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**DISCUSSION BY JAMES C. HICKMAN  
OF THE PAPER  
THE UNRESOLVED OASDI DECOUPLING ISSUE**

by  
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Introduction

Actuaries work on important problems. Nevertheless, with the notable exception of Social Security, it is unusual for their work to be reported by the media and for their recommendations to be the subject of national political debate. Thanks to their professional education, which for many years has included social insurance topics, the members of the Society of Actuaries have a unique opportunity to assume positions of leadership in the continuing public discussion on future directions for Social Security. The Society owes Messrs. Moorhead and Trowbridge a debt of gratitude for their clear presentation of the background on one of the key Social Security issues of the day. By reading their paper, actuaries will be better equipped to perform their proper public function.

The purpose of this discussion is to state a few of the reasons that moved some actuaries to support the use of price indexed wage histories in solving the problem of an over-indexed Social Security benefit formula. The authors limited their paper to a balanced presentation of the salient points on both sides of the wage versus price index argument. Although the issue, as recently formulated, was resolved by the 1977 amendments, the division of viewpoints apparent in the argument will likely reappear when other issues are before Congress.

It is important to place the wage-versus-price index issue in perspective. Virtually all actuaries who studied the automatic indexing features of the benefit formula, as defined by the 1972 amendments, were convinced that it could lead to unintended and unreasonable benefits and associated costs. The central, and perhaps surprising, fact is that there was almost unanimous agreement among students of Social Security that something had to be done to correct the over-indexation. As a result, the action that Congress took in late 1977 in resolving the decoupling issue by adopting a system of wage indexed wage histories was greeted with applause from all actuaries who had been involved in the decoupling controversy. The cheers may have been louder in some quarters than others, however, the relief expressed when the decoupling issue was resolved was widespread and genuine.

The basic questions that were involved in the decoupling issue, and which will undoubtedly reappear in connection with future discussions, may be organized into two general classes.

1. What indices should be used to measure the performance of the Social Security system? The distribution of replacement ratios is only one of several measures of the system that might be considered. The distribution of replacement ratios is intended to measure the economic welfare of a cohort at one time. However, even if one adopts some measure of the distribution of post-retirement to pre-retirement income, on or about the date of

retirement, as an important index, is the distribution of replacement ratios as currently defined the best such measure?

2. Is it feasible, or desirable, to attempt to design the Social Security system so that it is intended to operate automatically for the indefinite future? Perhaps our future society and economy will be very different from what we expect. An adaptive response to unexpected change may be made more difficult by powerful political expectations that the Social Security system will not change.

#### The Distribution of Replacement Ratios

The argument of those who favored wage indexed wage histories was based primarily on the desirability of stabilizing the distribution of replacement ratios. The counter argument in turn starts by asking two types of questions: (1) Does the distribution of replacement ratios measure what is intended? (2) Why elevate the stabilization of the distribution of replacement ratios to a position as a central policy consideration?

The first type of question involves certain technical but important issues in the definition and interpretation of the distribution of replacement ratios. Some of the issues are as follows:

1. The distribution of replacement ratios is defined at one time for each cohort. Does the rate of earned income immediately before retirement measure either the "need", as defined by recent consumption patterns, or the previous "contributions" of those retiring? Statistical studies show considerable variation in earned income within cohorts at all ages. In the years before retirement not only is there significant variability, but also some erratic behavior of the mean income (1, Chapter 6, Appendix B). Perhaps some sort of trimmed average of price adjusted (real) income over the ten years before retirement, dropping the high two and low two years of income, would be a better measure of both need and contribution.
2. If post-retirement benefits are price indexed, the distribution of replacement ratios relative to the income distribution of active workers may shift significantly as a cohort moves through retirement years. If real wages increase, the relative income of the retired cohort will decline. If real wages decline, as a result of a higher rate of price increase than wage increase, the relative position of a retired cohort will improve. If stabilization of replacement ratios is desirable, shouldn't the concept be extended over retirement ages?
3. Is it possible in any meaningful way to stabilize the distribution of individual replacement ratios? The issue here is that the stabilization described by proponents of wage indexed wage histories refers to replacement ratios for fixed percentile points on the distribution of average covered wages. Because different sets of weights, caused by averaging periods of different lengths as well as by the use of different indices, may treat a single wage history in very different fashions, the stabilization referred to does not pertain to any particular common path followed by individual wage histories.

4. The purpose of indexed wage histories is to produce an average real wage (price indexing) or an average related wage (wage indexing) on or about the age of retirement for the purpose of determining a retirement benefit. It is well known that in the past the Consumer Price Index was based on a market basket of goods and services that was relevant to only a fraction of the U. S. citizens. This criticism caused the Bureau of Labor Statistics to recently expand their series of consumer price indices to reflect significant differences in consumer behavior. When one uses a single national consumer price index to create a lifetime average real wage, it is clear that certain approximations are being used. Nevertheless, one hopes the approximation is small because of the parallel behavior of most measures of consumer prices. The use of national average wage index numbers to produce an average relative wage is subject to a related criticism. The rates of wage change for certain workers are very different than for the economy as a whole (1, Chapter 6). The use of a single national wage index may not be successful in summarizing the relative average wage of many workers. Although the issue is far from settled, it appears as if the progression of consumer prices among groups of workers may be subject to less variability than the progression of wages.

The second type of question starts with the assumption that the measurement issues have been resolved. Then after acknowledging that the distribution of ratios of initial benefits to pre-retirement earned income, measured in some fashion, is a major consideration in designing a benefit formula, one asks why should the stabilization of the distribution of replacement ratios become the primary goal? Does the present distribution of replacement ratios have some optimal property? Aren't there other properties of the Social Security system that perhaps deserve equal consideration in developing the benefit formula? For example, after forty years in which to mature, one might adopt stable tax rates as a goal.

Those who favored price indexed wage histories did so in part because they tended to believe that there are measurement problems in the current definition of the distribution of replacement ratios. Even if these technical problems were solved, those who favored price indexed wages did not believe that it was self evident that the stabilization of the distribution of replacement ratios should be the premier goal of benefit formula design.

#### The Need for Flexibility

Those who favored price indexed wage histories tended to adopt the achievement of a modicum of flexibility in fixing future benefit levels and financing arrangements as a goal. The desire for some flexibility was based on the premise that the future shape of the U. S. society and economy cannot be predicted with accuracy. Consequently, the completely automatic operation of the Social Security system over the years is highly unlikely. In order that future generations may more easily use the political process to make the changes that will almost inevitably be required, it was proposed that the current system be designed to produce margins under reasonable assumptions, to facilitate the adjustments.

During most of the history of the U. S., average wages have increased more rapidly than average prices. If this favorable relationship continues, a system of price indexed wage histories would cause the distribution of replacement ratios, as conventionally defined, and associated cost, to shift downward compared to a system based on wage indexed wage histories. If real wages decline, those who adopt flexibility as a basic goal, are forced to favor a shift to a wage indexed system. The Consultant's Panel (1, Chapter 7) recommended a major change in the indexation system in the event of a prolonged recession. Nesbitt (4) suggests a special Social Security index which might blend wage and price elements and which, presumably, could be managed to supply the needed flexibility.

To a limited extent, the flexibility that is sought was available in the Social Security system before the 1972 amendments. The use of a level average wage assumption in the long term cost estimates was criticised by economists as being simplistic and misleading (3). The procedure was certainly correct de jure, but involved a mild deception de facto. In any case, because of the progressive nature of the benefit formula an increase in average wages increased the value of the payroll tax more than it increased the value of the stream of future benefits. Consequently, with no change in tax rates financing was available to make adjustments in benefits or to correct inequities in the benefit structure as perceived by Congress whenever average wages increased. The adjustment procedure was inexact and carried some risks. Yet the use of a level average wage assumption served a legitimate purpose during the evolution of Social Security.

Those who have adopted flexibility as an important goal of Social Security planning base their choice in part on the impossibility of constructing a system which can operate without intervention for many years. We will illustrate the nature of the problem with three examples.

- (1) Population. The Report of the Panel on Social Security Financing (5) demonstrated the problem in estimating the population of the United States in 1975 as follows: "In 1946 it was authoritatively estimated that the 1975 United States population would perhaps be as low as 147 million, or perhaps as high as 191 million; in 1958 the corresponding low and high forecasts of the 1975 population were 216 million and 244 million; the event --- a population of 213 million has confounded both these prophecies."
- (2) Energy prices. Twenty years ago it was predicted that energy prices would increase slowly during the indefinite future because of finite energy resources and increasing demand. Actually, real energy prices declined slowly because of the rapid development of the vast Middle East oil reserves. Then prices jumped at the times of the Arab oil embargo and the organization of OPEC. The adjustment to this sudden and profound change is not yet complete, as may be affirmed by examining the U. S. balance of payments. No one predicted the dramatic course that energy prices have followed and the associated economic problems.
- (3) Labor participation. Labor force participation by women in the forty years plus years since Social Security was established has increased at all ages (2). Adjustments in American domestic life, employment practices, and Social Security are not yet complete.

It is reasonably clear that the important changes introduced by the 1977 amendments have not completed the adjustment process associated with the fall in the fertility rate since 1960 and probably not completed the adjustments required by increased labor force participation by women. To complete adjusting the Social Security system for those environmental changes, that are already apparent, plus those that are only dimly perceived, will require flexibility if abrupt changes in benefit levels or tax rate are to be avoided.

#### Summary

Actuaries who favored a system of price indexed wage histories to resolve the decoupling issue were motivated to take that stand by a reluctance to adopt the stabilization of the distribution of replacement ratios, as currently defined, as the primary goal of decoupling. Those actuaries also tended to feel that flexibility, to permit adjustments to changing conditions without sudden shifts in benefit levels or tax rates, is desirable.

#### References

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