	0	6	935
West Virginia	324	4	0	3	331
Wisconsin	1,700	20	0	3	1,723
Wyoming	81(e)	0	0	1	82
U.S. Total	34,275	1,090	759	296	36,420

Note: (e) signifies state estimate.

Source: Lakin, K.C., White, C.C., Hill, B.K., Bruininks, R.H., and Wright, E.A. "Longitudinal Change and Interstate Variability in the Size of Residential Facilities for Persons with Mental Retardation." *Mental Retardation*, Vol. 28, No. 6, December 1990, 349.

Table 44 C. Residential Facilities for Persons with Mental Retardation, 1988

State	Total Residents	% Residents in Non-state	% Residents in 1-15 Bed Facilities	Average Residents per Facility
Alabama	2,220	40.0	35.0	12.1
Alaska	339	83.2	83.2	2.4
Arizona	2,217	79.0	82.5	4.6
Arkansas	2,120	38.0	26.3	28.8
California	30,997	78.0	56.3	7.4
Colorado	3,028	73.5	71.1	6.4
Connecticut	4,995	49.3	56.0	4.7
Delaware	688	45.6	45.6	4.8
District of Columbia	1,008	74.6	72.5	5.4
Florida	8,370	75.9	41.5	10.2
Georgia	3,618	43.1	37.3	5.2
Hawaii	449	53.2	53.2	3.4
Idaho	1,312	82.0	77.8	3.7
Illinois	15,849	71.7	26.2	13.9
Indiana	5,274	64.8	55.0	5.9
Iowa	4,417	76.1	49.0	10.0
Kansas	4,169	70.3	54.0	13.3
Kentucky	1,851	59.1	31.4	6.6
Louisiana	6,430	56.2	30.9	12.5
Maine	2,062	84.8	70.4	4.2
Maryland	4,311	66.9	65.3	4.2
Massachusetts	7,192	52.9	52.3	7.1
Michigan	7,794	81.6	74.1	5.8
Minnesota	9,156	83.6	60.0	6.3
Mississippi	2,459	31.3	14.2	31.5
Missouri	5,422	64.9	48.2	9.2
Montana	1,221	80.1	80.1	2.8
Nebraska	2,401	80.3	66.7	4.2
Nevada	465	62.8	62.8	5.3
New Hampshire	1,075	86.6	86.6	3.3
New Jersey	8,326	37.1	36.3	8.3
New Mexico	1,336	62.1	62.1	10.1
New York	27,534	51.8	60.8	7.2
North Carolina	5,183	45.1	34.6	10.3
North Dakota	1,516	78.4	74.7	4.5
Ohio	13,082	77.9	42.6	9.7
Oklahoma	4,046	70.7	19.9	19.5
Oregon	3,305	66.8	53.8	10.8
Pennsylvania	15,021	69.3	49.8	4.6
Rhode Island	1,399	68.9	80.3	4.9
South Carolina	3,834	36.2	34.5	10.5
South Dakota	1,515	71.4	71.4	6.4
Tennessee	3,739	46.1	40.0	10.9
Texas	13,270	35.5	19.3	20.3
Utah	1,737	69.3	45.4	9.0
Vermont	567	67.2	67.2	3.4
Virginia	4,208	34.1	27.4	21.3
Washington	5,922	69.6	55.1	6.3
West Virginia	1,090	58.2	49.5	3.3
Wisconsin	8,054	77.7	58.1	4.7
Wyoming	729	42.5	42.5	8.9
U.S. Total	268,771	63.8	48.8	7.4

Source: Lakin, K.C., White, C.C., Hill, B.K., Bruininks, R.H., and Wright, E.A. "Longitudinal Change and Interstate Variability in the Size of Residential Facilities for Persons with Mental Retardation." *Mental Retardation*, Vol. 28, No. 6, December 1990, 349.

**Table 45. Work Disability and Labor Force Status of Non-Institutionalized Persons 16-64, by State: April 1980**

**Highlights:**

- In 1980, 8.6 percent of the population 16-65 years of age reported having a work disability, including 3.25 percent who were in the labor force (either employed or looking for work). The remaining were not in the labor force, most of whom were prevented from working.
- Considerable variation occurred among the states in these patterns. The highest rates of work disability were in the South and the lowest rates were in the West North Central and Mountain states.

**Explanatory Notes**

The data for this table were collected in the 1980 Census of Population, conducted in April 1980. Questions work disabilities were administered to a nineteen percent sample of households. Disabilities were defined as "a physical, mental, or other health condition which has lasted for six or more months and which: (a) limits the kind or amount of work this person can do at a job, (b) prevents this person from working at a job..." For other work disability figures, see Tables 22-25.

Considerable new information on disability was collected by the Census Bureau in 1990, which is scheduled for release beginning in late 1992.

Table 45. Work Disability and Labor Force Status of Non-Institutionalized Persons 16-64, by State: April 1980

State	Noninstitutionalized Persons 16-64				
	Total Number	Percent Reporting Work Disability			
		Total	In Labor Force	Not in Labor Force	
				Able to Work	Prevented from Working
United States, Total	144,560,822	8.58	3.25	0.90	4.43
Alabama	2,426,576	10.59	3.33	1.03	6.22
Alaska	274,019	5.40	2.84	0.73	1.83
Arizona	1,710,015	9.07	3.47	1.12	4.48
Arkansas	1,380,343	12.73	4.13	1.26	7.33
California	15,610,807	8.19	3.17	0.88	4.15
Colorado	1,927,480	7.23	3.47	0.89	2.87
Connecticut	2,022,407	6.51	2.88	0.73	2.90
Delaware	389,196	7.91	3.22	0.89	3.81
District of Columbia	437,788	9.88	3.37	1.23	5.28
Florida	5,982,901	9.93	3.42	1.11	5.40
Georgia	3,481,650	10.36	3.60	0.96	5.80
Hawaii	644,993	5.92	2.58	0.78	2.55
Idaho	575,405	8.74	4.16	1.05	3.53
Illinois	7,298,682	7.26	2.93	0.81	3.51
Indiana	3,473,591	7.98	3.36	0.88	3.75
Iowa	1,796,809	7.24	3.42	0.85	2.96
Kansas	1,479,791	7.61	3.60	0.86	3.15
Kentucky	2,292,066	11.39	3.50	1.05	6.84
Louisiana	2,616,035	9.56	3.20	0.92	5.44
Maine	700,315	9.75	3.74	1.04	4.96
Maryland	2,798,663	8.00	3.19	0.91	3.90
Massachusetts	3,710,159	7.29	2.94	0.75	3.61
Michigan	5,916,060	9.28	3.62	1.07	4.58
Minnesota	2,563,841	7.04	3.58	0.86	2.60
Mississippi	1,509,014	11.76	3.62	1.08	7.06
Missouri	3,069,087	9.13	3.54	0.97	4.62
Montana	497,946	8.14	3.82	1.08	3.24

Table 45. Work Disability and Labor Force Status of Non-Institutionalized Persons 16-64, by State: April 1980

State	Noninstitutionalized Persons 16-64				
	Total Number	Percent Reporting Work Disability			
		Total	In Labor Force	Not in Labor Force	
				Able to Work	Prevented from Working
Nebraska	968,836	7.01	3.50	0.79	2.73
Nevada	545,153	7.80	3.84	0.83	3.13
New Hampshire	591,095	7.51	3.41	0.78	3.31
New Jersey	4,765,766	6.86	2.56	0.70	3.60
New Mexico	820,401	8.17	3.00	0.94	4.23
New York	11,271,775	7.68	2.52	0.80	4.36
North Carolina	3,808,398	9.75	3.56	0.91	5.29
North Dakota	402,349	6.70	3.31	0.87	2.52
Ohio	6,891,633	8.80	3.35	0.90	4.56
Oklahoma	1,889,020	10.75	4.16	1.18	5.41
Oregon	1,686,245	9.85	4.57	1.27	4.01
Pennsylvania	7,589,547	8.47	2.92	0.90	4.65
Rhode Island	607,367	8.63	3.40	0.79	4.45
South Carolina	1,999,332	9.81	3.36	0.86	5.59
South Dakota	417,867	7.56	3.82	0.87	2.87
Tennessee	2,924,804	10.37	3.35	0.97	6.06
Texas	9,034,363	7.84	3.19	0.76	3.89
Utah	860,162	7.54	3.74	1.07	2.73
Vermont	325,524	8.51	3.50	0.87	4.15
Virginia	3,540,722	8.44	3.08	0.93	4.43
Washington	2,690,196	8.76	3.96	1.15	3.65
West Virginia	1,214,538	12.34	3.28	1.15	7.92
Wisconsin	2,948,090	6.76	3.07	0.77	2.93
Wyoming	301,618	6.14	3.24	0.74	2.16

Source: U.S. Bureau of the Census, 1980 Census of Population; prepared from data reported in Advance Estimates of Social, Economic, and Housing Characteristics, parts 1-51.

Note: The considerably expanded 1990 Census figures on disability should be available beginning in late 1992.

## APPENDIX

### OVERVIEW OF THE AMERICANS WITH DISABILITIES ACT OF 1990 JULY 26, 1990<sup>1</sup>

The purpose of the ADA is to provide a clear and comprehensive national mandate to end discrimination against individuals with disabilities and to bring persons with disabilities into the economic and social mainstream of American life; to provide enforceable standards addressing discrimination against individuals with disabilities, and to ensure that the federal government plays a central role in enforcing these standards on behalf of individuals with disabilities.

#### Definition of the term "disability."

The ADA defines "disability" to mean, with respect to an individual: a physical or mental impairment that substantially limits one or more of the major life activities of such individual, a record of such an impairment, or being regarded as having such an impairment. This is the same definition included in section 504 of the Rehabilitation Act of 1973, the Fair Housing Act Amendments, and the Air Carriers Access Act.

#### Employment

Title I of the ADA specifies that an employer, employment agency, labor organization, or joint labor-management committee may not discriminate against any qualified individual with a disability in regard to any term, condition or privilege of employment. The ADA incorporates many of the standards of discrimination set out in regulations implementing section 504 of the Rehabilitation Act of 1973, including the obligation to provide reasonable accommodations unless it would result in an undue hardship on the operation of the business.

The ADA incorporates by reference the enforcement provisions under title VII of the Civil Rights Act of 1964. Currently, remedies available under Title VII include injunctive relief and back pay.

Title I goes into effect two years after the date of enactment. For the first two years after the effective date, employers with 25 or more employees are covered. Thereafter, employers with 15 or more employees are covered.

#### Public services, including public transportation services provided by public entities.

Title II of the ADA specifies that no qualified individual with a disability may be discriminated against by a public entity, i.e., a state and local government or a department, agency, special purpose district or other instrumentality of a state or a local government, or by AMTRAK or a commuter rail authority.

In addition to a general prohibition against discrimination, Title II includes specific requirements applicable to public transit authority, commuter rail authorities, and AMTRAK.

With respect to public transportation provided by public transit authorities, all new fixed route buses must be made accessible unless a transit authority can demonstrate to the Secretary of Transportation that no lifts are available from qualified manufacturers, despite the fact that good faith efforts have been made to locate such lifts, and that a further delay in purchasing new buses would significantly impair transportation services in the

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<sup>1</sup> This summary was prepared by the Senate Subcommittee on Disability Policy, chaired by Senator Tom Harkin, (202) 224-6265.

community served. A public transit authority must also provide paratransit for those individuals who cannot otherwise use mainline accessible transportation (and to one person associated with an individual with a disability or additional persons associated with the individual with the disability if the additional persons do not displace other individuals with disabilities) up to the point where the provisions of such supplementary services would pose an undue financial burden on the transit authority.

With respect to AMTRAK, all new intercity vehicles must be readily accessible to and usable by individuals with disabilities. Special rules are included specifying the standards of accessibility for people using wheelchairs for each category of passenger car. With respect to new cars used by commuter rail authorities, such cars must be accessible. However, special rules are delineated explaining the meaning of "accessibility" for people who use wheelchairs.

New stations must be designed and constructed in an accessible manner. Key existing stations serving rapid rail and light rail systems must be made accessible as soon as practicable not in no more than 30 years where modifications are extraordinarily expensive (with two-thirds of the stations to be made accessible within 20 years). For key existing stations serving commuter rail, the time frame is 20 years as it is for all stations serving AMTRAK.

Title II incorporates by reference the enforcement provisions in section 505 of the Rehabilitation Act of 1973.

Title II takes effect 18 months after the date of enactment, with the exception of the obligation to ensure that new public buses are accessible, which takes effect for solicitations made 30 days after the date of enactment.

#### Public accommodations and services provided by private entities.

Title II of the ADA specifies that no individual shall be discriminated against on the basis of disability in the full and equal enjoyment of the goods, services, facilities, privileges, advantages, and accommodations by any person who owns, leases (or leases to), or operates a place of public accommodation. Public accommodations include: restaurants, hotels, doctor's offices, pharmacies, grocery stores, shopping centers, and other similar establishments.

Existing facilities must be made accessible if the changes are "readily achievable" i.e., easily accomplishable without much difficulty or expense. Auxiliary aids and services must be provided unless such provisions would fundamentally alter the nature of the program or cause an undue burden. New construction and major renovations must be designed and constructed to be readily accessible to and usable by people with disabilities. Elevators need not be installed if the building has less than three stories or has less than 3,000 square feet per floor except if the building is a shopping center, shopping mall, or offices for health care providers or if the Attorney General decides that other categories of buildings require the installation of elevators.

Title III also includes specific prohibitions on discrimination in public transportation services provided by private entities, including the failure to make new over-the-road buses accessible six years from the date of enactment for large providers and seven years for small providers. "Accessibility" will be defined in regulations issued by the Secretary of Transportation and reflect the results of a 3-year study conducted by the Office of Technology Assessment. Lifts are not necessarily required on all new buses.

Title III incorporates enforcement provisions in private actions comparable to the applicable enforcement provisions in Title II of the Civil Rights Act of 1964 (injunctive relief) and provides for pattern and practice cases by the Attorney General. The Attorney General may also seek monetary (not punitive) damages on behalf of an aggrieved individual and civil penalties.

The provisions of Title III become effective 18 months after the date of enactment. However, except for actions relating to the failure to make alterations and new construction readily accessible to and usable by individuals with disabilities, no civil action may be brought for any act or omission considered discriminatory

under the Act against businesses that employ 25 or fewer employees and have gross receipts of \$1,000,000 or less during the first six months after the effective date and no civil actions may be brought for any act or omission considered discriminatory under the Act against business that employ 10 or fewer employees and have gross receipts of \$500,000 or less during the first year after the effective date.

Telecommunication relay services.

Title IV of the ADA specifies that telephone services offered to the general public must include interstate and intrastate telecommunication relay services so that such services provide individuals who use non-voice terminal devices because of disabilities (such as deaf persons) with opportunities for communications that are equivalent to those provided to individuals able to use voice telephone services.

Miscellaneous provisions.

Title V of the ADA includes miscellaneous provisions, including coverage of Congress, a construction clause explaining the relationship between the provisions in the ADA and the provisions in other Federal and State laws; a construction clause explaining that the ADA does not disrupt the current nature of insurance underwriting; a prohibition against retaliation; a clear statement that States are not immune from actions in courts of competent jurisdiction for a violation of the ADA; a directive to the Architectural and Transportation Barriers Compliance Board to issue guidelines; and authority to award attorney's fees.