

## ***Income Protection for the Aged in the 21st Century: A Framework to Help Inform the Debate***

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It is becoming increasingly difficult worldwide for the aged to sustain a minimum level of income protection into retirement. Rapidly aging populations and lower fertility rates are creating serious fiscal strains on current social insurance systems. A report issued by the World Bank maintains that countries whose primary mechanism for providing old-age income protection is a publicly managed social insurance system will experience significant difficulties unless they make structural changes in their programs. Actuarial estimates indicate that benefit payments in the United States could in fact exceed income to the Old-Age and Survivors Insurance (OASI) Trust Fund by 2029 and a variety of proposals to address this problem are being advanced. We suggest a framework to evaluate such proposals based on a set of core values (fairness, adequacy, and efficiency) and analyze some of the proposed changes both in relation to how they have been employed in other countries and within the context of the framework. The purpose of this article is to inform and help structure a most important debate.

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## ***Introduction***

The advent of industrialization in Europe and the United States during the latter part of the 19th century brought with it mass migrations to urban centers and the decline of the family as the primary means of support for the aged. The first national contributory old-age insurance scheme was established in Germany in 1889 and, by the turn of the century, many European countries were debating whether to establish broadly based contributory old-age insurance or narrower means-tested noncontributory plans. Over the next few decades, most countries opted for partially funded national contributory plans with the modest goal of providing the aged with a bare level of subsistence. The sharp growth in real income during the years following World War II led many countries to legislate substantial increases in the amounts of old-age pensions.

It was not until 1935 that the United States introduced a formal national income protection program for the aged. Prior to the Great Depression of 1929, there was a growing market for private retirement annuities in the United States and no public mandate existed for the establishment of the type of government sponsored social security system that had been set up in many European countries. However, the numerous bank failures and widespread loss of private savings that occurred during the Great Depression led to greater political acceptance of the idea of a government sponsored program. After much debate, a government administered, contributory social insurance system, financed on a pay-as-you-go (PAYG) basis, was created.

The system was designed to permit the initiation of benefit payments at the earliest possible date. Since it allowed for payment of benefits to retirees funded either partially or entirely from the contributions of current workers, PAYG financing provided the means to start paying benefits in only a few years after the system was created. Nevertheless, it was an earnings-based system and work incentives were included from the very beginning. The more a worker contributed to the system, the larger his or her benefit would be. As with the programs in many European countries, benefits have become more generous over the years.

The task of providing adequate income protection for the aged, however, is becoming increasingly difficult not only in the United States and Europe, but throughout the world. The aged (age 60 or older) population worldwide will grow from half a billion in 1990 to 1.5 billion in 2050.<sup>1</sup> Due to advances in medical knowledge and changes in lifestyles, most of the growth will occur in developing countries. Nevertheless, the proportion of the population that is aged will continue to be highest in the more economically developed countries that are part of the Organization for Economic Cooperation and Development (OECD).<sup>2</sup> The proportion of the U.S. population older than age 60, which was about 17 percent in 1990, is expected to reach 28 percent by 2030.<sup>3</sup> The problem of supporting such a large number of aged under a PAYG system is made more acute by low fertility rates and a growing proportion of workers who elect to retire early.

This article evaluates the options available for dealing with the problems facing the Social Security system in the United States. The first section discusses a set of core values that we believe are embodied in the Social Security system and against which policy options may be measured. In the second section, the various mechanisms used to provide old-age income protection throughout the world are described, and the advantages and disadvantages of each are discussed. The different strategies that have been proposed for reforming the U.S. system are presented in the third section, and the fourth section examines the relationship between Social Security and economic growth. The final section includes an analysis of each of the proposed changes. The experiences of other countries in using different mechanisms are considered in this analysis, and the proposed changes are evaluated in relation to the core values.

## *I. Core Values*

In a democratic society, the establishment and continuance of any social program depends on its ability both to win and to maintain a sufficient level of public support. When the program involves a substantial cost, ongoing political support requires some public recognition that it not only performs an essential function, but also that it is based on sound economic principles, designed so as to achieve its intended purpose, and consistent with social values that are widely accepted. The needs, values, and goals of a society change over time, and government policies and programs change accordingly. In an effort to deal with the growth of the aged population, many governments have in recent years implemented major changes in their social security systems. Others, including the United States, face difficult choices if they wish to maintain the long term viability of their programs. We believe that the process of making these choices will be more informed if a framework can be established that allows for the evaluation of policy options based on a set of core values that are essential in maintaining the integrity and effectiveness of the system.

Below is a discussion of a set of values—fairness, adequacy, and efficiency—that could be included in such a framework. There is, of course, no definitive set of principles that must be used for this purpose. Other authors have put forward similar recom-

mendations, and what follows is an effort on our part both to build upon previous suggestions and to set forth those principles that we consider to be essential. We encourage others to critique this framework and improve upon it, in the interest of furthering a serious and informed discussion that will enable us to continue to protect the economic security of the aged.

### *Fairness*

Perhaps the most fundamental requirement of any social policy is that it be consistent with the concepts of justice and fairness as they are understood by the general population. Since the provision of social justice is a moral issue, we will begin the discussion of fairness with an examination of the influence of ethics in the formulation of public policy throughout history.

In his paper, "Ethics and Politics: The American Way," Martin Diamond writes, "ethics and politics always and everywhere form a particular relationship, a distinctive way in which each people organizes its humanness."<sup>4</sup> This relationship has existed since ancient times; among the greatest works of Aristotle are *Ethics* and *Politics*. A more recent example of an effort to establish an ethical foundation for government policy can be found in the wording of the Declaration of Independence and the U.S. Constitution, and in the principles they embody. James Madison believed that factionalism based on property inequality had destroyed earlier popular governments, and he wanted to replace the struggle over the distribution of property with a social and economic structure that encouraged a multiplicity of interests that would surmount the politics of class struggle.<sup>5</sup>

The observations of Alexis de Tocqueville about American society during the first half of the 19th century are consistent with Madison's vision. De Tocqueville concluded that America's acquisitive commercial culture, which allowed self-interest to flourish, had led to the universal acceptance of what he termed the "principle of self-interest properly understood." Acceptance of this principle, he observed, had led Americans not only to help each other in their private capacities, but made them willing to give a portion of their time and wealth for the good of the State.<sup>6</sup> Self-interest, in this context, is seen as a healthy balance between the pursuit of individual gain and a personal commitment to the community at large. This balance does not see the individual and the community at odds, but rather as a merged reality.

This spirit was in evidence during the 1930's when the United States adopted a social insurance system that had as one of its primary goals the reduction of poverty among the elderly. The architects of the system believed, however, that the goal of poverty reduction was to some extent in conflict with that of individual equity (that is, the provision of insurance protection based on premiums paid). In an effort to resolve this apparent conflict, they adopted a progressive benefit formula that provides protection related to the level of earnings, but which also reduces income inequality by providing middle-income and lower income workers with a better return on their contributions.<sup>7</sup>

There have been many inquiries into the relationship between ethics and public policy, and the implications of this relationship in terms of the provision of social justice. While it is not the pur-

pose of this article to examine this issue in depth, we believe it would be useful to discuss some prominent theories of social justice and what they suggest about the responsibility of the larger society to provide for the aged poor.

Utilitarianism is a tradition of ethics developed during the 18th and 19th centuries primarily by British philosophers and economists Jeremy Bentham and John Stuart Mill. Its central principle is that a society is properly ordered, and therefore just, when it is arranged so as to provide the highest level of satisfaction to the greatest number of people. This principle, it has been argued, fails to give adequate consideration to the rights of the individual, and it has been interpreted as advocating the imposition of disadvantages on a few to maximize the advantages enjoyed by a greater number of people. If this interpretation is applied to the provision of income protection to the aged, it would mean that the aged poor could be disadvantaged if it would serve the interests of the larger society.

A concept of social justice that stands in marked contrast to utilitarianism was put forward by John Rawls in *A Theory of Justice*. In Rawls' view, a just society must have a set of principles that provide a way of assigning rights and duties within its basic institutions, and which define both the appropriate distribution of benefits and the burdens of social cooperation. He believes that if there is any conflict "between the claims of liberty and right on the one hand and the desirability of increasing aggregate social welfare on the other," then common sense dictates that priority be given to the former. "Justice," he writes, "denies that the loss of freedom for some is made right by the greater good shared by others."<sup>8</sup>

Rawls believes that if people had to choose principles of justice from behind a "veil of ignorance" that restricted their knowledge of how they would be affected personally, that they would choose to safeguard themselves against the worst possible outcome. He describes this situation as one in which "no one knows his place in society, his class position or social status, nor does anyone know his fortune in the distribution of natural assets and abilities, his intelligence, his strength, and the like."<sup>9</sup> Those placed in this hypothetical position would be free to make rational and disinterested choices regarding the principles of social justice. Rawls thinks that they would not choose to maximize overall utility, but instead would insist on the maximum amount of liberty compatible with like liberty for others and social protection for the least affluent members of society.

According to Rawls, inequalities in the distribution of primary social goods are just "only if they result in compensating benefits for everyone, and in particular for the least advantaged members of society."<sup>10</sup> Thus, while Rawls seeks to maximize the welfare of the poorest members of society, he does not insist on an equal distribution of wealth. He believes that incentives are necessary to increase the aggregate wealth of a society, and that they have the potential to produce benefits that flow to all from the labors of the most productive and talented. Inequality may be considered just only to the extent that it increases benefits to all segments of society.

Rawls insistence on the priority of individual liberty and

equality seems consistent not only with "the principle of self-interest properly understood," but also with the values embodied in the laws and customs of the United States, and those in which most Americans believe. Justice has been for the vast majority of Americans an overriding principle against which public policy decisions have been measured.

The word "fairness" is used throughout this article, primarily as a reference point for evaluating policy options. The reader should keep in mind that the word, as it is used here, is identical to the concept of "justice as fairness"—that an effort should be made to maximize freedom and opportunity for each individual within society, and to provide in some common way for its least advantaged members. We are aware that efforts to improve the economic circumstances of the least advantaged have sometimes been characterized as encouraging dependency, and that such efforts should be undertaken with great caution in order to avoid the creation of work disincentives. Sociologist Philip Selznick has noted that the policies advocated by Rawls have been criticized as "overly individualistic and ahistorical; insufficiently sensitive to the social sources of selfhood and obligation; too much concerned with rights, too little concerned with duty and responsibility." He suggests that in our search for justice and democracy we must strike the proper balance between human interdependence and the need for solidarity on the one hand, and the necessity of maintaining personal and group autonomy on the other.<sup>11</sup> As we contemplate changes in the Social Security system, we must not forget the importance of maintaining such a balance, so that the program retains a clear sense of justice and fairness.

### *Adequacy*

As noted earlier, formal old-age income protection programs were originally created due to social, demographic, and economic changes that brought about the breakdown of informal systems of family and local community support. The initial intent of these programs was the alleviation of poverty in old age, but in most OECD countries they evolved into income protection programs with the objective of replacing a significant proportion of pre-retirement income. Another principle we could use to evaluate policy options is their adequacy. We could look at the adequacy of these options from two perspectives: the extent to which they would provide the aged poor with a benefit that meets or exceeds bare subsistence, and the degree of income replacement they would provide for retirees at different income levels.

In the United States, Social Security has been instrumental in bringing about a significant reduction in poverty among the aged. Although the aged poverty rate continues to be higher than in many European countries, it has remained for several years below the poverty rate for the population as a whole. Additionally, Social Security contributions have over the years provided retirees with favorable rates of return in comparison to alternative investments.<sup>12</sup> However, the rate of income replacement may not be considered adequate by many middle-income and upper income workers. The policy changes that have been proposed could affect the adequacy of benefit payments in different ways. To properly

evaluate these proposals, policymakers must decide what the objectives of the Social Security program should be in the years to come. In any event, the adequacy of benefits is an important factor for consideration of any policy change.

### *Efficiency*

Efficiency is another principle we could use to evaluate policy options. In defining this principle, we decided to include two aspects of a program's effectiveness in accomplishing its purpose with a minimum of expenditure—administrative and economic. These two forms of efficiency are sometimes treated as separate entities. For purposes of this article, however, we decided to consider them as related issues since both involve the ability to pay the highest possible benefit to retirees with minimum cost both to the insured and to the Nation as a whole.

Some pension schemes require higher administrative costs than others, and excessive administrative costs reduce the funds available to pay benefits. For example, operating costs of the Chilean system in 1990 totaled 15.4 percent of annual contributions; the comparative rate for the United States was 0.7 percent.<sup>13</sup> Administrative costs are generally higher in developing countries that lack sophisticated equipment and a highly educated labor force. However, there is an important relationship between the structure of a retirement scheme and the amount of operating costs.

The level of economic efficiency can be measured by how well a society makes use of its limited resources. Most economists believe that public policies that distort the choices made by economic units (that is, producers and consumers) generally create inefficiencies. Government intervention may be justified, however, when the actions of individuals in the private market fail to achieve the desired social outcomes. The economic efficiency of a social security program may be judged by the degree to which it produces the desired outcome—an adequate level of social protection—while contributing to the best possible, and least wasteful, functioning of the overall economy. For example, a program that encouraged workers to retire before their productive capacities had begun to decline would be inefficient to the extent that it would increase the rate of dependency unnecessarily.

Defined benefit, PAYG public pension programs have been criticized for their alleged failure to promote economic growth through national saving. Whether or not the stimulation of growth in the economy should be a function of the social security system is open to debate. However, critics of this type of arrangement have suggested that it actually impedes economic growth, produces labor-market distortions, and creates perverse income transfers. Thus, the manner in which the social security system is funded and its potential effect on the overall economy are issues of consequence. We address them later in this article.

## *II. Mechanisms for Providing Old-Age Security*

Numerous mechanisms are used throughout the world to provide old-age income security. The social insurance model is the most common, particularly in OECD countries, but it is by no means universal. Some countries employ a combination of dif-

ferent mechanisms. Also, there are numerous options in regard to the design of each mechanism. These include the following:

- *Extent of coverage.*—The mechanism may cover all residents or be limited to all employed persons, persons in certain industries, or to civil servants.
- *Source of funds.*—Funding may be provided by contributions from the individual, the employer, the government, or from a combination of these sources.
- *Type of funding.*—The mechanism may be fully funded, partially funded, or funded entirely on a PAYG basis.
- *Type of benefit.*—The mechanism may pay a defined benefit or it may pay a benefit based on defined contributions. Defined contribution schemes usually allow the individual to choose between a pension and an annuity.
- *Form of administration.*—Administration may be provided by the government or through private entities. When privately administered, options also exist with regard to the extent of government regulation.

All of the mechanisms used to provide old-age income protection require the sacrifice of some objectives in order to achieve others, and deciding which options are most desirable depends on the values and goals of each country. To understand better what options are available, we will describe briefly the most common forms of old-age protection and discuss the advantages and disadvantages of each.

### *Social Insurance*

The basic objectives of social insurance are to provide a partial replacement for income lost due to a worker's retirement, disability, or death, and to protect contributors against destitution<sup>14</sup> by pooling the risk of lost income among all individuals covered under the program. Typically, participation is mandatory for all, or most, workers. The average participation rate for OECD countries, most of which have social insurance programs, is about 94 percent. In the United States, it is over 96 percent.<sup>15</sup> Most social insurance programs are funded through a combination of employee and employer contributions. Some are partially subsidized by general revenues. The Swedish earnings-related pension was for many years unique among social insurance programs in OECD countries, in that it was funded entirely through employer contributions. However, the system currently is being revamped to require both employee contributions and government subsidies.

Benefit entitlement is based on attainment of a specified age and payment of contributions for a specified number of years. The minimum number of years of coverage required for a pension varies greatly. Sweden, for example, requires only 3 years of coverage, while Japan requires 25 years. Most countries, however, require at least 30 years of contributions for a full pension. Most systems also have early retirement provisions, which provide a pension in a reduced amount.

A defined benefit formula is used to calculate pension amounts which, aside from any adjustment for early retirement, are related

to the level of earnings that the worker had throughout his or her working life. In many countries, however, some provision is made for low-income workers since they have less of a margin for reduction in income and less opportunity to supplement social security benefits with private savings and investment or other pension income. In the United States, the rate at which preretirement earnings were replaced by Social Security for workers who attained retirement age in 1995 ranged from 25.6 percent for workers with maximum earnings to 57.1 percent for those with low earnings.<sup>16</sup>

In some countries, social insurance systems are partially funded, and reserves have been allowed to accumulate in preparation for future liabilities. Others, however, rely entirely on PAYG financing supplemented by general revenues.

Social insurance provides a collective mechanism that reduces the individual risks involved in retirement planning by spreading them over a large segment of the population. It has the unique ability to provide a measure of social protection to all groups, including those that have had low lifetime earnings, and to generate broad public support under the right demographic and economic circumstances. It also protects individuals against their own myopia by forcing those who would not otherwise make provision for their retirement to do so.

On the other hand, critics of social insurance programs claim that they deprive individuals of freedom of choice in retirement planning, discourage private saving, and motivate people who are still productive to retire, thereby reducing national productivity and increasing consumption. Additionally, they maintain that PAYG financing entails a large intergenerational transfer to the founding generation from future generations. Succeeding generations, therefore, are shortchanged, and this transfer frequently has a perverse effect (that is, assets are transferred from lower income workers to upper income retirees in the founding generation). Each of these issues will be addressed later in this article.

Social insurance systems, as they now operate, are generally consistent with the concept of fairness. The benefit calculation is linked to the amount contributed, but it is modified so as to provide the least advantaged among the aged population with an adequate level of support. In terms of adequacy, therefore, these programs have been highly successful in reducing poverty, but provide middle-income and upper income workers with lower levels of wage replacement. Available data indicate that social insurance systems in developed countries are highly efficient from an administrative perspective, but questions have been raised regarding their economic efficiency. Whether or not the inadequacies that have existed in social insurance programs can be corrected through reform will be discussed below.

### ***Means-Tested Programs***

Means-tested programs are based on financial need and are usually funded through general revenues. The intent of these programs is to alleviate poverty rather than provide income replacement to a broad spectrum of the population. The primary advantage of means testing is that it minimizes the cost of poverty reduction by limiting eligibility to those most in need. The admin-

istrative costs of determining eligibility, however, are high and beneficiaries are often stigmatized. Since the objective generally is for eligibility to be limited to a small number, these programs do not usually enjoy broad public support and become vulnerable during periods of budgetary constraint, a situation that is expected to continue indefinitely in many countries. Eligibility requirements, however, can be set so as to provide benefits to a larger segment of the population.

The Age Pension program in Australia is an example of the use of a means-tested program as the principal mechanism for providing income protection to the aged. Australia is one of the few OECD countries that does not have a publicly administered social insurance program that is related to employment. Eligibility for an old-age pension in Australia is based on attainment of retirement age, a specified period of residency, and financial need. The means test is broad and most retirees receive a public pension that equals about one-fourth of the national average wage. This feature tends to mitigate the absence of public support that often characterizes means-tested programs, but the system is not without its problems.

The Australian program has been criticized as overly complex, inconsistent, unfair, and inefficient.<sup>17</sup> A variety of financial institutions and advisers are available to help pensioners exploit the weaknesses and ambiguities of the system, which contributes to the high rate of participation (over 70 percent of the aged population). Also, there have been problems related to the interaction of public and private pensions, and there is concern about the growing dependency ratio. An increase in the retirement age for women, from 60 to 65, has been proposed.

In addition, the government of Australia has sought for many years to put in place a more comprehensive retirement income policy. Towards that end, it has legislated a series of tax incentives aimed at the promotion of increased access to private pensions and greater self-sufficiency in the form of private saving. In 1992, it introduced a mandatory element into the private pension system by requiring employers to contribute 4 percent of payroll, with graduated increases over several years to a total of 9 percent, on behalf of all their workers. The government now regards its program of providing retirement income as a three-level system, and it is basing its retirement policy on the expectation that the second and third tiers—private pensions and savings—will expand rapidly. This expectation will need to be carefully evaluated. The proportion of the aged population that is receiving a public means-tested pension declined from 86 percent in 1980 to 77 percent in 1992, and the government has based the success of its retirement policy on estimates that the decline will continue to about 20 percent of the aged population by the year 2031.<sup>18</sup>

Means-tested programs generally provide a minimum level of subsistence, but little more. Thus, they are adequate for purposes of poverty reduction, but do not provide workers with an adequate level of income replacement. They do not conform to the principles of justice and fairness because they do not give workers the opportunity to participate in a collective system of social protection through individual contributions and, consequently, benefits ordinarily are limited to bare subsistence. A means-tested program that covers a large proportion of retirees, of course, defeats

the purpose of targeting scarce funds and reduces considerably the incentive to work and save. Means testing has high per-person administrative costs but overall program costs may be lowered by restricting benefit payments to the most needy.

### ***Universal Programs***

Universal pension programs are similar to means-tested programs in that they are funded through general revenues, provide a flat benefit, and base eligibility on age and residency rather than employment. Unlike the means-tested programs, however, income and/or assets are not factors in determining eligibility. In some countries, such as New Zealand, the universal pension is the only public pension. In others, such as Canada and Sweden, it is combined with an earnings-related pension.

Since most retired persons are eligible for a universal pension, it is instrumental in reducing poverty among the aged. It does not stigmatize beneficiaries, it minimizes administrative costs, and it generally receives broad public support. However, it is more costly overall than a means-tested pension because it provides the same payment to the affluent as to the needy. It is economically efficient in that it avoids disincentives to work and save, but it distributes limited resources in an inefficient manner. Also, while a universal pension provides a basic level of subsistence for the aged, it does not provide for income protection unless it is combined with other mechanisms.

The extent to which universal pension programs meet the requirements of adequacy and equity depends on the amount of benefits and other mechanisms available. Since universal pension programs are intended to alleviate poverty, benefit amounts are generally little more than the minimum required for that purpose. However, lenient qualifying conditions for other benefits may enable even the least advantaged to receive an adequate pension. For example, Canada's earnings-related pension requires only 1 year of contributions and the Swedish program requires only 3 years. Both systems, however, require many years of contributions to qualify for a full pension.

### ***Private Pensions***

Employer-sponsored private pensions became common during the latter half of the 19th century as a means of retaining highly skilled workers and easing older, less productive workers into retirement. Private pension plans have continued to proliferate, and many OECD countries have tried to ease the burden on government-administered programs by mandating the creation of private programs. Slightly more than half of retired workers in the United States have some type of private pension, and the proportion of retirement benefits received from private sources grew from 13 percent to more than 19 percent between 1976 and 1992.<sup>19</sup>

Employers usually provide the funding for private pensions, which can be either defined benefit or defined contribution programs.<sup>20</sup> Although these plans are administered by employers, they are strictly regulated by the government in most OECD countries. Nevertheless, private pensions are frequently underfunded<sup>21</sup> and, historically, have had restrictive vesting periods and little

provision for portability. Since lower income workers typically have a less stable employment history, eligibility is generally limited to middle income and upper income workers. Additionally, private pensions sometimes involve regressive tax expenditures, since employers may be offered tax incentives for establishing pension plans, and they generally do not provide protection against inflation.

There is a growing trend in the United States for more affluent workers to receive a greater proportion of retirement income from private sources, while middle- and lower income workers remain highly dependent on the Government-administered Social Security program. Data from the U.S. Current Population Survey show that, in 1994, the poorest 20 percent of the aged population received 81 percent of retirement income from Social Security and less than 3 percent from pensions and annuities. By contrast, the most affluent 20 percent received only 23 percent of income from Social Security, and about 21 percent from pensions or annuities (chart 1). Between 1976 and 1994, the proportion of retirement income received by this group from pensions, annuities, and assets increased from 41 percent to 45 percent.<sup>22</sup>

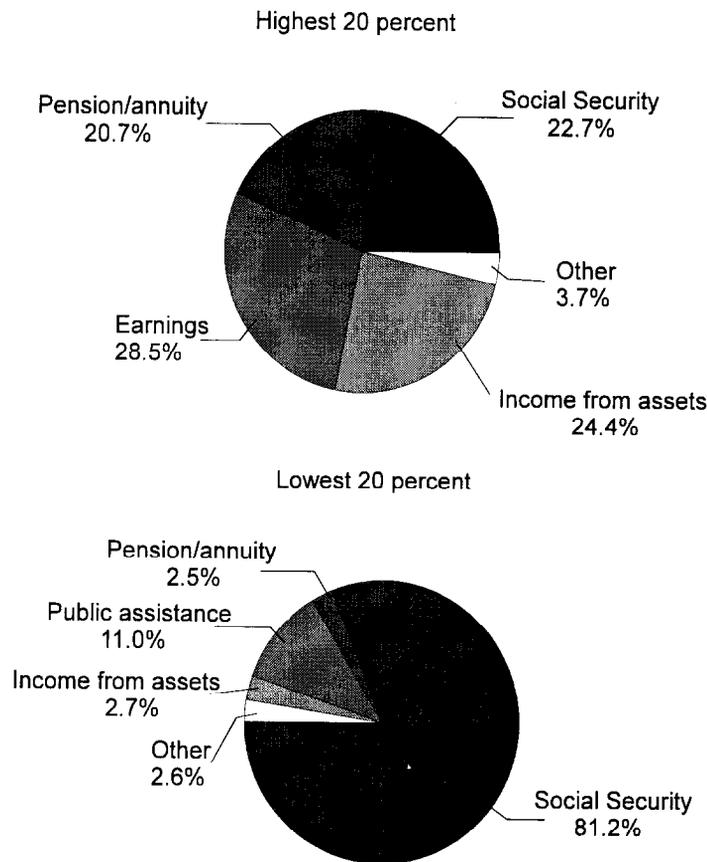
Historical evidence indicates that the design of private pension plans frequently is partly a function of the needs of the employers who offer them. Many employers have used their pension plans as a means of retaining valued employees and facilitating the departure of less productive workers. Some have manipulated the pension plan funding process to increase their profitability. Also, these plans often leave the most economically vulnerable workers uncovered.<sup>23</sup> Administrative costs are generally high, due to the need for adherence to government regulation, and these plans often influence the overall distribution of retirement income in an inefficient and inequitable way. Private pensions help many upper income and middle-income workers to replace more of their income when they retire, but they do not meet high standards of fairness and adequacy in that workers at the lower end of the economic spectrum are generally nonparticipants.

### ***Private Savings***

Some countries, such as the United States and Canada, have for many years provided tax incentives to the self-employed—who did not have access to private pension plans—to establish savings plans for retirement purposes. The United States has more recently extended these programs to include civil servants and some wage earners in the private sector. Voluntary savings plans are fully funded defined contribution schemes that are used predominantly by middle-income and higher income workers.<sup>24</sup>

Mandatory private savings plans have been established primarily in African, Asian, and Caribbean countries, but in recent years some Latin American countries have begun experimenting with this mechanism. The earlier plans were publicly managed national provident funds. Many were compulsory monopolies with little incentive to operate efficiently and vulnerable to political pressure to invest unproductively. These circumstances, combined with economic instability, inflation, and currency devaluation, produced in many of the African and Caribbean countries large negative rates of return and much dissatisfaction with the funds. The newer plans are decentralized and privately operated

Chart 1.—Shares of aggregate income for the highest 20 percent and the lowest 20 percent of the income distribution among the aged population



Source: U.S. Current Population Survey (1994)

under government supervision. They face market pressures to operate efficiently and are more insulated from political pressures to misallocate capital.<sup>25</sup>

Like voluntary plans, mandatory savings schemes are fully funded and have defined contributions. The amount of the pension provided by such schemes is based on the contribution rate, the rate of growth of earnings, the interest rate, and the number of years of contribution. Since there is a direct link between contributions and benefits, these plans avoid issues involving both intergenerational and intragenerational redistributions within the plans themselves. However, they may create a need for separate, publicly administered retirement systems to provide a base level of income for workers with low lifetime earnings.

There are no OECD countries with mandatory savings schemes. The first country, and until 1994 the only country, to fully replace an existing public PAYG system with a mandatory savings program was Chile. The Chilean experiment should be examined closely, not only because it is unique, but because some critics of the current PAYG system in the United States advocate that it be replaced entirely with a program similar to that of Chile.<sup>26</sup>

The social security program instituted by Chile in 1924 had many weaknesses, which created a large deficit over time. For

example, the program was subdivided by occupation into more than 30 systems, and those groups with the greatest economic and political power had the most generous benefit provisions. By 1980, about 28 percent of benefit payments came from government subsidies, and it was estimated that this percentage would rise rapidly in future years.<sup>27</sup> The government decided to institute a radical reform, and replaced the public sector PAYG system with a mandatory system of investment in private sector funds. Under the revised scheme, each worker must contribute 10 percent of his or her wages to one of a number of private sector pension funds. A separate account is established for each worker, and the fund, after deducting its commission, invests the remainder. Contributions and returns accumulate in the worker's account and, at retirement, the accumulated funds may be used to provide monthly payments from the account based on the life expectancy of the worker, to purchase an indexed annuity from a private insurance company, or to do both of these two options.

One reason for the widespread attention that the Chilean system has attracted is that it has produced very high real rates of return for its contributors. Between 1981 and 1990, the real rate of return averaged 12.6 percent annually.<sup>28</sup> This was due largely to the rate of growth in the Chilean economy overall. Chile experienced an economic collapse in 1982 and

instituted major economic reforms. It now has one of the strongest economies in the Western hemisphere and its leaders predict continued economic growth of 6.5 percent.<sup>29</sup>

There are, however, a number of disadvantages to the new Chilean system. One problem is that the administrative costs, as noted above, are very high. This is partially due to the lack of economies of scale. A single compulsory system without choice, such as that in the United States, can be managed more efficiently than a system in which contributions are split among various private funds and may be moved among funds frequently. Another reason is the cost of competition among the various funds. Although administrative costs have declined since the 1980's, this system by its very nature will continue to be more costly than publicly administered social insurance programs.

Additionally, there are concerns about the level of benefits that will be paid. In a defined contribution system, the contributor must assume the risks. The amount of the contributor's pension will, to a large extent, be determined by factors beyond his control, such as inflation, interest rates, and so forth. There is no guarantee that the Chilean economy will continue to grow as it has over the past decade. Advocates of the system expect the replacement rate to reach 70 percent of final salary, but this will require a 6-percent real rate of return over one's total work years. Critics of the sys-

tem believe that a long-term rate of return of about 3 percent is more likely. This would result in a replacement rate of 44 percent of final salary.<sup>30</sup> For the latest year, 1995, the private sector pension funds reported for the first time in their history negative real returns of 2.5 percent.<sup>31</sup>

Many advocates of the Chilean model also tend to ignore the extent of government involvement in this "privatized" system. Although the contributions are managed by private sector pension fund administrators, the government plays an active role through detailed regulation of their operations and by providing guarantees and subsidies. Closely regulating the system serves to protect workers against poor investment performance, and the government provides a guaranteed level of profitability. The government also has generously subsidized the transition from the previous system to the new one, and has provided a guaranteed minimum pension, funded through general revenues, for workers with a reasonable history of contributions, as well as a public assistance pension for those who are destitute. The ongoing level of government subsidy for the minimum pension and the means-tested benefit is at this point unknown.

The pension guarantee does provide some work incentive, since a certain degree of work attachment is required to obtain a minimum level of retirement income, but it could motivate some workers to detach themselves from the labor force once they have met the minimum requirements. Of course, private savings plans in general encourage greater work effort as a means of maximizing savings and income in retirement.

Mandatory savings programs tend to have high administrative costs, particularly when they are decentralized, but they promote increased private savings. They can provide adequate to generous pensions for middle- and upper income workers, but they generally do not make adequate provision for workers with low lifetime earnings. Under the Chilean system, the guaranteed minimum pension pays only 22 percent of the average monthly wage, and the public assistance pension pays only 12 percent.<sup>32</sup> The failure of these programs to provide adequately for the aged poor could be viewed as inconsistent with one of the fundamental purposes of social security and with the principle of fairness. It also raises serious questions with respect to the level of general support that they can establish among individuals with different levels of lifetime earnings.

### *Multilevel Systems*

Some countries have made an effort to counteract the disadvantages of relying on any one mechanism by establishing multilevel systems that address different needs. The Australian government, as noted above, has mandated a private pension system and introduced tax incentives for private saving to complement its means-tested public pension system. The Swedish and Canadian systems include a universal pension to alleviate poverty as well as an earnings-related pension for wage replacement. The universal pension in Canada is funded through general revenues, while in Sweden the cost is shared by the government, the employer, and the insured person. Both the United States and France have, in addition to earnings-related social insurance programs, means-

tested allowances to provide a basic level of subsistence to the aged poor. Additionally, the United States provides tax incentives to encourage the establishment of private pensions and individual retirement accounts (IRAs). The U.K. pension program has over the years evolved into a highly complex system that employs several components. It constitutes an interesting example in the use of diverse strategies in an attempt to satisfy the needs of all retirees during a period of severe resource shortages.

The U.K. system includes a contributory social insurance component and a noncontributory means-tested component. The contributory component has two tiers, one that pays a flat-rate benefit and another that pays an earnings-related benefit. The first tier benefit currently amounts to about 18 percent of the average national wage. The second tier currently pays 25 percent of average covered earnings for the highest 20 years, but is subject to a phased-in reduction for those reaching pensionable age beginning in April 1999. Both tiers are financed from employer and employee contributions. The noncontributory component is available to low-income residents and consists of both cash and in-kind benefits.

For a number of years, the government has been encouraging a reduction in the scope of the contributory components and an expansion of private pensions and personal savings plans. Employers are free to substitute a private pension plan for the second tier of the contributory component, and individuals can opt out of either the private or public plan by starting a personal pension scheme. As of 1991, 51 percent of workers were members of a private pension plan and 28 percent had personal savings plans. The value of both tiers of the contributory component is expected to decline gradually, and government analysts expect that the public contributory component will become an insignificant part of the old-age pension system within 4 decades.

The strategy of the United Kingdom in dealing with the problem of providing old-age protection appears to be the maintenance of the poverty prevention function in the public sector and a gradual shift of the wage replacement function to the private sector. However, as middle- and upper income workers withdraw from the public system, there may be little political incentive to maintain an adequate level of support for the aged poor. Thus, pensions for some workers will replace a higher percentage of earnings, but workers with lower earnings could be left dependent on means-tested programs with little public support.

The extent to which multilevel systems have measured up to the core values of fairness, adequacy, and efficiency has depended on the mechanisms included. However, the general intent of these programs has been to provide a balanced approach to old-age income protection and to meet a variety of competing objectives.

### *III. Strategies For Reform*

Many countries have been compelled to make changes in their old-age income protection programs in an effort to meet the demands of a growing number of aged in the population coupled with a decline in the number of workers to support them. The United States enacted major reforms in 1977 and 1983, but current

actuarial estimates indicate that benefit payments could exceed income to the retirement trust fund by the year 2019, and the trust fund surplus could be depleted by 2029, at which point outgoing payments would be partially underfunded.

Reactions to these projections are varied. Actuarial estimates are based on a set of assumptions about future economic trends, and any alteration in those assumptions can change the estimates significantly. One view is that there is no way to estimate trends over a 75-year period with any degree of reliability, and that the most recent projections, in any case, may be based on erroneous assumptions. For example, according to this view the current estimate assumes a 1-percent annual growth in real wages over the next 75 years, even though real wage growth was about 1.7 percent annually over the past 75 years. The assumption is influenced by an actual decline in real wages over the past 2 decades, but this trend could reverse itself.<sup>33</sup> Some economists believe that the current boom in information technology will result in higher productivity and increased real wage growth, which would keep the trust fund solvent much longer than current estimates suggest.

Long-range estimates of actuarial balance have been mandated by the Congress to ensure that the income of the Social Security system will be sufficient to cover its expenditures. The long-range actuarial analysis covers a 75-year period, since it would generally be long enough to cover the anticipated retirement years of those currently in the work force. We do not share the view that long-range estimates can be ignored. At the very least, some program adjustments will be needed to increase income to the trust fund and reduce the amount being paid out. Some experts maintain that the problem is so great that it cannot be corrected through adjustments, and that structural changes in the program are necessary.

Several reform proposals have been advanced, all of which include some combination of the following recommendations:

- Revise benefit computation formulas to reduce benefits.
- Accelerate the scheduled increase in the normal retirement age (NRA), or increase it further.
- Expand coverage to State and local employees.
- Increase the payroll tax.
- Reduce cost-of-living adjustments (COLAs) or modify the consumer price index (CPI) on which COLA increases are based.
- Increase benefit taxation, or reallocate revenue from benefit taxation.
- Begin investing a portion of trust fund assets in corporate stocks and bonds.
- Allow workers to partially opt out of the payroll tax in favor of a personal investment plan (PIP), or build a small PIP on top of the current social insurance system.

A more radical reform has been proposed by the World Bank. In its policy research report, *Averting the Old Age Crisis*, the

World Bank addressed the problem of rapid growth in the aged population combined with declining birth rates worldwide. It concluded that it is not possible for a mature, publicly administered social insurance system in a country with an aging population to maintain an adequate level of support for low-income workers and, at the same time, provide a reasonable degree of wage replacement to higher income workers without a contribution rate that is unacceptably high. The report suggests that workers who rely on a single mechanism to provide for their retirement, whether public or private, may be in serious trouble if that mechanism fails to deliver on its promises. Thus, it recommends that all countries adopt a multipillar approach.<sup>34</sup>

The basic blueprint recommended by the World Bank includes three pillars, two of which would be mandatory. These pillars would include the following features:

- The first mandatory pillar would be a publicly administered, tax financed, PAYG program that would provide either a means-tested or universal benefit, or a minimum pension guarantee. It would have the limited objective of alleviating poverty among the aged, and it would pay a modest benefit.
- The second mandatory pillar would be a fully funded, privately administered program that could take the form of either a private pension or personal savings plan. It would have to be closely regulated by the government.
- The third pillar would be a voluntary personal savings plan for those workers who want more income in retirement than the mandatory pillars would provide.

The World Bank maintains that such a system would provide protection against poverty in old age and enable workers to replace a high proportion of their income in retirement, while avoiding unintended intergenerational or intragenerational income redistributions. However, since the public pillar would have the limited objective of alleviating poverty and the mandatory savings pillar would not be progressive, it is questionable whether lower income workers would receive benefits consistent with the concept of fairness. Additionally, the World Bank claims that the proposed system would be understandable to the average worker, be sustainable on a long-term basis, and, most importantly, promote economic growth.

#### ***IV. Social Security and Economic Growth***

Critics of publicly administered, PAYG social insurance programs believe that this financing mechanism not only fails to promote economic growth but actually impedes it.<sup>35</sup> They argue that PAYG financing induces workers to consume rather than save for retirement in the belief that the government will provide them with an adequate pension. The economy is thus deprived of savings needed for investment and growth. Critics in the United States point to the Nation's relatively low rate of saving by comparison with other developed countries, such as Germany and Japan. Senators Bob Kerrey and Alan Simpson claim that their proposal to allow workers to divert a portion of their Social

Security contributions into a personal savings account would increase private savings by almost \$1 trillion over 10 years.<sup>36</sup> Let us discuss first what constitutes national savings; second, whether there is a connection between Social Security financing and the rate of saving in the United States; and, finally, the general proposition that a fully funded program promotes economic growth while a PAYG system impedes it.

National savings include household savings, corporate savings, collective private savings, and government savings. Different countries save in different ways. For example, during the period 1965-79, Japan had the highest national saving rate of any OECD country. Italy had a higher net household saving rate than Japan, but its national saving rate was considerably lower due to a large government deficit. Austria's net household saving rate was not much greater than that of the United States, but its national savings rate was much higher due to a significant government surplus. Corporations and large institutional investors are the greatest sources of capital in the United States, which has had low net household savings and large government deficits for several years.

Table 1.—Gross national savings and net household savings rates as a percentage of gross domestic product for OECD countries

Country	Period	Mean annual gross national savings rate	Mean annual net household savings rate
Total average.....	1977-92/93	22.1	10.2
Luxembourg.....	1977-92	55.6	(1)
Japan.....	1977-93	32.4	16.4
Switzerland.....	1977-93	29.6	7.7
Norway.....	1977-93	25.3	3.7
Austria.....	1977-93	24.6	10.7
Portugal.....	1977-92	24.0	24.9
Netherlands.....	1977-93	23.1	2.4
Germany.....	1977-93	22.5	12.4
Finland.....	1977-93	21.9	4.1
Spain.....	1977-92	21.3	11.1
France.....	1977-93	21.1	(1)
Italy.....	1977-93	21.1	(1)
Mexico.....	1977-93	20.2	(1)
Turkey.....	1977-92	20.2	(1)
New Zealand.....	1977-92	19.0	(1)
Greece.....	1977-92	18.8	(1)
Belgium.....	1977-93	18.4	17.8
Australia.....	1977-93	18.3	18.1
Iceland.....	1977-93	18.3	(1)
United States.....	1977-92	17.9	6.4
Ireland.....	1977-93	17.2	12.1
Sweden.....	1977-92	17.2	1.9
Denmark.....	1977-93	16.1	11.5
United Kingdom.....	1977-93	15.4	(1)
Canada.....	1977-93	12.1	12.1

Source: *OECD Economic Outlook* (December 1994).

<sup>1</sup> Data not available.

Public and private pension funds alone own about one-quarter of all equities and more than one-half of all corporate bonds in the U.S. economy.

The United States has one of the lowest rates of national saving among OECD countries (table 1). During the period 1977-92, net household savings in the United States averaged 6.4 percent, compared with 10.2 percent for all OECD countries from which data were available. Yet a study of household saving and borrowing in several countries found that gross saving in the United States and Germany was similar. Borrowing, however, was much greater in the United States, resulting in a much lower net savings rate. Similarly, a comparison of household saving rates in the United States and Canada concluded that a much higher rate of saving in Canada was due to tax policies, which in Canada provide tax advantages for private saving and in the United States encourage borrowing by making mortgage interest tax deductible. Some economists have attributed the high rate of saving in Japan to a tax system that does not reward borrowing, small government budget deficits combined with low real interest rates, and a high proportion of people older than age 65 who remain economically active.<sup>37</sup>

Numerous empirical studies to determine the effect on savings of PAYG social security financing have yielded conflicting results, and there is no conclusive evidence that the introduction of this mechanism caused saving to decline.<sup>38</sup> There are obviously a number of factors that are responsible for the low rate of saving in the United States, including tax policy and demographic factors, but it is not clear that PAYG social security financing has played a major role.

Evidence on the savings effect of mandatory savings plans is also ambiguous, and in some countries with provident funds the results have been negative rates of return and widespread dissatisfaction with the performance of the funds.<sup>39</sup> One view is that mandatory savings schemes increase savings in the short-term but result in greater consumption by retirees in the long term.<sup>40</sup> Another concern about mandatory savings plans is that pension funds would become major corporate stockholders, and would be in a position to exercise so much power over corporate management that markets would be disrupted.<sup>41</sup>

Financial economist Karl Borden, a supporter of social security privatization, concedes that the Chilean experiment probably has not increased national saving significantly.<sup>42</sup> While private saving may have increased, the effect of the new system on public saving has been negative. He argues, however, that private markets allocate capital to investment opportunities more efficiently than government. Further, he believes that private saving may be offset by public dissaving in the short run, but privatization should produce a qualitative change in national saving that eventually would result in higher rates of return. Nevertheless, Borden admits that the only evidence available to support this claim is anecdotal.

Allowing workers in the United States to divert a portion of their Social Security contributions into a PIP would no doubt increase the availability of private savings. However, if the overall Government budget deficit were not reduced, the Government might very well borrow from private funds the amount previously

supplied by surplus Social Security contributions, and there would be no increase in aggregate national saving.

## ***V. Weighing the Options***

Proposals for change in the U.S. Social Security system include those that favor adjustments in the existing system and those that favor structural change. Included in the latter group is the World Bank proposal, which contains general recommendations for all countries rather than specific recommendations for the United States. In discussing the formal Social Security system, it should be noted that many Americans have additional sources of retirement income. More than half of retirees have private pensions and many have IRAs, both of which are subsidized by the Government through tax incentives. Additionally, a means-tested allowance, Supplemental Security Income (SSI), is available to the aged poor who have a small Social Security benefit or none at all. SSI payments range from about 75 percent of the poverty threshold to more than 100 percent, depending on a number of factors.

In general, proposals for adjustment of the current Social Security system, as noted above, include various combinations of the following recommendations: (1) reduce benefits; (2) accelerate the increase in the age at which full retirement benefits are paid, or increase it further; and/or (3) increase contributions. Proposals for structural change include means testing of Social Security benefits and shifting to a multilevel system.

### ***Reduce Benefits***

Proposals to reduce benefits involve limiting COLAs, revising benefit computation formulas, and increasing the rate of benefit taxation. Some proposals to limit COLAs or revise benefit formulas would have an impact on all beneficiaries, while others would be targeted to reduce benefits only to middle-income and upper income workers. Any increase in the rate of benefit taxation would affect only the latter groups. However, if the thresholds at which benefits are taxed (currently \$34,000 for a single taxpayer and \$44,000 for those filing a joint return) were lowered or eliminated, the increase would have a broader impact.

Under current law, the replacement rate for lower income workers will gradually decline from 57.1 percent for those attaining retirement age in 1995 to 55.7 percent for those who attain retirement age in 2030. Lower income workers generally do not qualify for private pensions and do not have the ability to save very much during their working lives. Across-the-board benefit reductions would disproportionately affect the adequacy of benefits for lower income workers and would not decrease overall government expenditures if these reductions increased the number of elderly receiving SSI payments. Full COLA increases are the only protection that many retirees have against inflation; on the other hand, there is some danger that restricting benefit reductions to middle-income and upper income workers would contribute to the erosion of support for Social Security. The principle of fairness suggests that, if benefit reductions must be implemented, that the impact on the less advantaged be minimized.

### ***Increase the Age of Eligibility for Unreduced Benefits***

The 1983 Social Security Amendments scheduled a gradual increase in the normal retirement age (NRA) from age 65 to age 67 by the year 2025. There are now several proposals that would either accelerate this increase or further increase the NRA to age 70 by the year 2029. At the present time, only Norway has an NRA of 67 for current beneficiaries, and it is the world's highest.<sup>43</sup>

Some research suggests that further increasing the NRA would have little effect on retirement behavior. Thus, it would act as a benefit decrease. Opponents of such an age increase argue that workers with the most bargaining power might be able to recoup the reduction in some other form of employee compensation and those with the least bargaining power, usually the lowest paid, would suffer the most.<sup>44</sup> It has also been found that there is an inverse relationship between mortality and socioeconomic status—those with less income die at earlier ages than those with more—and the disparity is increasing.<sup>45</sup> This finding supports the assertion that increasing the NRA would reduce disproportionately lifetime benefits to lower income workers.

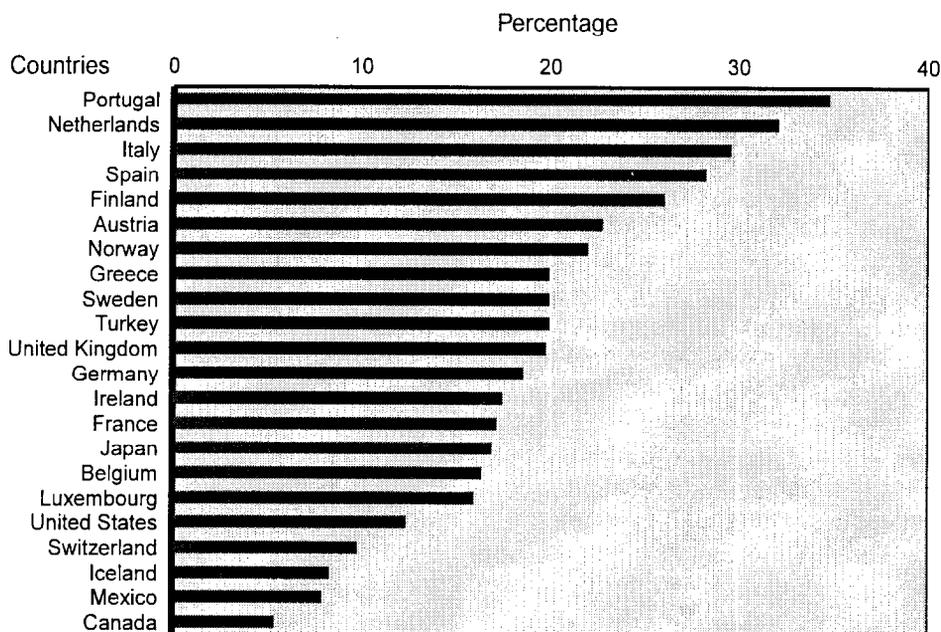
Nevertheless, longer retirement spans have increased the cost of Social Security benefits enormously. The average life span of Americans increased from 61 years in 1935 to 76 years in 1994.<sup>46</sup> Those who favor a further increase in the NRA maintain that it would significantly improve the actuarial balance of the OASI Trust Fund and that its impact on beneficiaries could be minimized through gradual implementation. They agree that it would more adversely affect lower income workers, but argue that it could be tied to other changes that would maintain the progressivity of the system.<sup>47</sup>

If increasing the NRA were to have the anticipated effect on retirement behavior, it would improve economic efficiency in that it would have a positive effect on the ratio of workers to Social Security beneficiaries. Also, if the proportion of workers older than age 65 remaining in the work force increases national savings in Japan, increasing the NRA could have a similar effect in the United States. However, it would be contrary to the basic fairness principle articulated above to adopt this proposal without making other changes to ensure that lower income workers are not forced to bear disproportionately the burden of Social Security reform.

### ***Increase the Payroll Tax***

Although the Social Security payroll tax in the United States is lower than that in most OECD countries (chart 2), the maximum contribution has been increased significantly over the past 2 decades. This has been accomplished primarily through increases in the maximum taxable earnings. The total employer/employee contribution rate for old-age and survivors insurance rose from 8.75 percent in 1974 to 11.2 percent in 1994, while maximum taxable earnings increased from \$13,200 to \$60,600. During this period, income tax rates for corporations and upper income individuals were reduced. Economists C. Eugene Steuerle and Jon M. Bakija note that these reductions, coupled with higher Social Security taxes for lower income and middle-income workers

Chart 2.—Combined employer/employee payroll tax in OECD countries, 1995



Source: *Social Security Programs Throughout the World, 1995*, Office of Research, Evaluation, and Statistics, Social Security Administration.

have resulted in some shifting of the total tax burden from the more affluent to the less affluent, and have made it politically difficult to legislate any additional increase in the Social Security tax.<sup>48</sup>

Another impediment to increasing the payroll tax is the question of intergenerational equity. In discussing this issue, it should not be forgotten that in essence adoption of a PAYG Social Security system simply formalized the transfer of assets from workers to their aged parents. Nevertheless, the marked decline in poverty among the aged<sup>49</sup> suggests that the amount of the transfer to the founding generation may have been greater than informal transfers to previous generations. By one estimate, persons who attained retirement age from 1960 through 1987 received a total transfer of \$3.5 trillion from succeeding generations.<sup>50</sup> A calculation of the lifetime annuity value of Social Security benefits found that all groups that attained age 65 in 1960 received significant positive transfers (that is, the difference between lifetime benefits and taxes). However, the amount of the transfer declines for succeeding generations, and some groups that attain age 65 in the year 2030 will receive negative transfers.<sup>51</sup> Any increase in the payroll tax rate would heighten the impact of this trend.

Some proposals to increase the payroll tax would defer the increase for several years. This approach may be intended to minimize political opposition but, by sparing the “baby boom” generation, it would increase the negative transfer to future generations. This solution would also be contrary to the principle of fairness as it applies to different generations. In his discussion of inter-generational justice, Rawls is concerned with establishing a suitable level of real capital accumulation that each generation should set aside for the next. He believes that persons of different generations have obligations to each other, just as contemporaries do.<sup>52</sup> While Rawls does not broach the subject of one generation

transferring indebtedness to the next, it is clear that such a practice is not consistent with the concept of justice between generations.

### Means Testing

One proposal for reform involves a progressive reduction in benefit payments to families with income above \$40,000 per year. Proponents point out that in 1990, almost \$8 billion in benefits was paid to workers in families with income over \$100,000. Means testing, they estimate, would by the year 2002 save more than \$50 billion annually.<sup>53</sup>

Some of the arguments against means testing are that it discourages saving, since the possession of resources above an established threshold may result in denial of benefits, and that it gives workers an incentive to reduce their other income and/or assets (for example, by transferring savings to their children) in order to qualify for bene-

fits.<sup>54</sup> It has also been argued that means testing would erode support for Social Security by turning it into a welfare program, and that it could increase poverty among the aged, since many nonpoor retirees would be poor without Social Security benefits.<sup>55</sup> The latter point may not be applicable to the current proposal, initially at least, since only families with income above \$40,000 would be affected. However, the Australian experience described earlier suggests that relying solely on a means-tested program to provide income protection to the aged, no matter how broadly the system is based, leaves much to be desired. Means testing is administratively inefficient and has the potential to produce over time either a system with two highly unequal classes of retirees or a system where nearly everyone finds a way to become eligible.

### Shift to a Multilevel System

Some proposals to shift to a multilevel system would reduce the employee Social Security contribution and mandate that an identical amount be deposited in a PIP. A similar proposal would require that a portion of trust fund assets be invested in private equities. Among the objectives of the PIP are to give the worker greater control over his investments and to promote confidence in the system. All of these proposals, however, aim at increasing savings for investment and providing a better rate of return on funds set aside for retirement.

As noted earlier, investing surplus Social Security contributions in private equities rather than Government bonds will increase aggregate savings only if the overall Government deficit is reduced. Advocates of this approach suggest that it would increase the total Government deficit (that is, the amount the Government would have to borrow from private sources to meet its obligations) and thereby increase political pressure for deficit reduction.

The argument that this approach would increase the rate of return on investments is more persuasive. During the 1980's, the rate of return on private pension fund investments was on average 2-3 percent higher than the rate of return on Government bonds, in which trust fund assets were invested. By one estimate, an additional return of 1 percent would increase trust fund assets by \$50 billion by the year 2000. Economist Barry Bosworth maintains that a 2-percent payroll tax invested in private equities and paying an additional 1 percent interest would eliminate the need for benefit reductions or increases in the contribution rate far into the future. However, he does not think it would have any appreciable effect on total saving. "The trust fund," Bosworth writes, "would report a higher rate of return, while the private sector would hold the lower yield Treasury securities previously held by the fund."<sup>56</sup>

The principal arguments against investing a portion of trust fund assets in private equities are that the investments would be riskier, could be influenced by political considerations, and that the size of the investments would give the Government too much influence over private corporations. One economist has called this proposal a "thoughtless and dangerous" idea that would represent "the effective socialization of the U.S. economy."<sup>57</sup> The experiences of some other countries indicate that these could be valid concerns, and use of this mechanism would require strict regulation. Proponents argue, however, that a regulated, diversified investment policy would greatly minimize political concerns.

Opponents of the PIP approach believe that it would put low-income workers at a disadvantage since they would be less likely to be knowledgeable about investments, and that it would erode the progressive nature of the current system. Under this plan, Social Security benefits would be reduced but the annuity value of the PIP would be added to it. Since the amount of the annuity would be linked to total contributions plus accumulated interest, it would not be progressive. Thus, it has the potential to be less advantageous to lower income workers than the current system.

The greatest impediment to shifting from a PAYG system to a private investment scheme is that funds have not been set aside for payments to current beneficiaries; they must be funded through contributions from current workers. If current workers contribute only to a private investment account, the government must find another means of paying current beneficiaries. Chile planned for the transition by running a budget surplus for several years. This is not a feasible alternative for the United States, which has a chronic budget deficit. One suggestion for dealing with this dilemma is to convert promises to current beneficiaries into long-term government bonds that pay market interest rates.<sup>58</sup> This approach, however, would result in an enormous increase in government indebtedness; it is estimated that, if workers under age 40 stopped contributing to the retirement trust fund, almost \$7 trillion in funds would be needed to pay benefits promised to those remaining in the system.<sup>59</sup>

Karl Borden suggests funding the transition through "limited default" on promised benefits to contributors to the old system. This could be accomplished through a variety of mechanisms (increasing the retirement age, altering COLA formulas, revising the CPI calculation, and so forth) and could be combined with the issuance of bonds to workers who opted to participate in the new

system. What Borden terms defaults are identical to other proposals for dealing with long-term financing, but in this instance they would be transitional rather than ongoing. For him, this suggestion represents a compromise "between the extremes of defaulting on our intergenerational social contract and paying everyone everything they feel is due to them."<sup>60</sup> The bonds would represent the value of contributions to the old system in calculating benefits under the new system. This suggestion is similar in concept to the "recognition bonds" that were issued by the Chilean government, and that were funded through general revenues. Even though the combination of these two approaches would significantly reduce the Government's obligation to workers who contributed to the old system, it would still involve the payment of several trillion dollars from the general fund.

Diverting only a portion of current contributions into private investments, as has been proposed, would not create the same problem as a complete replacement of the current system, but it would create a shortfall that the Government would have to deal with by reducing benefits to current beneficiaries, increasing the contributions of current workers or subsidizing benefits through general revenues. One proposal would increase the employer/employee contribution rate by 2 percent and divert only that amount into private investment. This approach would avoid a revenue shortfall. As previously noted, however, any increase in the payroll tax, even if its purpose was to increase savings, would likely face stiff political opposition. Some argue that the introduction of fully funded personal savings accounts could increase public confidence in Social Security; others maintain that it would constitute a move away from wage-based collective protection against old age, disability, or the death of a worker.

The World Bank proposal for a multipillar system was discussed earlier. It would include three levels: a means-tested or universal pension, a mandatory private pension or personal savings program, and a voluntary personal savings plan. It is similar in concept to the other proposals discussed, but it would make the Social Security pillar modest in size, with the limited objective of poverty reduction. Most of the domestic proposals under consideration would not reduce the role of social insurance as extensively as the World Bank proposal.

## *VI. Conclusions*

Some experts believe that the United States should cut back on its Social Security program to the point that it serves only as a social safety net for the aged poor, and concentrate on encouraging middle-income and upper income workers to invest in private equities, which provide higher rates of return than Government bonds. This, it has been argued, is all the Nation can afford.<sup>61</sup> Chile has already taken this step, albeit to replace a system that totally failed, and other countries are gradually moving in the same direction. Australia and the United Kingdom currently have very different systems. However, as indicated above, both are evolving into systems that plan to provide limited public pensions for lower income workers and, perhaps, considerably more generous private pensions for middle- and upper income retirees. As the United States examines its options for providing income protection to the

aged into the next century, the central question for policymakers is whether to follow suit, or whether the Nation should be guided by social insurance advocates who believe that the Social Security system is basically sound and that fundamental fairness, work incentives, and issues of adequacy and efficiency should continue to be the bases of policy formulation.

Critics of the current system maintain that, by requiring workers to contribute to a Government-administered program, workers are deprived of the freedom to choose how best to provide for themselves in retirement. However, historical experience indicates that many workers are unable to deal with the complexities of retirement planning and, consequently, do not make adequate preparations on their own initiative.<sup>62</sup>

Those who favor the social insurance concept point out that it has engendered broad public support, insulated the aged from the effects of market failure, and reduced poverty among the aged without creating the inefficiencies associated with means-tested programs.<sup>63</sup> It is true that unfunded PAYG financing entails a significant income transfer to the founding generation from succeeding generations and that the transfer, to a certain extent, is from lower income workers to higher income retirees. However, as the ratio of retirees to workers increases, it becomes impossible to sustain such a transfer and this aspect of the system tends to disappear. Thus, it ceases to be pertinent in discussing potential reforms. Positive net intergenerational transfers have already declined significantly in the United States, and this downward trend is expected to continue.<sup>64</sup> Additionally, the progressive nature of the system has not only kept lower income retirees above the level of destitution, but enabled them to receive adequate pensions with minimal contributions.

Any decision to scale back future benefits should take into consideration that, while many middle-income and upper income retirees are becoming increasingly less dependent on Social Security to provide for them in retirement, it remains a significant income source for some middle-income retirees and the primary source for most lower income retirees. Further, any future increase in the NRA would reduce disproportionately lifetime benefits to lower income retirees, unless it were enacted along with some provision to offset this effect. If a multilevel system with a private savings component were to be considered, the potential impact on the progressivity of the public system should be a major point of analysis; a full distributional study should be undertaken to clearly understand the impacts for workers, and whether or not the aged poverty rate would increase.

The disadvantages of mandatory private savings plans have been, in some cases, their failure both to protect contributors against poor investment performance and to make adequate provision for lower income workers. Additionally, there are concerns related to the potential for political domination of private markets. The addition of a private savings component clearly involves some risk for contributors. However, some argue that it could potentially increase national savings and would likely provide a higher rate of return on investments than would Government bonds. Given the problem of providing for an increasing number of retirees with fewer workers, some have argued that it may be desirable at this point to consider a supplemental or partial private

savings plan in some form. Such a plan might boost public confidence in the Social Security system and provide workers some focus for retirement planning. However, careful research and analysis should continue before structural changes are seriously considered. The PAYG social insurance system has been the core program for providing income protection to the aged in the United States. Structural changes in a system that sustains adequate pensions for middle-income and lower income workers should, in our view, be carefully analyzed in terms of the framework provided in this article: fundamental fairness, economic and administrative efficiency, and adequacy.

One of the chief advocates of social insurance, economist James H. Schulz, believes the need for social insurance may be even greater in the current economic environment than in the past. "Today, more than ever," he writes, "political systems are embracing the incentive-control mechanisms of 'markets' and, in the process, exposing all their citizens to the economic insecurity that goes with them...the rising tide of market solutions to economic development issues promises an accelerating need for mechanisms that assist individuals in dealing with the risks and social disruption arising out of social, demographic, political, and economic change." Social insurance, according to Schulz, "is a way of dealing with a variety of risks all individuals face."<sup>65</sup> Despite evidence of a lower level of confidence among younger workers, the social insurance system in the United States has demonstrated an ability to retain broad public support while providing benefits to retirees at all income levels that are consistent with the priority that Americans traditionally have accorded to the provision of fairness. Proponents argue that work leading to an earned right, pooling the risk of death, disability, or poverty in old age, and the provision of adequate benefits to lower income and middle-income workers is consistent with fundamental fairness, economic efficiency, and adequacy. Clearly, however, serious financial realities will have to be faced so that the core values of the Social Security program can be sustained in such a way as to promote the continuance of strong public support.

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## Notes

<sup>1</sup> World Bank, *Averting the Old Age Crisis: Policies to Protect the Old and Promote Growth*, New York: Oxford University Press (1994), p. 28.

<sup>2</sup> The OECD currently has 27 member countries (Australia, Austria, Belgium, Canada, the Czech Republic, Denmark, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Japan, Luxembourg, Mexico, the Netherlands, New Zealand, Norway, Portugal, Spain, Sweden, Switzerland, Turkey, the United Kingdom, and the United States). Poland is expected to become a member in the near future.

<sup>3</sup> See World Bank, table A.2, for projections of the proportion of the population that will be aged, by country, through the year 2150.

<sup>4</sup> Martin Diamond, "Ethics and Politics: The American Way," *The Moral Foundations of the American Republic*. Charlottesville: University Press of Virginia (1986), p. 75.

<sup>5</sup> *Ibid.*, p. 90.

<sup>6</sup> Ibid., pp. 101-102.

<sup>7</sup> C. Eugene Stuerle and Jon M. Bakija, *Retooling Social Security for the 21st Century: Right and Wrong Approaches to Reform*, Washington, D.C.: The Urban Institute Press (1994), pp. 12-20.

<sup>8</sup> John Rawls, *A Theory of Justice*, Cambridge: Harvard University Press (1971), pp. 27-28.

<sup>9</sup> Ibid., p. 12.

<sup>10</sup> Ibid., pp. 14-15.

<sup>11</sup> Philip Selznick, *The Moral Commonweal: Social Theory and the Promise of Community*, Berkeley and Los Angeles: University of California Press (1992), p. XI.

<sup>12</sup> See Philip J. Harmelink and Janet Furman Speyrer, "Social Security: Rates of Return and the Fairness of Benefits," *The Cato Journal* (Spring/Summer 1994), pp. 44-51. This article includes a detailed discussion of rates of return on Social Security contributions for recent retirees.

<sup>13</sup> See World Bank, p. 224, for administrative costs of the Chilean system and other mandatory savings schemes. The figure for the United States was derived from U.S. Social Security Administration (1996), *Annual Statistical Supplement to the Social Security Bulletin, 1995*, table 4.A3.

<sup>14</sup> Social insurance programs in most countries provide protection against old age, disability, and the death of a wage earner. However, the focus of this paper is on old-age income protection.

<sup>15</sup> World Bank, table A.4.

<sup>16</sup> U.S. House of Representatives, Committee on Ways and Means, *The Green Book: Overview of Entitlement Programs* (1993), p. 16.

<sup>17</sup> Julian Disney and Lynelle Briggs, eds., *Social Security Policy: Issues and Options* (1994), p. 221.

<sup>18</sup> Ibid., p. 9.

<sup>19</sup> Neil Gilbert and Neung Hoo Park, *Privatization, Provision and Targeting: Trends and Policy Implications For Social Security in the United States*, Paper presented at the International Social Security Association, International Research Meeting, Vienna (November 1994), p. 4.

<sup>20</sup> Under a defined contribution plan, the annual contribution is defined in advance but the eventual payout is not. The payment amount is determined by the amount contributed, the economic health of the country, and how well the workers' investments are managed. Under a defined benefit plan, the pension formula is defined in advance.

<sup>21</sup> See World Bank, p. 199. Also, see James H. Schulz, "Economic Support in Old Age: The Role of Social Insurance in Developing Countries," *International Social Security Review* (April 1992), p. 82.

<sup>22</sup> See Gilbert and Park, p. 7.

<sup>23</sup> See Schulz, pp. 81-82.

<sup>24</sup> Ibid., p. 84.

<sup>25</sup> World Bank, pp. 203-208.

<sup>26</sup> For example, see James H. Smalhout, "Dodging the Bullet: Chile's Pension Experiment Ought to Inspire the United States," *Barron's*, July 10, 1995.

<sup>27</sup> Robert J. Myers, "Chile's Social Security Reform, After Ten Years," *Benefits Quarterly*, Vol. 8, No. 3 (1992), p. 44.

<sup>28</sup> Colin Gillion and Alejandro Bonilla, "Analysis of a National Private Pension Scheme: The Case of Chile," *International Labour Review*, Vol. 131, No. 2 (1992), p. 179.

<sup>29</sup> Gabriel Escobar, "Chile's Rule: Fallen Can Rise Again," *The Washington Post*, June 6, 1995, p. A8.

<sup>30</sup> See Myers, p. 47, and Gillion and Bonilla, pp. 185-186.

<sup>31</sup> Imogen Mark, "Chile's Private Pension Funds: Feted Abroad, Maligned at Home," *London Financial Times*, January 18, 1996.

<sup>32</sup> See Gillion and Bonilla, p. 178.

<sup>33</sup> Robert Kuttner, "Social Security: If It Ain't Broke, Don't Tinker," *Business Week*, February 20, 1995, p. 22.

<sup>34</sup> The term "multipillar" is used by the World Bank to describe its proposal. It is interchangeable with the term "multilevel" used elsewhere.

<sup>35</sup> See Robert Kuttner, *The Economic Illusion: False Choices Between Prosperity and Social Justice*, Philadelphia: University of Pennsylvania Press (1984), pp. 75-79. This idea was first advanced during the 1970's by economist Martin Feldstein, who claimed that the American economy would have grown by an additional \$2 trillion over the 4 previous years were it not for Social Security. A decade later, it was discovered that Feldstein's original equation contained a serious technical error. This led some to believe that his initial conclusion was incorrect and, based on corrected analysis, to assert that Social Security actually may increase savings.

<sup>36</sup> Bob Kerrey and Alan K. Simpson, "How to Save Social Security," *The New York Times*, May 23, 1995, p. A17.

<sup>37</sup> See Kuttner (1984), pp. 60-74.

<sup>38</sup> World Bank, p. 309.

<sup>39</sup> Ibid., p. 203 and p. 209.

<sup>40</sup> Patrick Artus, "The Financing of Retirement Schemes, Savings and Growth," *International Social Security Review*, Vol. 47, February 1994, p. 10.

<sup>41</sup> World Bank, p. 223.

<sup>42</sup> Karl Borden, "Dismantling the Pyramid: The Why and How of Privatizing Social Security," *The Cato Project On Social Security Privatization*, SSP No. 1 (August 14, 1995), pp. 7-9.

<sup>43</sup> A recent reform of the Swedish old-age pension system introduced the concept of considering the worker's remaining life expectancy at retirement age in calculating the benefit amount. This does not increase the NRA. However, as life expectancy at retirement age increases, annual benefit payments will decrease.

<sup>44</sup> Merton C. Bernstein, "Should Social Security's Age for First Benefits or for Full Benefits Be Increased? No, Changing Retirement Age Is A Blunt Instrument," *Retirement and Public Policy*, Washington, DC: The National Academy of Social Insurance (1991), pp. 231-244.

<sup>45</sup> Gregory Pappas, Susan Queen, Wilbur Hadden, and Gail Fisher, "The Increasing Disparity in Mortality Between Socioeconomic Groups in the U.S., 1960 and 1986," *The New England Journal of*

*Medicine*, Vol. 329, No. 2, July 8, 1993. Also, see Harriet Orcutt Duleep, "Measuring the Effect of Income on Adult Mortality Using Longitudinal Administrative Record Data," *The Journal of Human Resources*, Vol. XXI, No. 2, Spring 1986, pp. 239-251.

<sup>46</sup> Sarah Glazer, "Overhauling Social Security," *CQ Researcher*, Vol. 5, No. 18, May 12, 1995, p. 428.

<sup>47</sup> See Stuerle and Bakija, pp. 195-201. Also, see Dean R. Leimer, "A Guide to Social Security Money's Worth Issues," *Social Security Bulletin*, Vol. 58, No. 2 (Summer 1995), pp. 12-14, for a discussion of rates of return under OASI within cohorts, including different levels of lifetime earnings.

<sup>48</sup> Stuerle and Bakija, pp. 159-161.

<sup>49</sup> Bureau of the Census, "Poverty in the United States: 1992," *Current Population Reports*, Series P-60, No. 185, Washington, DC: U.S. Government Printing Office. The poverty rate for persons aged 65 or older declined from 35 percent in 1959 to 12 percent in 1992.

<sup>50</sup> James E. Duggan, Robert Gillingham, and John S. Greenlees, "Returns Paid To Early Social Security Cohorts," *Contemporary Policy Issues*, Vol. XI (October 1993), p. 11.

<sup>51</sup> See Stuerle and Bakija, pp. 98-119.

<sup>52</sup> See Rawls, pp. 284-293.

<sup>53</sup> See Glazer, p. 427.

<sup>54</sup> See Stuerle and Bakija, pp. 28-30.

<sup>55</sup> See Glazer, pp. 427-428.

<sup>56</sup> Barry Bosworth, "The Social Security Trust Fund: How Big? How Managed?" Unpublished paper presented at the National Academy of Social Insurance (January 1995), pp. 20-24.

<sup>57</sup> See Borden, p. 14.

<sup>58</sup> See Smalhout (1995). This proposal was developed by Chilean economist Salvador Valdes-Prieto.

<sup>59</sup> Geoffrey Kollmann, "Social Security: The Chilean Example," *CRS Report for Congress* (July 27, 1995), p. 5.

<sup>60</sup> See Borden, pp. 19-21.

<sup>61</sup> See Glazer, p. 427.

<sup>62</sup> See Schulz, p. 86.

<sup>63</sup> See Stuerle and Bakija, p. 25.

<sup>64</sup> See Stuerle and Bakija, pp. 106-112, for a comparison of net transfers to individuals turning 65 in 1960 through those turning 65 in 2030. Also, see Martynas A. Ycas, "The Issue Unresolved: Innovating and Adapting Disability Programs For The Third Era of Social Security," *Social Security Bulletin*, Vol. 58, No. 1 (Spring 1995), pp. 48-49. Ycas notes that, 50 years after its introduction, over 90 percent of Americans consider the Social Security system a success. This, he points out, is indicative of a public recognition that such a system, "must be planned in terms of generations rather than months or years."

<sup>65</sup> See Schulz, pp. 88-97.

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