PART TWO

DEMOGRAPHIC AGEING AND THE REFORM OF PENSION SYSTEMS IN THE ECE REGION

PAPERS FROM THE ECE SPRING SEMINAR, MAY 1999

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INTRODUCTION AND SUMMARY OF DISCUSSION

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This year's UN/ECE Spring Seminar**,** held in Geneva on 3 May 1999, examined the consequences of ageing for pension schemes, the reform[121] of which is now underway or under consideration in virtually all of the 55 countries of the ECE region.

The implications of population ageing have been a major subject of United Nations attention for decades,[122] and one to which UN/ECE, through the Economic Analysis Division's Population Activities Unit, has long devoted resources.[123] However, in recent years, driven by a perceived crisis in public pension provision (and to a lesser extent a parallel concern about rising health care costs for an ageing society), the subject has generated an intense and widespread debate, and is now a leading policy issue.[124]

The purpose of the Spring Seminar was to review this debate and to see if some fresh light could be shed on key issues. In particular, the major reform advocated by many throughout the region has been to shift from an emphasis on public pensions paid through payroll deductions to greater reliance on (usually) private pensions funds in which contributors accumulate assets. The Seminar sought to examine what impact this might have on the problems of the pension systems of the region: was such a shift in fact necessary for resolving the perceived crisis in public pensions? would the proposed change be sufficient? are there alternative reform proposals available?

After an initial examination of general macroeconomic issues, the Seminar considered separately the specific questions of pension reform in established market economies, and then the special difficulties facing the countries with economies in transition. A "round table" summed up the discussion and reviewed some of the proposals in the light of the international financial crises of 1997 and 1998.

To understand the roots of the relatively heated international debate on pension reform, which is the background to the Seminar, and the economic reasoning behind the various policy recipes being advocated, it is useful to understand why this issue has become much more prominent in public discussion. For a long time "pension economics" was virtually the exclusive terrain of a small group of specialists. Although many of the details involving pensions are inevitably obscure to the non-specialist, concentration on technical details may conceal the fact that the essential issues are quite straightforward.

The increased attention to pension reform is due in large measure to a number of objective developments, resulting in a perceived "old age crisis". The most visible development is the impact of population ageing on the longstanding public pension systems in the region. These systems were generally designed as "pay-as-you-go" (PAYG), in which today's workers, through payroll deductions,[125] pay the pensions of today's eligible retired citizens. Public PAYG systems have normally been of the "defined benefit" type, in which entitlement as a function of previous earnings is fixed by law, even though current contributions may fall far short of the amount needed to cover benefits. A large number of

[121] Throughout the term "pension reform" is used rather than the American term "social security reform". In Europe "social security" means welfare provision more broadly defined, including unemployment, sickness and even poverty alleviation measures. The European usage is closer to the American term "welfare", which itself often has a different meaning in Europe. Some of the contributors did write of "social security", but a change has been made here in the interests of avoiding misunderstanding.

[122] Thus, United Nations, Department of Economic and Social Affairs, *The Aging of Populations and its Economic and Social Implications*, Population Studies, No. 26 (New York), 1956, is probably the pioneer work in this field. Decisive international strategy initiatives began with the United Nations World Assembly on Aging in 1982, which adopted the important Vienna International Plan of Action on Aging. A conference to review the implementation of this Plan of Action in the ECE region is being planned for 2002.

[123] See, for example, UN/ECE and United Nations Population Fund, *Demographic Causes and Economic Consequences of Population Aging: Europe and North America* (United Nations publication, Sales No. GV.E.92.0.4) and Netherlands Interdisciplinary Demographic Institute and the Population and Family Study Centre, *Economic and Social Implications of Aging in the ECE Region* (The Hague/Brussels), 1989. The UN/ECE; Population Activities Unit's webpage, accessible from www.unece.org (Economic Analysis publications), describes its current activities including those relating to ageing.

[124] As in OECD, *Maintaining Prosperity in an Ageing Society* (Paris), 1998; World Bank, *Averting the Old Age Crisis: Policies to Protect the Old and Promote Growth* (Oxford, Oxford University Press, 1994); N. Barr, "Economic theory and the welfare state: a survey and interpretation", *Journal of Economic Literature*, June 1992; and the "Stockholm Initiative" publication, *The Social Security Reform. In Search of a New Consensus: A Summary*, International Social Security Association (Geneva), 1998.

[125] In many countries there is an employers' contribution, and this may even be substantially greater than that deducted from wages. Analytically, conventional economic theory suggests that in the long-run the burden of taxation paid by employer or employee will be the same, no matter what the formal rules are about this. Clearly, however, the presentation of the situation has major implications for what workers or employers *think* is the situation about who is paying.

existing public systems, because they are both PAYG *and* defined benefit, are now under financial pressure: the defined benefits are, or soon threaten to be, substantially greater than the payments coming in at current tax rates.[126]

Societies are ageing, first of all, because of welcome improvements in mortality at older ages. The tendency towards longer life has increased the *old age dependency ratio*, that is the ratio of those of a standard retirement age and above to those of working age. This improvement in life expectancy has already had an impact on pension schemes but the forecasts, although necessarily fragile, are for an even greater one in the future.

These improvements have been much greater in the established market economies of the ECE region than in the countries with economies in transition. In the latter there have even been a number of mortality reversals, a development which did not arise with the onset of transition, but began in the period of central planning.[127]

Thus, in western Europe as a whole, there are at present 22.4 persons over 65 for every 100 persons of working age in 1995-2000; on the most authoritative[128] forecast this number will rise to 32.3 in 2020-2025, to 41.6 in 2030-2035, and 47.6 in 2040-2045. In short, if there are now between four and five people of working age for every retired person in western Europe, in just over 40 years there will be only slightly more than two. It is of course figures such as these which have been the source of many of the disturbing headlines of the past few years, especially in the market economies.

Looking exclusively at the demographics of the situation, eastern Europe would appear to be in a more favourable position for some time. Thus presently there are only 18.4 people over 65 for every 100 persons of working age (as compared with 22.4 in western Europe, 23.7 in northern Europe and 22.1 in southern Europe). On present forecasts this difference will prevail for a long time: in 2020-2025, when the old age dependency ratio in western Europe is projected to have risen 32.3, it will only be 24.4 in eastern Europe, the latter will rise to 31 in 2030-2035 and 35.5 in 2040-2045.

A secondary demographic factor is the concern about "ageing from below", due to changing birth rates. In many countries of the ECE region there was a "baby boom" cohort, often followed by a "baby bust".[129] When the "boomers" in a given country reach retirement age, there will be a substantial increase in the old age dependency ratio, as the cohorts following them are distinctly smaller. This "one-off", but protracted, impact should be seen in a social context. In the overwhelming majority of ECE countries, the number of children one woman will have in her lifetime, the total fertility rate, has now settled with only a few exceptions significantly below the replacement rate, and currently shows no sign of returning to the latter rate.[130]

Thus fears about the future course of old age dependency ratios have been the first impetus for reform discussions. The basic demographic factors, however, are not the only reasons why there is worry about the financing of public pension systems at current tax rates. The increase in the *system dependency ratio*, that is the ratio of those receiving public pensions, at whatever age, to those contributing to them, has greatly compounded the problem.

What factors have contributed to the deterioration in this system dependency ratio, over and above the underlying old age dependency ratio? For the market economies the chief factor has been the persistent trend towards early retirement, particularly marked between 1960 and 1985. This has been influenced by the incentives offered by pension systems themselves, as well as by incentives to firms to retire older (more expensive) workers when growth rates of output are relatively low.

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126 The degree of the future threat involves projections and forecasts, and therefore necessarily remains controversial. (The designers of the United States Social Security System, after all, were worried that it would go bankrupt in the 1950s).

127 F. Mesle, "The east-west health divide", in D. Coleman (ed.), *Europe's Population in the 1990s* (Oxford, Oxford University Press, 1996) and J. Shapiro, "Health", in J. Eatwell et al. (eds.), *Hard Budgets and Soft States* (London, IPPR, 1999), forthcoming.

128 United Nations Population Division, *World Population Prospects, The 1998 Revision*, Vol. 1 (United Nations publication, Sales No. E.99.XIII.9), table A29. In this table the working age is defined as 15 to 64 years. For the ECE region the starting age of 15 may result in some underestimate of the old age dependency ratio, as well as the youth dependency ratio.

129 The start of this boom was (apart from a brief postwar surge) substantially later in the market economies of Europe than in North America, beginning in the late 1950s and peaking in 1964. For the former centrally planned economies, now in transition to established market economies, the pattern of change in the total fertility rate, the number of children a woman will have in her lifetime, has been quite different. D. Coleman, "New patterns and trends in European fertility: international and sub-national comparisons", in D. Coleman (ed.), *Europe's Population in the 1990s*, op. cit., pp. 11-15.

130 A total fertility rate of 2.1 children per woman is normally taken to be the replacement rate which would just assure population stability. Sixty-one states containing 44 per cent of the world's population presently have levels below this, most of them prosperous. (United Nations Population Division, *World Population Prospects*, op. cit., p. 4.) Indeed, the clear majority of these states are in Europe. For the ECE region, only the five new states of former Soviet central Asia, Albania, Azerbaijan and Turkey remain exceptions. The Turkish rate itself has nearly halved since 1980. (Council of Europe, *Recent Demographic Developments in Europe, 1998* (Strasbourg, Council of Europe Publishing, 1998), p. 15.) For an exploration of the special case of the fall in fertility rates in the transition economics, see UN/ECE, *Economic Survey of Europe, 1999 No. 1*, chap. 4 and M. Macura, "Fertility and nuptiality changes in central and eastern Europe: 1982-1993", *Studia Demograficzne*, Vol. 4, No. 122, 1995, pp. 9-33. Sweden notably exceeded this level in 1990, and Norway nearly reached it. Since then the Norwegian rate has flattened out, having dropped slightly, and the Swedish rate has fallen to its historic low of 1.53. Council of Europe, op. cit., pp. 59 and 379.

In virtually every country of the ECE region the actual average retirement age is below the statutory one, and often far below it. In Germany, for example, where the standard age of entitlement to a public pension in 1995 was 65 for both men and women, the mean retirement age was 60.5 years for men and 58.4 years for women; in the Netherlands, with the same standard age of entitlement as Germany, the corresponding averages were 58.8 for men and 55.3 for women. In Denmark, with a 1995 standard retirement age of 67 for both sexes, the mean actual age was 62.7 for men and 59.4 for women.[131]

The perverse incentives which encouraged these outcomes in many pension and social security systems,[132] were established when the present adverse demographic trends were not so clear. They can, of course, be adjusted, although not retroactively. However, these incentives to early retirement did not develop in a vacuum. As older workers were displaced, these measures (paid for by the taxpayer rather than the employer for the most part) eased their transition. In the absence of a macroeconomic framework providing an adequate growth in the number of jobs, reversing the downward trend in the actual retirement age would simply shift the present fiscal burden of pensions to a different part of the social security system.

In addition to early retirement, disability pensions have also been increasingly granted in recent years, to workers at pre-retirement ages. In addition, persistent and high levels of unemployment in many countries of the ECE region have further increased the system dependency ratio, as have declines in the labour force, both of these developments decreasing the denominator of the system dependency ratio. The only countervailing tendency to these unfavourable trends has been the rise in the labour force participation of women.

The relative advantage of the transition economies in purely demographic terms (in part, because of their significantly lower life expectancies) has been entirely overwhelmed by the rapidly accumulating stresses on their pension systems resulting from the transition process. The dramatic drop in employment throughout the transition economies is clearly the outstanding variable creating manifold problems. In central and eastern Europe and the Baltics employment is 20 per cent lower than a decade ago.[133] This swift decline created immense pressure to use the pension system as a safety valve to relieve some of the pressures of escalating unemployment, at exactly the same time that the ranks of contributors were, of course, being thinned. Added to this are problems for the pension system such as the growing informalization of the labour market, the integration into the system of the increasing numbers of the self-employed and workers in very small firms and, in many countries, periods of relatively high inflation. In this atmosphere, and with high adult mortality, it was politically difficult, and remains difficult in some cases, to raise the prevailing low retirement ages. (Except in Poland, these were 60 for men and 55 for women.) Thus, despite a generally less acute rate of population ageing in the immediate future, most transition economies faced a more acute and immediate crisis.

This development underscores the fact that the non-demographic influences on the system dependency ratio can easily outweigh the underlying demographic trends. Moreover, policy answers can more easily be found in the economic than the demographic sphere.

Is "PAYG" versus "full funding" the key issue?

The focus of the pension reform debate, until the present time, has not, however, concentrated on these issues, that is, it has not concentrated on prospects for reducing the system dependency ratio to virtual equality to the old age dependency ratio. The focus has, instead, been on the search for a solution to the "PAYG" dilemma through increasing the weight within a mixed system of what is called a mandatory "fully-funded" (FF)[134] "pillar", in which assets are accumulated in a fund or funds, from which pensions will eventually be paid.[135] A sharp increase in the weight of such a "second pillar" would imply a shift from a "defined benefit" system towards a "defined contribution" scheme. In such private pension funds, there is no defined benefit, since the benefit is a function of the actual market rate of return on the assets in which the contributions have been invested.

While the two different approaches are considered to have different risks, and different apparent political advantages, all the speakers at the opening session of the

[131] S. Blöndal and S. Scarpetta, *The Retirement Decision in OECD Countries*, OECD, Economics Department Working Papers, No. 202 (Paris), 1999, pp. 53 and 60.

[132] S. Blöndal and S. Scarpetta, ibid., demonstrate "that old age pension systems discourage work at older ages in virtually all OECD countries", p. 7. They argue that removing work disincentives could increase labour force participation rates in the 55-64 year old group by 8 or 9 percentage points in some countries and 4-6 in others. The problem, of course, as the authors note only briefly, is that "these reforms could pose [a] considerable challenge to OECD labour markets".

[133] UN/ECE, *Economic Survey of Europe*, *1999 No. 1*, p. 204.

[134] Sometimes just "funded", or "advance funded".

[135] There is nothing ironclad about the association of PAYG with public systems and funding with private ones. There are, though, it would seem, some reasons why they might usually be paired in just this way. Most notably, historically those advocating alternative pension policies, unhappy about a reliance on public provision, have been even *more* unhappy about the thought of an accumulation of a large *fund in state hands*. Recently Milton Friedman was particularly fierce in his objections to such a public fund: in the *Wall Street Journal*, 26 January 1999, he argued that if United States Social Security contributions had been invested in the stock market (along the lines of President Clinton's recent proposal) from the start of that public pension system in 1937, then the total trust fund at the end of 1997 would have totaled $7 trillion and he concludes that, as this would be worth more than half the value of domestic corporations, "full funding would have long since brought complete socialism"!

Seminar showed in various ways that neither can alter the fundamental macroeconomic issue: namely, that the consumption of pensioners involves a transfer of goods and services from the working population in exchange for the financial claims held by the former, and that if people live longer they will have to accumulate more of such financial assets (including pension rights) during their working lives. Whatever system is in place a balance will have to be achieved between the demand of pensioners for current goods and services and the demand of workers for financial assets. For this reason, the debate over the relative weight of the pillars in a mixed system ought not to dominate debates on pension reform.

The Spring Seminar shifted the emphasis of the discussion from the "fully-funded" versus "pay-as-you-go" (PAYG) debate, to territory where the answers to many of the problems seem more likely to lie. In particular, a key point, which was repeated again and again in the Seminar, is that *it is in the labour market that the majority of effective responses to the problem of too great a call on resources to support the dependent elderly will be found*. These changes, and changes in perverse tax, benefit and incentive structures, need to take place in a macroeconomic environment which encourages growth with employment creation.

A number of speakers pointed out that the "PAYG" versus funding debate had been heavily influenced by a desire to see pension schemes solve the problem of sluggish economic growth, not a task they were designed or well-equipped to do. Clearly, however, addressing the problem of economic growth and enhancing labour productivity will help to alleviate the pressures on pension systems.

A second major conclusion of the Seminar was that the *present systems could frequently be reformed successfully with sensible parametric changes*, but that the wisdom to do this was not so widely distributed as might be hoped. (A parametric change alters one or more parameters of an existing system, such as the minimum retirement age or the contribution rate, as opposed to a more radical change in structure.)

A reform as straightforward as the European Commission's proposal to raise the pension age by two years, if effective, could have a fairly dramatic effect on the ratio of retirees to the labour force. In his contribution (discussion of chapter 2) Colin Gillion presents a table which estimates that several OECD countries could reduce the ratio by about 3 to 8 percentage points in 2035, if they could only achieve the current effective retirement age in Japan. The considerable impact of such a measure may be gauged by looking at the striking difference for the year 2000 between the proportion of a country's population which is over 60, and that which is over 65. For Italy, a country where the dependency ratios are a source of considerable concern, 24.2 per cent of the population is projected to be over 60, but only 18.2 per cent over 65, that is one quarter less.[136] For the United Kingdom, the corresponding figures are 21 and 16 per cent, and for the Netherlands 18.4 and 13.8 per cent, a somewhat sharper fall.

The first of the conclusions highlighted above, that most of the answers to the pensions problem lie first of all in the labour market, was not disputed by any of the Spring Seminar's participants. The second conclusion, the argument for greater emphasis on improvement of the existing systems, was the subject of some serious debate. The controversy over whether to move to a multiple pillar system with much less emphasis on PAYG was most intense in the consideration of economies in transition: should they aim, as Hungary and Poland have, for the decisive development of a large second, privately managed but mandatory pensions "pillar",[137] very much along the lines of the formula advocated by the World Bank in *Averting the Old Age Crisis: Policies to Protect the Old and Promote Growth*,[138] which advocates reducing the role of the public pension system. As other contributions to the Seminar made clear, many of the issues for the transition economies are also highly relevant for established market economies such as Austria and Germany, where the public pension system is dominant, and where radical reform is one of the options being debated. The range of views on this issue – many of which, but not all, were sceptical about the claims for enhancing the second pillar – are summarized in this introduction.

Where participants either advocated or accepted as given a "multi-pillar" reality, the question of the relative weight of the pillars obviously assumes importance. A number of times this point, and the precise design of the system and its management, were singled out as qualitatively more important than the financing mechanism, but the debate nonetheless often returned to the question of the funding mechanism.

In debating this question a third key point was highlighted: *the transition from a system centred on the "first (public, PAYG) pillar" to a mixed system, with heavy weight being given to a "second pillar", that is a funded, usually privately managed system, can be difficult, to the extent that there appears to be a new*

[136] United Nations Population Division, *World Population Prospects*, op. cit., p. 240.

[137] The language of "pillars" and a "multi-pillar" system was given wide currency by the World Bank in *Averting the Old Age Crisis* …, op. cit. In fact, the terminology comes from the Swiss pension system developed after the Second World War. The first pillar is the mandatory public pension system. The second is a mandatory, but privately run, additional system. The third pillar is an additional voluntary system for old age security (which may or may not have tax advantages). A recent Swiss development is to encourage the development of a "fourth pillar", namely the ability to continue to work beyond the normal retirement age.

[138] Most categorically in the recommendations on pp. 244-246.

"double" burden. The first generation of workers under the funded scheme will be making pension contributions as savings for their old age: there will be no fresh generations making contributions to support them when they retire. At the same time, however, the effective debt to existing pensioners, and workers soon to retire, must continue to be paid. Unless there is some extraordinary one-off financing arrangement to meet the obligation to older workers, existing workers will normally have to save for themselves *and* be taxed for the pensions of retired workers,[139] or else there will be a shortfall in funds for the latter.

If, instead, the financing for the new burden is met by borrowing then, of course, the claims for the superiority of funding to promote investment and growth (see below) simply vanish, and the macroeconomic equivalence of the two systems is even more evident. Because of this "double burden", any a priori arguments as to the value of a multi-pillar system must be weighed against the considerable transition cost of moving from the existing arrangements.

These, then, were the dominant and recurring issues in the Seminar discussion: the real possibility of adjusting existing systems through parametric rather than radical changes; the need to look at system design and management rather than just the financing mechanism viewed broadly; the fact that the financing mechanism does not change the issue of the macroeconomic burden of an ageing population; the importance of altering labour market behaviour by raising the mean effective age of retirement and increasing the pensions base, and by altering incentive systems, particularly taxes, which discourage continued participation in the labour force (full or part-time) beyond the present retirement age; and, finally, the need for caution about the cost of moving from one pension system to another.

Each of the Seminar's four sessions approached these issues in different ways and in each significant points were raised. A summary of each session in turn may therefore be useful in understanding the development of the debate.

Macroeconomics of pension reform

The first session of the Seminar, on the macroeconomics of pension reform, began with a paper by ***John Eatwell***, who argued that a shift to funding of pension systems will do nothing in itself to solve any of the macroeconomic burdens placed on pension systems by the demographic and other developments outlined above.

The starting point of his argument was a formal demonstration of the identity of the macroeconomic impact of both PAYG and funded systems. This argument was supported by all three of the discussants for this first session, ***Colin Gillion, D. Mario Nuti*** and ***Thomas Weiss***.

The essential economic logic of this basic argument may be illustrated by noting what will happen if a large cohort of workers (such as the "baby boom") retires in a funded system and all attempt to start spending their pensions at once.[140] This dissaving of a large generation, out of "accumulated funds", may easily exceed the savings, largely taking place as pension fund contributions, of the succeeding, smaller generation now in employment. At any given level of output, this dissaving will thus result in inflationary pressure which, in turn, will reduce the real value of the pensions now being received.

Thus, the effect of demographic pressure under a funded system is entirely parallel to what would happen in a PAYG system in which the system dependency ratio increases: more claims on existing resources than resources available to meet those claims. The mechanism which resolves this imbalance under funding has the political "advantage", Eatwell noted, of being less transparent. As he observed ironically in his summing up, in reply to Mikhail Dmitriev, a floor speaker who is a strong proponent of funding, inflation has the virtue that "you can impoverish pensioners to the required degree".

Given the basic identity in broad macroeconomic terms of the two systems, the real choice between them, Eatwell noted, should be made on the basis of other characteristics, such as the institutions to which they give rise, the risks they involve, or their perceived dynamic advantages, such as promoting or impeding growth.

Reviewing these characteristics, and the existing empirical evidence, Eatwell did not find support for the view that fully-funded pensions would enhance savings or economic growth, and noted a series of other problems, "weighty disadvantages", which argued for caution in embracing this type of solution.

In the course of the discussion in this session there was no challenge to his conclusion that hopes for full funding as a cure for lagging growth or problematic savings rates were misplaced, and that, whatever system is chosen, there will be a need to ensure that there will be no covert cut in the value of the pensions of the poor.

[139] Some argue that this situation does not involve the actual creation of an additional second cost; rather this second cost is made transparent in the shift in systems. There has already been the accumulation of liabilities owed to present pensioners. Their previous contributions had been used to pay others' pensions at the time, rather than being accumulated. Maria Augusztinovics argues in her paper (chap. 4), that the contributions formerly going to the state are normally channeled to financial markets.

[140] This is first argued in depth in N. Barr, *The Economics of the Welfare State* (London, Weidenfield and Nicolson, 1987), chap. 9. The argument can also be found in "Retirement pensions", in N. Barr and D. Whynes (eds.), *Current Issues in the Economics of Welfare* (London, Macmillan, 1993), pp. 45-46.

The relative evaluation of the differing risks under each system was somewhat more controversial for some speakers from the floor, who placed more hope in the promise from a transition to funding.

The three invited discussants in this session, however, agreed with Eatwell's basic arguments. Colin Gillion, head of the ILO's Social Security Department, offered an alternative presentation of the basic point about the macroeconomic equivalence of PAYG/funding transfers, and was the first to note the potential double cost of shifting from a PAYG system to a funded one. Gillion's distinctive contribution, however, was to focus the Seminar's attention on *the importance of labour market measures which change dependency ratio*s, a crucial parameter in the system presented by Eatwell. A shift in dependency ratios could be achieved by an increase in retirement age and/or a rise in female labour force participation rates, and would be much more effective than tinkering with pension systems.

D. Mario Nuti extended Eatwell's discussion on the doubts about the claimed advantages of fully-funded systems and, in particular, questioned whether they necessarily lead to higher aggregate savings. This, he noted, was an empirical issue, and one which remains controversial or unclear. There is even work, he noted, which suggests that a shift to a funded system may lead to a fall in aggregate savings. He was also concerned about the potential short-termism and volatility associated with financial investments in a funded system. Coming to the "double burden" issue, he singled out as a means of avoiding this Sweden's pension reform, which improved a PAYG model, but did not change it radically, adding "virtual" or "notional" individual accounts with the merit that they made a pedagogic link between pension contributions and subsequent rights.[141]

In countries with economies in transition, Nuti thought it was important to bear in mind that the effective functioning of a funded system will be constrained by the insufficient development of financial markets and the associated limited scope for portfolio diversification. On the other hand, pension funds themselves might help to promote the further development of domestic financial markets.

Nuti stressed that it was necessary to avoid contrasting an ideal fully-funded system, which as yet existed only on paper, with a poorly managed or designed PAYG, and then choose the former. The issue of how a system is managed and configured could very well be the key, and not the abstract typology.

The third and final discussant of the first session, Thomas Weiss, not only agreed with the basic point on the macroeconomic equivalence of PAYG and the funded system but observed that it had already been demonstrated in the 1950s,[142] and had been well known in Germany. He went on to note that the issue of pension reform has been the subject of intensive debate in Germany over the past decade without, however, any agreement being reached to date on a comprehensive reform package. He too supported the point first made by Gillion, that at present it is unemployment and labour force developments which are more important in their negative impact on pension system viability than population ageing.

The current German system is a multi-pillar one, the principal pillar of which is the public, PAYG system, although there is discussion about enhancing the second and third pillars. An important feature of the German landscape are company-based, or occupational, funded pension schemes, to which Weiss devoted much of his comments. The importance of these latter schemes, he noted, is actually declining, as a result of being squeezed from two sides. Employers are increasingly reluctant to shoulder the risks associated with the corresponding financial commitments (in benefit defined systems) and, for workers, increased labour mobility has reduced the attractiveness of these schemes.

Jorge Braga de Macedo began the floor discussion by suggesting that the framework developed by Eatwell (and, implicitly, supported by the other discussants) did not take adequately into account the intertemporal dimension of savings. He would have liked to see more reference to the intergenerational accounting framework developed by Laurence Kotlikoff for analysing the problem of pension financing. (This conceptualizes pensions as the equivalence of subsidies from young savers to old spenders.)[143]

[141] The Swedish reform also provides for a small component (2.5 per cent out of a total of 18.5 per cent of income deducted) which is actually funded. See Swedish Ministry of Health and Social Affairs, *The Pension Reform – in Sweden*, Final Report (Stockholm), June 1998. This "notional defined contribution" model has as its basic component, a pay-as-you-go system with the basic characteristic that pension rights, which should be equal to contributions paid into the system, are registered; these rights are then accumulated under an indexation rule which is to be linked to economic growth; the contribution rate should be able to stay constant (presently 16 per cent of earnings); from 1999 every person above age 30 will also receive a forecast of their pension. For some additional details on minimum pensions, see J. Palme in the discussion in chap. 3 below.

[142] G. Mackenroth, "Die Reform der Sozialpolitik durch einen deutschen Sozialplan", in G. Albrecht (ed.), *Verhandlungen auf der Sondertagung des Vereins fuer Socialpolitik* (Berlin), 1952, pp. 37-76. The work of Mackenroth substantially predates the well-known discussion of P. Samuelson, "An exact consumption-loan model of interest with or without the social contrivance of money", *Journal of Political Economy*, No. 66 (Chicago), December 1958, pp. 467-482, to which Weiss also referred.

[143] See, for example, A. Auerbach, J. Ghokale and L. Kotlikoff, "Generational accounting: a meaningful way to assess generational policy", *Journal of Economic Perspectives* Vol. 8, No 1, 1994, pp. 73-94; L. Kotlikoff, *Privatization of Social Security, How it Works and Why it Matters*, National Bureau of Economic Research Working Paper, No. 5330, October 1995; and also D. De Lucena and J. Braga de Macedo, "Reforming social security: efficiency and governance", in J. Braga de Macedo (ed.), *Sustaining Social Security* (United Nations publication, Sales No. E.97.IV.3), pp. 74-95.

In responding to this point, at the end of the session, John Eatwell simply noted that the intertemporal accounting framework was, in his view, irrelevant to the macroeconomics of pension reform.

Three contributions were made by participants coming from countries with economies in transition, where the pension reform discussion is particularly salient. ***Simona Marinescu*** of Romania, giving a capsule view of the pension reform process in her country, was optimistic about moves to shift the weight from a first to a second pillar, and hoped this would also provide much-needed investment funds. ***Nina Presern*** of Slovenia and ***Mikhail Dmitriev*** of Russia, shared a concern about the "political economy" of pensions, by which they meant in particular the problem that pensioners were able to wield substantial electoral power, and thus, in their view, would be able to block needed reforms. Dmitriev clearly drew the conclusion that a fully-funded system would avoid this risk.[144]

In reply to Marinescu, John Eatwell noted that the level of future pensions will be determined by the rate of return on the investments made by these funds, and this is much more uncertain. (An important difference in standpoint between Eatwell and Marinescu was also reflected in the next session, in which both Lawrence Thompson and Joakim Palme, like Eatwell, explicitly held the view that pension systems were first of all for providing security in old age, and only after that should their other economic effects be considered.) In his reply to Dmitriev, Eatwell made it clear that he did not consider the main longer-term risk to be too much concern for pensioners, but too little, a point which had been underscored in his paper.

Pension reform in market economies

The second session of the Seminar focused on more detailed issues of pension reform in established market economies. The main paper, by ***Lawrence Thompson***, and the comments by ***Johann Brunner, Joakim Palme*** and ***Andras Uthoff***, all reinforced themes raised in the first session, while adding fresh material.

Lawrence Thompson's paper offered a comprehensive survey of the choices available, and underscored in its conclusion that all choices have risks. For this reason Thompson himself, urging risk aversion, prefers a system which mixes "pillars" (PAYG and FF, public and private), in order to have a balanced "portfolio" of the political risks from PAYG and the economic from FF.

Although all three discussants basically agreed with Thompson, there were important differences of emphasis. Brunner wondered whether the caution expressed by Thompson (and Gillion before him) about the transition difficulties of any all-out switch from PAYG to funding might also apply to any partial switch in existing systems, such as those in Austria and Germany, which depended heavily on a public PAYG system.

Joakim Palme also warned that there could be a substantial social cost in moving away from a comprehensive first pillar. He observed that for national pension systems seeking to reduce the public pillar to a "safety net",[145] the empirical evidence suggests that these *ex ante* "targeted" models will actually do less for the poor elderly. The underlying mechanism for this he terms "the paradox of redistribution", in which the share available for redistribution in a democracy will shrink in such a targeted system, arising from a growing indifference towards the state pension on the part of middle-income groups who no longer believe their old age security has much to do with the public PAYG system.[146] In the end, this means that the "targeted" zones will be neglected, and thus the "targeted" poor actually receive less than in a more "encompassing" welfare regime. (Hence the paradoxical aspect.) On the other hand, a public pension system which includes a considerable earnings-related component, although seemingly more unequal, may encourage virtually the entire population into identifying the system as theirs.

Thus, these first two discussants were, in different ways, somewhat less enthusiastic about a plurality of pillars than Thompson, while endorsing his basic outlook. Each, additionally, raised other points. Brunner further stressed, similarly to Eatwell, the distributional consequences of reform, which are not necessarily explicit in the debate, indicating that they must be addressed.

Palme also called attention to the way in which the Swedish reform has been designed, in order to avoid disincentives for savings. (The question of the trap provided by perverse incentives in means-testing has, of course, wider applicability.) The need for the careful design of reforms was part of the background for his opening point that there was a danger of winning the battle against the extreme utopian view of fully-funded

[144] V. Tanzi, "Global pension reform: the challenges", paper delivered at a conference on "European Pensions: The New Challenges", organized by the Royal Institute of International Affairs, in association with the European Federation for Retirement Provision, Chatham House (London), 26-27 April 1999, p. 9, has argued against this view that political pressure can equally be brought to bear on a privately administered defined contribution system if, for example, the average rate of return is low. Additionally, as Mario Nuti noted in his contribution, there is the obvious expectation (and accompanying moral hazard) that a pension fund facing difficulties will be bailed out. In the case of a mandatory, but privately run pillar, this pressure is evidently even greater.

[145] This is the objective in World Bank, *Averting the Old-Age Crisis,* op. cit., p. 16, "the public pillar would have the limited object of alleviating old age poverty and co-insuring against a multitude of risks".

[146] One British expression of this is E. Davis, *Public Spending* (Harmondsworth, Penguin, 1998), p. 260, "everybody has tended to feel as though the issue of the state pension will gradually fade, as it becomes a smaller and smaller proportion of average earnings".

reform and yet losing the war against other threats to old age security.

Andras Uthoff presented a succinct critique of the Chilean reform, which is frequently idealized and surrounded by many myths. In doing so, he was criticizing a system which has only a residual first pillar, a more extreme form than many. He was careful to note that many other newly-designed Latin American systems had developed multi-pillar alternatives, but his critique of the Chilean model was seen by some as a critique of funding more broadly, simply because this model has been used so often to argue for some major element of funding.

He argued that many of the claimed successes in Chile are unrelated to the pension reform, and that some of the earlier claims, such as high yields, have simply not been maintained. His discussion of the pension fund managers' market reinforces points made by Thompson on the shortcomings of the "defined contribution" model, and the possible high administrative costs of funds. Thompson had estimated that a combination of administrative costs and the mortality factor, the fact that such funds do not add to the returns of survivors when other participants die, could decrease annual rates of return by 1.5 to 2.5 percentage points. A recent study of individual (decentralized) accounts in the United Kingdom found that 25 per cent of the value of an account would be dissipated simply in fund management and administrative costs, and that is just for the deduction incurred by a worker who contributes to a single fund throughout his/her career.[147] Uthoff notes that administrative costs, including the purchase of life insurance, have remained close to 30 per cent of the amount contributed to the fund.

In the floor discussion, Mikhail Dmitriev challenged the distributional justice of the Swedish reform, suggesting that it would be regressive, benefiting the well off, who live longer in any event. Palme countered, in his reply, that he and others had analysed precisely this issue for Sweden, and had not found this to be so. One important reason for this is that social insurance based pensions also redistribute in favour of women, who are longer-lived, but also poorer.

In summing up, Thompson noted again that the precise choice of mix for a country depends on many unique country characteristics, and that a "one size fits all model" would be inappropriate. Some of the differences which emerged during this session undoubtedly reflect these national differences. This was true to an even greater extent in perhaps the most vigorous discussion of the day, on pension reform in transition economies.

Pension reform in transition economies

Although the economies in transition in the ECE region do not yet face the ageing question as acutely as western Europe, the need to adapt pension systems to the conditions of market economies has provided an even greater challenge than that facing established market economies. In addition, the World Bank has been highly active in promoting radical pension reform throughout the region, offering design and large loans for the purpose. The IMF, more acutely aware of the high fiscal costs in moving from a pay-as-you-go to a funded system, and the need in any funded system for a legal and institutional infrastructure for adequate regulation, has been substantially more cautious than the World Bank in this regard.[148]

Maria Augustinovics concentrated her presentation on three major topics selected from her paper. (The paper itself is deliberately more wide ranging, as it presents pension reform in the broader context of the more fundamental central and east European transformation and deep recession, and the continuing difficulties in these countries. The need for such a context was well illustrated by one of her remarks on distributional problems: "In any event, it is very difficult to cut a cake which has been shrunk 20 to 40 per cent".)

She first discussed the critical gap in these economies between the demographic ratio and the system dependency ratio (defined above). This gap exists in all economies, but it is particularly marked in this region, and has been growing. Much increased recourse to early retirement, increased use of disability pensions, a sharp change in labour force participation rates, and the emergence of mass unemployment have dramatically increased the system dependency ratio in a short period of time. (In this it might be noted that there is nothing unique to the transition economies, but that it is the very pace and size of the changes which have produced the difficulties.)

Her second section examined a distinctly different subject: a critical typology of pension systems. Noting that many consider the choices as binary, with public, PAYG, defined benefit systems set against privately managed, funded, defined contribution systems, she

[147] This is from a thorough empirical study of the high administrative costs possible in individual pension accounts; see M. Murthi, J. Orszag and P. Orszag, *The Charge Ratio on Individual Accounts: Lessons from the UK Experience*, Birkbeck College Discussion Papers in Economics, No. 2 (London), 1999. For a critique of the view that the United States pension system, Social Security, would pay more if it were converted to a funded system, see J. Geanakoplos, O. Mitchell and S. Zeldes, "Would a privatized social security system really pay a higher rate of return?", in R. Arnold et al. (eds.), *Framing the Social Security Debate: Values, Politics, and Economics* (Washington, D.C., Brookings Institution Press, 1998). The most accessible in-depth analysis of these issues can to be found on the internet website of Sebago Associates (www.sbgo.org).

[148] See for example, Tanzi, op. cit. and M. De Castello Branco, *Pension Reform in the Baltics, Russia and Other Countries of the Former Soviet Union (BRO)*, IMF Working Paper WP/98/11 (Washington, D.C.), February 1998. This cautious approach also characterizes the pension discussion in the World Bank's *World Development Report 1996, From Plan to Market* (Washington, D.C.).

pointed out that a more complex approach is necessary in reality. She argued that two basic parameters, the replacement rate (the ratio of the pension to the previous wage) and the level of redistribution among pensioners were what mattered most for a useful classification of differing systems.

The third part of her presentation, and the most controversial, concerned the reforms being carried out in Hungary and Poland. She expressed serious doubts about the long-term viability of these systems, whose financial future, she argued, was not at all assured. This discussion emphasized even more strongly a point made several times previously about the risks of pension system changeover in *all* countries.

The first discussant***, Jerzy Hausner***, who has played a major role in the Polish pension reform, made a careful restatement of the points in the Augustinovics paper, which he praised while opposing some of its conclusions. In particular, he argued that reform of the PAYG scheme is needed not to "cut" pensions but to assure the sustainability of the system. This argument, if accepted, would meet Thompson's criterion for an "extraordinary moment" in which the risks of a switchover are worth it. The system was in financial crisis, but political pressures and vested interests have hampered more radical change of the PAYG scheme, Hausner argued. Hence he considered that establishing privately funded pension schemes in parallel to PAYG was highly desirable if not in fact absolutely necessary.

Hausner argued that the two-pillar system would be more efficient for economies in transition. The introduction of a second pillar – privately funded pension schemes – would have a positive impact on the fiscal gap and on economic growth. The development of this second pillar, he felt, would promote the necessary change in savings and increase fixed investment. He also suggested that there was a need for some indexation mechanism for the PAYG scheme during the transformation period. Hausner's choice was strongly influenced by his assertion that no government should have monopoly power in this, or other, spheres.

The second discussant, ***Romas Lazutka*** of Lithuania**,** agreed more with Augusztinovics than with Hausner. He favoured the arguments for reforming the PAYG scheme via "parametric" adjustments. He concentrated on the PAYG scheme in Lithuania which was established in 1994. He stressed that pensions based on the PAYG scheme actually account for some 6 per cent of Lithuania's GDP. The contribution is based on a 23.5 per cent wage tax while the average benefit amounts to 40 per cent of earned salary. He also pointed out that there is enough room for voluntary pension savings.

He considered that the low pension age carried over from the previous economic system and other problems inherited from the old order (such as the formula for determining the wage on which the pension is calculated) present the key problems today. He argued that it would be a pity if resources were used for risky experiments when more straightforward solutions were at hand. He agreed with Mario Nuti that the nature and weakness of existing financial and legal institutions also had to be taken into account when hoping for benefits to growth via enhanced savings and investment.

The third discussant, ***Paul Wachtel,*** reminded the session of the major shortcomings of public pension schemes. He suggested that the disarray in many present PAYG schemes offered an opportunity for the acceptance of private, funded schemes. Wachtel's preference in the choice of public or private was clearly expressed: that state is best which governs least. He agreed with previous speakers who pointed to the problem of transition costs, and also with those who said that each country must choose its own mix. However, he saw an opportunity at present for fully-funded systems to have an auspicious start.

In the floor discussion, ***Gregorz Kolodko*** (former Minister of Finance of Poland) agreed strongly with Hausner, and argued against Augusztinovics. He stressed that the existing system had to be completely scrapped. Kolodko went on to note that only a growing economy can carry out a successful reform of its pension system. He observed that the transition from PAYG to privately funded schemes is also costly and may have difficulties in delivering what it offers, due to lack of fiscal discipline, mismanagement, and the fact that existing capital markets are weak and will not be able provide for enough investment projects.

Kolodko noted what Augusztinovics in fact observed in her paper, that population ageing is not yet such a serious problem in countries with economies in transition. ***Vladimir Shimov*** of Belarus also referred to a decline in life expectancy in some countries in the region, as had other participants, such as Kolodko. A comprehensive strategy for future development is needed, using this breathing space.

Peter Mihalyi argued that there were often political interests which made it very difficult to reform the existing PAYG systems. Responding to this resistance in Hungary, however, did lead to a better system in the end, he felt.

Mihalyi noted that (as others, starting with Nuti, had observed), the difficulties often encountered lie in the detailed administration of these systems, not their generic type. He shared Hausner's view that as long as PAYG is a monopolistic system it is difficult to guarantee that it will provide an adequate result.

Jan Mladek of the Czech Republic observed that his country had *fortunately* not yet started the transition to mandatory funded pension schemes. This was good, according to him, as the experiment with voucher privatization was enough. The crucial question, he insisted, was whether the funded systems really bring new savings and investments into the domestic economy? Globalization and capital market opening, more often than not, provide for the flight of these investments out of the country,[149] he suggested.

At the end of the discussion, Maria Augustinovics suggested that the empirical evidence provided in her paper was against Hausner. Noting Wachtel's remarks on contribution evasion, bad management and perverse entitlements, she stressed that occupational privileges (early retirement for those working in difficult conditions) are, however, not always bad. To Kolodko she suggested he look at existing west European pension systems which, to one degree or another, are dominated by PAYG.

Another aspect of Hausner's comments – a "generational war" approach as she rephrased it – is not right she believed. The pension system is a social institution with such a long time focus that is best satisfied by an unwritten contract between generations. In any case, the well-being of the elderly always depends on the rate of economic growth.

Finally, to Paul Wachtel, she offered her deep scepticism about the promises that pension funds would bring growth. Of course, some contribution revenue can be redirected and reshuffled to privately funded schemes, but for at least 15-20 years pensions will have to be paid out through PAYG in the transition economies. The privately managed funds will not pay any benefits for another 15-20 years, and they will just drain PAYG systems and may even put them into bankruptcy.

Jerzy Hausner replied that improving existing PAYG schemes might not only be difficult because of political feasibility, but that any improvements might be short-lived. He predicted that any public PAYG scheme would tend to deteriorate again because of its monopolistic situation.

Romas Lazutka argued that arguments about potential PAYG bankruptcy and its monopolistic role were not convincing for a public institution in a democratic state. The PAYG schemes managed to survive in a period of a very sharply declining output in the transition economies, he observed, but almost certainly that would not have been the case with privately funded schemes.

Paul Wachtel agreed that a single privately funded pillar in the pension system (à la Chile) is premature for the transition economies but insisted that a mixed system is necessary. He added that it is important to ensure that pension reforms are carried out together with restructuring of the enterprise sector.

In reply to Maria Augusztinovics' argument that pension schemes are not designed as institutions for economic growth, but have other goals which must be given priority, he agreed that the pension system cannot be the engine of growth, but it can nevertheless provide it with a powerful impulse.

It is striking that the position of many of the speakers reflected to a significant extent their tastes and preferences about the role of the state. In particular, the profound distrust of all state machinery appeared in virtually every contribution from Poland. This may, however, reflect not fundamental considerations of political philosophy, but unhappiness with the present state of public administration or the legacy of history.

John Eatwell referred at the outset of his paper to the seminal contributions of Nicholas Barr in demonstrating that market failure necessarily characterizes the market for pensions. Given this, there is arguably a strong role for the state. A number of the participants in this session, however, when weighing the serious risks and dangers of going through a period of "double burden", as spelled out by Thompson and many others, still opt for the private sector in large measure because of their fear of state monopoly.

In this particular debate, therefore, it was evident that the experience to date of many participants from transition economies had not led them to place any degree of trust in public administration or in the oversight functions of government. Apparently not yet envisioning a government responsible to the electorate as a whole, from this pessimistic vantage point they could see no strategy for the further development of a democratic state, at least in this regard. Accepting that there are a number of areas where state monopoly is necessary, notably in military and police functions, the tendency of democratic societies is to put any monopoly under the supervision of elected governments, subject to oversight.

A round table was organized to close the Spring Seminar by considering the prospects for pension reform in the light of the aftermath of the international financial and economic crises of 1997 and 1998. The chair, ***Jean-Michel Charpin*** and the panellists, ***Jiri Rusnok, Brigitte Granville, Tatiana Maleva*** and ***Daniel Wydler***, differed to a considerable degree on two central questions. The first was whether the now much more apparent risk of financial instability poses a serious challenge for the switch to systems which emphasize funded pension schemes. The second question was whether the growth of pensions funds, and the pressures upon fund managers to achieve competitive rates of return may themselves be a factor leading to greater financial volatility.

[149] It is not widely advertised, but most of the better known funded pension systems, such as the Chilean, sharply restrict the right of pension funds to invest outside their own country.

At one end of the spectrum of views, Daniel Wydler emphasized that market risk is manageable, at least for countries with a well-developed investment culture, regulatory and corporate institutions. Thus he argued that the recent crises are normal events with which pensions funds, as complex asset management institutions, can cope. He also felt that regulation of such funds was an inherently easier exercise than supervising the public sector. Thus he did not consider that recent events contained any lessons or implications for a move to funded systems in established market economies.

For transition economies, however, and for any countries contemplating major shifts, he did stress that only a gradual approach would allow the necessary institutional development. (The problem, as he phrased it, is that to develop the right investment culture you need the instruments, so that he saw it as a "chicken and egg" dilemma.) Wydler, reflecting on the day's discussion, suggested funded pensions might better be introduced initially on a defined benefit basis. However, during the subsequent discussion, while he stated that he did not share the view that pension fund managers would generally be the cause of a deviation from economic fundamentals, he did admit the possibilities, emphasized more by other panellists, that both short-term pressures on fund managers and "herd behaviour" in emerging markets, might indeed create a risk of introducing additional volatility.

The session's chair, Jean-Michel Charpin, Commissioner at the French Planning Office and author of the "Charpin Report" on reforming the French pension system, on the contrary, thought that this potential for increased volatility was a major concern, requiring serious further consideration. He also observed that, as there are clear financial risks facing funded schemes and no clear empirical demonstration of the superiority of either PAYG or funded systems, a policy aimed at risk minimization suggested a gradual approach, one which sought to choose elements from both systems and to pay particular attention to the effects of transition from one system to another.

At the other end of the range of assessments from Wydler, Brigitte Granville offered a much more pessimistic outlook on the private management of risk, without, however, suggesting that public debt is superior. She made the point that in the end a pension is "nothing more than a debt", and that in the end the viability of such a process depends on the willingness of creditors to roll over the debt. She noted the increased uncertainty as a result of the recent crises, and argued that a country's markets may not be immune to it even if the "fundamentals" are right. She further argued that the quest of fund managers for competitive returns from global instruments has raised the question of whether emerging markets can provide the returns expected. Pointing out that the Asian crisis has demonstrated that private debt is as important as public debt as a source of country default, she also cited a range of international authorities who, in their search for explanations of the string of crises which began in Thailand in June 1997, had suggested that weak growth in Europe and Japan had been one likely explanation for the avid search for more alluring returns abroad.[150]

Jiri Rusnok, drawing on experience in the Czech Republic, where a voluntary (though subsidized) additional funded scheme had been introduced, and where reforms within the existing PAYG system had proven effective, was also among those who argued that the present worldwide financial uncertainty definitely increased the risk of a switch to a funded scheme. He stressed, however, that the Czech government is continuing to examine all the possibilities, thus supporting the overall sentiment of the session that gradualism, caution and institutional development had to be the watchwords of policy. Rusnok noted that perceived financial risk is part of a political barrier as well, combined as it has been in his country with a certain backlash of popular disenchantment with the method of privatization followed.

Tatiana Maleva, drawing on recent Russian experience, was the most pessimistic of the panellists. While stressing that pension reform in Russia, as in all transition economies, was both desirable and inevitable, she stressed that the recent crisis had underscored that neither the public nor the private financial sectors were immune from acute difficulties. In considering the problems of Russia, which were much the same as elsewhere although more intense, she noted the particular problem of the "double burden" in any transition to funded schemes, which is exacerbated by the economic blows which had fallen on the population (including a very high inflation tax), exceptionally wide inequalities in the present distribution of wages and incomes, and very sharp regional differences in prices and wages. She was sceptical that a shift to funding would reduce the high level of informality in the labour market at present, which is among its normally perceived advantages; rather, she thought that the reverse might be the case. She also suggested that, in present conditions, even if increased savings were encouraged by funding it was not clear that they would lead to productivity-enhancing investment.

She called attention to the present low level of life expectancy, with mortality increases having hit working-age males most sharply. However, she added, that much more attention needs to be paid to gender asymmetries implicit in any pension system, a topic which demands further research.

[150] Note that the recent development of a falling supply of long-term government bonds in, for example, the United Kingdom and the United States, may also have negative implications for pension fund portfolios.

More generally, greater emphasis on fundamental labour market developments appears to have considerable potential for dealing with the pensions problem. It is clear that higher rates of growth of labour productivity would alleviate some of the present pressure. Appropriate investment in education and training would thus be a clear policy priority everywhere, particularly, but not only, in the transition economies.

As Jean-Michel Charpin noted in summing up, although the present pension debate had become more sophisticated there is still a considerable range of views and experiences. Even within this broad spectrum, however, some distinct and common conclusions do emerge. This is even more evident when the proceedings of the Spring Seminar are observed as a whole. A pragmatic, cautious and measured approach characterized the contributions of virtually all the participants. The concept of a “demographic time bomb” and the worrying headlines questioning whether “can we afford to grow old?” appeared to most participants to overdramatize an issue which, although very important, can be managed not by placing all the adjustment on one variable, or by radical change of the existing pension system, but rather by emphasis on a well-constructed set of labour market measures in combination with parametric changes to the existing system. In this manner the “time bomb” can be defused.