Pension Systems and Labor Costs in Southeastern Europe

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The pension systems in southeastern Europe, which here is defined to include Albania, Bosnia, Macedonia, Montenegro, and Serbia, are facing a wide variety of interrelated problems. Contribution rates are high and have contributed to the growth of informal labor markets. The relatively high expenditures involved in most of the pension systems make it difficult to reduce contribution rates without incurring significant fiscal costs. At the same time, the low rate of participation in the system among today’s workers suggests that when these workers retire, a lower percentage of the elderly will be covered by the pension system than is the case today. Thus, the countries face a future with many elderly receiving no benefits from the pension system, high contribution rates which continue to elevate labor costs, and potentially mounting fiscal costs as well.

This paper provides a brief overview of the pension systems in these countries. Section 1 evaluates the parameters currently in place in these countries in comparison to international standards. Section 2 provides the conceptual background from which to make decisions regarding the future design of the pension system. Section 3 looks specifically at issues related to reducing contribution rates in the pension system as a means to increase growth in the formal sector. Section 4 outlines a pension reform strategy which will need to be customized for specific countries, but which provides an overview of what types of reforms should receive priority, and Section 5 concludes.
I. Pension Reform Issues

**Demographic changes.** Typically, pension systems face increasing problems when their populations begin to age. In terms of aging, this group of countries includes very young countries, like Albania, and much older countries like Serbia, as shown in Figure 1. The demographic profiles for OECD countries are shown in Figure 2 for comparison. Bosnia, Macedonia, and Montenegro are comparable demographically to the younger countries in the OECD such as Ireland, Iceland, Canada, and the US. Serbia is comparable to the majority of European countries, which are much older, although Belgium, Greece, Germany, and Italy are all significantly older than Serbia. Albania is much younger demographically and more comparable to the younger countries of the developing world.

![Figure 1: Percentage of Population over Age 65 Among SEE Countries](image)

**Historical Context.** Despite their general youthfulness, these countries still face pension problems arising from a number of historical developments. In the former Eastern bloc countries, all individuals of working age, male and female, were required to work if able and thus, most elderly have rights in the pension systems and are receiving public pensions. By comparison, in much of continental Europe, with the exception of the Scandinavian countries, labor force participation among women in particular has been significantly lower than for men, and many women do not receive public pensions until they become widowed. As a result, the percentage of elderly receiving pensions is higher in these former East bloc countries than in comparable west European countries. Retirement ages tend to be a bit lower than in west European countries, where retirement age is typically 65 and often for both men and women, which increases further the number of pensioners, and reduces the potential contributors to the system. Also, unlike west Europe and other OECD countries, the historical lower retirement ages for women have been maintained in most of the countries, with the exception of the Federation entity within Bosnia. Adding to this burden, most of these countries inherited relatively lax regulations on early retirement with many occupations, like ballerinas, being given early
retirement privileges. Transition to a market economy has also resulted in closing down some state-owned enterprises, and restructuring and downsizing others, resulting in layoffs in which workers have often been compensated by the granting of early pensions. In the new private sector, workers and their employers see few benefits from contributing to a system with high contribution rates and low and uncertain benefits, while the state, accustomed to automatic transfer of pension contributions from enterprises to the pension fund under the old systems, generally has weak enforcement capacity. Finally, several countries among this group have endured a number of conflicts which have led to a large number of disabled among the working age population who need to be supported by the pension system. Combining all of these factors, the countries are left with large numbers of beneficiaries in their pension systems and few contributors to finance those beneficiaries.

Figure 3 shows the difference between population dependency rates and system dependency rates for these countries. Old age population dependency rates show the number of elderly, those aged 65 or older, compared to the number of potential workers, individuals between the ages of 15 and 64. Old age system dependency rates by contrast show the number of beneficiaries receiving pensions from the system compared to the number of individuals paying contributions to the system. In all cases, the system dependency rates far exceed the population dependency rates because the number of beneficiaries is significantly higher than what pure demographics would suggest for all the reasons cited above and the number of contributors is significantly lower than what is demographically possible because of the shrinking employment in the formal sector coupled with the growing informal sector. In west Europe and other OECD countries, the system dependency rate is typically less than twice the population dependency rates. In this group of countries, it ranges from a little over three times the population dependency rates in countries like Serbia and Bosnia to over seven times the population dependency rate in Albania. Most pension systems within this group of countries are run on a pay as you go basis, where contributions from current workers are used to pay benefits to current pensioners. When system dependency rates rise above 50% in a pay as you go system, there are fewer than two workers making contributions to pay the benefits of

![Percentage of Population aged 65 and older in Selected OECD countries](image-url)
If the pensioners expect to receive pensions that are 40% or higher with respect to average wage, workers will need to pay contribution rates well over 20% of wages, in some cases closer to 35% of wages, in order to finance those pensions from contributions. And of course the higher the expected pensions, the higher the contributions necessary to finance those pensions will be.

High contribution rates. It should come as no surprise then that these countries tend to have high mandatory contribution rates for pensions compared to their west European counterparts. Figure 4 shows the pension contribution rates for these countries. By contrast the average contribution rate for pensions in the OECD countries is 19 percent, and the OECD countries are generally older than the majority of these countries. The high contribution rates raise some revenue, but they also lead to efforts by individuals and employers to evade these high taxes, resulting sometimes in a net fall in revenue to the pension system as the number of contributors falls significantly in response to the high taxes required to belong to the system. Note that in addition to the pension contributions shown in Figure 4, formal sector employees and employers also have to pay contributions for health insurance and unemployment and income taxes as well as complying with other formal sector regulations such as labor and safety regulations. Concerned by the growth in the informal sector, some governments are lowering or beginning to consider the lowering of pension contributions. Albania, for example, in September 2006 lowered pension contributions from the previous 29.9% rate to 23.9%. However, efforts to lower pension contributions are stymied by the level of pension expenditures to be financed. And countries are finding that only in rare cases does the number of contributors grow sufficiently as a result of the lower taxes to
compensate for the lower contribution rate, leading to overall lower revenue as a result of lowering the contribution rate. As a result, the countries find that having to finance the high level of historical pension expenditures they inherited, they need high contribution rates, but that these high contribution rates lead to low contribution coverage which then affects the role of the pension system in the future.

**Low retirement ages.** Other characteristics of the pension systems which exacerbate the inherited problems include the prevalence of de facto low retirement ages. In most of the countries, retirement ages for men are rising to 65 or have already reached 65, with the exception of Macedonia where men can retire at age 64. Women, on the other hand, are typically allowed to retire earlier than men as was the historical norm. Only in the Federation entity in Bosnia are retirement ages equalized for men and women, although the difference in Macedonia has been reduced to two years from the typical five. There is no economic rationale for a lower retirement age for women, who live longer than men and therefore need to accumulate more pension resources to help offset the longer retirement period from an actuarial perspective. But even more problematic is the prevalence of early retirement for both sexes. Many occupations, many more than is common in west European countries, continue to earn special privileges allowing them to retire early. These individuals are allowed to accumulate additional months of service credit per month of actual contribution. Higher

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1 Contribution rates for Republika Srpska in Bosnia and Herzegovina are assessed as 24% of net wage, not gross wage. The rate shown above is an approximation of what the rate would be if expressed as a percentage of gross wage.
years of accumulated service credit allow workers to retire below the minimum retirement age. While most countries are now requiring the employer to pay additional contribution for workers who earn these additional months of service credit, the additional contribution only compensates the pension system for the higher pension these individuals receive relative to the contributions they themselves paid, but it does not compensate for the longer duration of benefits that these individuals receive by being allowed to retire early. These individuals not only receive a higher benefit relative to their contribution, they also receive the pensions for longer since they receive the pensions for more years than a normally retiring person. Figure 5 shows the percentage of pension recipients below the age of 65. As the figure shows, the numbers are extremely high, partly reflecting the historically lower retirement age, but also reflecting the continued early retirement practices in many of these countries.
<table>
<thead>
<tr>
<th></th>
<th>Albania</th>
<th>Bosnia</th>
<th>Macedonia</th>
<th>Montenegro</th>
<th>Serbia</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Contribution Rate</strong></td>
<td>23.9%</td>
<td>24% of gross salary</td>
<td>24% of net salary</td>
<td>21.2%</td>
<td>24%</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>13.78% to first pillar; 7.42% to funded pillar</td>
<td>22%</td>
</tr>
<tr>
<td><strong>Retirement Age</strong></td>
<td>Rising to 65/60</td>
<td>65/65</td>
<td>65/60</td>
<td>64/62</td>
<td>Rising to 65/60</td>
</tr>
<tr>
<td><strong>Percentage of pensioners below 65 years of age</strong></td>
<td>49%</td>
<td>37%</td>
<td>35%</td>
<td>31%</td>
<td>39%</td>
</tr>
<tr>
<td><strong>Benefit System</strong></td>
<td>Basic for 35 years of contributions plus supplementary earning-related</td>
<td>Earnings-related DB formula, but constrained by revenues</td>
<td>Earnings-related DB formula, but constrained by revenues</td>
<td>Defined benefit system plus mandatory defined contribution</td>
<td>Point system</td>
</tr>
<tr>
<td><strong>Approximate accrual rate</strong></td>
<td>2.1%</td>
<td>2.25% for first 20 years; 1.5% for next 20</td>
<td>2.25% for first 20 years; 1.5% for next 20</td>
<td>2.33/2.6% for years prior to 2003; 1.8%/2.05% for those who remain in first pillar only; 0.75% and 0.86% for those who switch to second pillar plus defined contribution pension</td>
<td>1.42% of average wage in December 2003; indexed 50% to inflation and 50% to wage growth thereafter</td>
</tr>
<tr>
<td><strong>Indexation</strong></td>
<td>100% to inflation by law</td>
<td>100% to average wage growth, but subject to revenue constraint</td>
<td>100% to average wage growth, but subject to revenue constraint</td>
<td>80% to inflation, 20% to average wage growth</td>
<td>50% to inflation, 50% to average wage growth</td>
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<td></td>
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<td></td>
<td></td>
<td></td>
<td>100% to inflation only beginning in 2009</td>
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*Table 1: Pension System Characteristics in Southeastern Europe*
Benefit Design. Table 1 summarizes the chief characteristics of the various pension systems. Design characteristics in the benefit systems add to the ongoing problems of the pension systems. On the surface, all six systems link future benefits to contributions paid today, giving workers incentives to contribute in order to collect future pensions. However, in almost all cases aside from Macedonia, other features in the benefit design undo the link between contributions and benefits, giving workers disincentives to contribute instead. In Albania, the disincentivizing factor is the maximum pension which cannot exceed twice the minimum pension, while the maximum wage subject to contribution is five times the minimum wage, resulting in a compressed pension distribution relative to the wage distribution. Furthermore, since the minimum pension is legally linked to inflation, over time the pension as a percentage of average wage would be expected to fall drastically. The Government has responded by raising the level of the minimum pension above inflation and even above wage growth, based on whatever is fiscally affordable. These discretionary increases further break the link between contributions and benefits since contributors have no idea what their pensions will be when they retire, only that they will not be substantially differentiated from those who contribute only at minimum wage. The current minimum pension is about 38% of average wage, while the average pension is 41% of average wage, which encourages individuals and their employers to declare and contribute on the basis of minimum wage.

In Serbia and in Montenegro, the problem is a bit different, but the impact in the long run will be similar. Both of these countries have adopted the point system which awards workers points based on their contributions in a given year. The number of points together with the value of the point at the time of retirement then determines the pension. Since the points earned are determined both by the duration of contribution and the level of contribution, the point system in theory closely links contributions and benefits. However, the value of the point in Serbia set at the time of the reform was originally being indexed 50% to inflation and 50% to average wage growth. Subsequent reforms are moving the indexation purely to inflation. The result of this indexation is that while wages and the contributions paid with respect to those wages grow over time, the pensions will not grow in real terms, reducing the pension relative to average wage in the medium term. Montenegro has a similar point system, but is maintaining the indexation of the general point to a 50-50 mix of inflation and average wage growth. The drop in the value of pensions relative to average wage will be less severe in Montenegro than in Serbia, but will be significant nonetheless. Unlike the Albanian case, those who pay more in Serbia and in Montenegro within a given cohort will receive higher benefits, but the overall level of benefits will fall relative to average wages. As a result, younger cohorts will get less and less relative to what they paid than older cohorts.

Bosnia and Herzegovina will also end up de-linking contributions and benefits, but for different reasons. Both entities in Bosnia and Herzegovina have constrained their pension expenditures by the revenues available. A pension amount is determined on the day of retirement based on the years of contributions and the wages on which those contributions are paid. The system thus far links contributions and benefits. All the pensions paid are added together and if they exceed the contribution revenues of that particular year, they are all reduced by a coefficient designed to equate revenues with
expenditures. If they exceed the contribution revenues of a particular year, they are all increased by a similar coefficient. Since natural aging of the population will reduce the number of contributors relative to the number of pensioners, over time, pensions will decrease, with the result that younger cohorts will get less relative to what they contribute than older cohorts, much as in the Serbian and Montenegrin cases.

The Macedonian system provides a much tighter link between contributions and benefits. Initially, the minimum pension is on the high side, at 41% of the average wage in 2000, undermining incentives to contribute on the basis of wages somewhat higher than minimum wage. However, this minimum pension is expected to be indexed 80% to inflation and 20% to the growth rate of average wages. Over time, the minimum pension will fall relative to average wage, diluting this disincentive. In other respects, the Macedonian system does provide a pension equal to 0.75% per year of service of the average salary earned throughout the working career revalued by average wage growth. In addition, the Macedonians put a portion of their contribution in an individual investment account where individuals will earn rates of return proportional to their contributions. Investment earnings will vary from year to year and the rates of return will not be identical for any two cohorts, but there is no systematic variance where younger cohorts are expected to fare better or worse than older cohorts.

**Indexation.** Indexation is another parameter in the southeastern European pensions that tends to raise the costs, making it difficult to reduce contribution rates. Most countries in the OECD index pensions post-retirement only to inflation, as a means of lowering the pension expenditures. From a social perspective, it is crucial to preserve a pensioner’s living standard during his retirement period. While it might be nice to provide pensioners a share of the economy-wide real growth, most countries are finding this practice unaffordable. Among this group of countries, almost all protect pensioners against inflation, and most are more generous. Serbia is the only country among the six which legally indexes to inflation and actually achieves the legal indexation, but even in the Serbian case, full inflation indexation will not be reached until 2009 from the previous mix with average wage growth. Albania legally indexes to inflation, but always provides higher increases than inflation alone would indicate. Montenegro indexes 50% to inflation and 50% to wage growth, while Macedonia indexes 80% to inflation and 20% to wage growth. Bosnia ends up with an odd combination where pensions are legally supposed to grow with wage growth, but given the revenue constraint, they grow in a non-systematic way, often not even protecting against inflation. Typically pension increases are cumulative in that all pensions grow by a certain percentage from the previous year with the previous year’s pension representing the cumulative of all pension increases since the time the pension was first awarded. In Bosnia, the revenue constraint applies to the nominal value of pensions as they were originally awarded. If the contribution revenue can finance 15% above the nominal value of the pensions as awarded, all pensioners will get a 15% increase above the value of what was awarded. For pensions awarded several years ago, the 15% increase may not even cover inflation. For the pension just awarded last year, the 15% increase is higher.

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2 Campaign promises in the recent Serbian election suggest that Serbia may be considering reverting to the more generous indexation of the past.
than either inflation or wage growth. A move to systematic inflation indexation, as is being undertaken in Serbia, will both better protect the elderly and prove to be more fiscally sustainable.3

Coverage. In addition to the demographic and pension design issues, the countries will soon face a new set of problems. Currently, many of the elderly are receiving some type of pension from the public system. As noted before, with the growth of the informal sector in the labor market, many of today’s working age population are not contributing to the pension system and will not have rights to a pension when they retire. As a result, the pension coverage of the elderly is expected to fall in the longer run, creating additional demands on the government, that of providing some type of old age assistance to the large groups of elderly who have no means of support in old age. The expected change in future coverage among the elderly for three of the countries for which projections have been completed using the World Bank’s pension model, PROST, is shown in Figure 6. In all three, there will be declines in pension coverage among the elderly in the future, with the largest declines expected in Albania, although the unusually high current coverage suggests some unintentional duplicate pensions being paid as well as pensions paid to elderly living outside of Albania who are not counted in the Albanian population. In the case of Serbia and Bosnia, the initial numbers are much lower, partly because the Serbian data do not include pensions paid to farmers and the self-employed and partly because in both countries large numbers of elderly are receiving veterans’ benefits in addition to what is being paid by the pension system. The veterans’ benefits will decline over time, leaving the pension system as the only source of old age support. Furthermore, the projected numbers assume that contributors remain at their current values as a percentage of the working age population. If the number of contributors fall further in response to the expected future reductions in the average pension, the number of elderly could fall more sharply in the future.

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3 This policy has just been changed in Republika Srpska. Pensions have been recalculated indexing to 100% of wage growth until 2004 and the sum of these revalued pensions is subject to the revenue constraint. The first of these revalued pensions were paid in April 2007.
Figure 6: Percentage of Elderly Receiving Pensions Now and in the Future
II. Pension System Design

Before proceeding to a discussion of possible reform options, it is worthwhile reviewing the relationship between pension systems and payroll taxes. Pensions are different from almost all other types of public expenditures. They are not targeted toward the poor; typically, richer individuals receive higher pensions. They are not what economists call public goods in that unlike military expenditures which protect the whole country and cannot exclude those who do not pay from being protected, pensions are provided individually and can be withdrawn from those who do not pay. They do not provide positive externalities to others like education expenditures do where even though individuals benefit from education, the society as a whole also benefits from having an educated population. Only to the extent that society does not like to see their elderly begging or dying in the streets is there a positive externality from pension provision, but this would suggest only a very basic level of pension to be provided publicly. Pensions are even different from other payroll tax financed programs. Health insurance which is often financed through payroll taxes is a true insurance program in that no one knows in advance who will need substantial health care and who will need less. Health needs are generally not related to income level so the benefits received are unrelated to the contributions paid. Even unemployment insurance, where benefits paid are often related to previous income on which contributions were paid, is different from pensions in that not everyone will receive a benefit, only those who become unemployed and under certain conditions. In pension systems almost all individuals or their families will receive a benefit of some type. If a person lives to old age, he will receive an old age pension. If he becomes disabled before reaching the retirement age, he will receive a disability pension. If he dies before reaching retirement age, his family will generally receive a pension. Only in rare circumstances is no benefit received. Even the amount to be received is not uncertain, as it is typically prescribed in law. In this sense, pensions are not really insurance where benefits are rarely paid out, but more a mechanism to prepare oneself for a certain future inability to work. The only uncertainty is the cause of that future inability to work and the timing. Thus, pension systems are a blend between a savings mechanism, an insurance mechanism, and a poverty alleviation mechanism.

The need for such a blend arises from the main objectives of a pension system: (1) the alleviation of poverty in old age, and (2) the replacement of labor income when the individual is no longer able to work due to old age, disability, or death. While government revenues could clearly be allocated toward covering the first objective, the second is more difficult. To achieve the second objective, higher income individuals would have to get higher pensions, since they have higher incomes to replace, than lower income individuals. There are no other types of government expenditures which systematically pay more to higher income individuals. There are government programs like subsidized higher education which tend to benefit higher income individuals more than lower income individuals, but lower income individuals who qualify for higher education would get the same benefits as higher income individuals. They may be less likely to qualify or to choose this option, but the same opportunities are open to them. However, in pensions, the only way to earn a higher pension would be to become a higher income person. In an ideal system, the first and second objectives could be
separately financed, with government financing for the first and the second left entirely to the discretion of the individual.

Typically, however, the second objective may not be left to the individual or even privately financeable. People may be subject to myopia, and neglect to save when young and only realize the need for saving when they are too old to accumulate sufficient savings. People may also realize that the government will not allow them to be poor in old age and will provide some benefits, providing little incentive for individuals to give up consumption during their working years to provide for themselves in old age, thereby causing a moral hazard for the government. Even if properly motivated, individuals may not find financial institutions capable of providing reliable contracts which span the 60-70 years that a pension contract lasts.

In light of these factors, countries historically turned to the government as the only institution capable of providing a secure savings mechanism and of intermediating between generations. Because the government was serving as an intermediary rather than directly providing pensions as a form of government expenditures, the logical conclusion was that the government accept contributions out of payroll and hold them much as a bank would to finance the promised pension when the individual retired. The original countries offering pensions held the contributions in an account much like a bank would. However, the countries were young, and the contributions provided far exceeded the annual expenditures required by the pension program. The accumulating funds proved too tempting a target and governments began to spend the accumulated funds, turning the programs which began with their liabilities fully funded by contributions into pay as you go financed programs, where contributions of today’s workers are used to pay benefits to today’s pensioners with little surplus being accumulated to pay the future pensions of today’s workers. Once a group of countries began to offer pensions financed in this way, other countries began to imitate the programs, irrespective of whether the initial conditions which led to such a development in the original countries was in fact relevant in the newly adopting countries. And today many countries in the world use payroll taxes from workers to finance pensions for today’s retirees, with programs covering at least some part of the labor force. Once these systems began, politically powerful groups began to lobby for various increases in pensions and reductions in eligibility conditions. These benefits were virtually costless for the politician to grant during the time when there were few pensioners and many contributors. They were in fact costly for future generations, but this additional cost would not become apparent for several generations. As a result, these pension plans around the world became actuarially unbalanced from both political demands as well as the increases in life expectancy which should have led to parametric adjustments to maintain actuarial balance, but which rarely took place.

If one were to start a pension system from scratch in this group of southeast European countries, policymakers might arrive at a similar conclusion to that of the policymakers in the original pension providing countries. Most of these countries also do not have fully secure financial institutions and instruments which could be used to invest over a 70 year time horizon. However, unlike the original countries, global capital markets with both reliable and regulated financial institutions and financial instruments
do exist today. If the countries were willing to allow foreign institutions to manage the contributions and to invest them abroad, there would not be a strong need for governments to take an active role in providing pensions themselves, allowing them merely to supervise and regulate this financial market provision of pensions.

But the countries have inherited already-existing public pension programs financed from payroll taxes. Once such public programs exist, it becomes much harder to institute a true savings system even when financial market conditions change making such a system viable. Contributors in the old public program have been promised pensions in their old age. If workers today begin to put contributions into the new financial institutions so that they may save for their own old age, no revenue will be available to cover the pensions for the current elderly whose own contributions have already been spent providing pensions for the previous cohorts of elderly. The transition to a savings-based pension system can only occur if the government is willing and able to finance the pensions for existing pensioners and for those workers close to retirement out of other resources. The older the country and the larger the number of elderly receiving pensions, the harder it is for the government to finance such a transition. Although many of these countries are young, they do have significantly large numbers of pensioners resulting in substantial costs to the government of such a move.  

The chief drawback of the publicly provided pension programs is their vulnerability to the inevitable aging of the population. Programs which are viable and beneficial when the population is young become fiscally unsustainable when the population begins to age. The cost of maintaining their sustainability falls largely on labor markets since payroll taxes are the main source of financing for the pension expenditures. When a population is young, and there are 10 contributors per pensioner, a low 10% contribution from wage can provide a pension close to 100% of average wage, resulting in the average wage worker being able to fully replace his wage during retirement and allowing this pension to grow with the wage growth in the economy. However, as the population ages, there will be, as is already the case in these countries, no more than 1 or 2 contributors per pensioner. At this stage, the same 10% contribution will only finance 10-20% of average wage, which is an impermissibly low pension. In order to provide an adequate pension, contribution rates have to rise, with the resulting negative impact on the labor market. The number of pensioners could be reduced and the number of contributors could rise as a result of a rising retirement age, but raising retirement ages is proving to be politically difficult to accomplish, and the lack of formal sector job opportunities amid the rising informal sector is discouraging the growth in the number of contributors even where retirement ages are rising.

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4 The one advantage that these countries have is that they are also in the process of privatizing state enterprises, generating revenue for the state. Whether the privatization revenues provide a sufficient supplement to general revenues in order to allow such a transition needs to be determined on a case-by-case basis because each country’s liabilities are unique to the particulars of its own demographics, its own labor market experience, and its own pension policy parameters, and its revenue-generating potential is also uniquely determined by the enterprises available for privatization and their potential profitability.
As a result, many countries are now resorting to prefunding some or all of their pension liabilities, by accumulating reserves in their publicly managed pension system as is the case in Sweden, Ireland, and the United States, or by gradually moving toward individually funded pension accounts as in the case of much of Latin America and some of the larger countries in Central Europe such as Hungary and Poland as well as in the case of Australia. Funded accounts offer a better return per contribution than pay as you go systems for an aging society and thus offer the opportunity to achieve a target pension benefit with a lower contribution rate, resulting in fewer distortions in the labor market. Pay as you go systems can only provide a rate of return equal to the rate of real wage growth plus the rate of growth of the contributor population. Since the growth rate of the contributor population is negative in most European countries due to demographic changes, the pay as you go systems can only offer a rate of return below wage growth rates. Since interest rates or the rates of return on capital are typically higher than wage growth over medium and long term horizons, financial markets will be able to offer workers better pensions in the long run for a given contribution.
III. Potential for Reducing Contribution Rates

Alarmed by the sudden appearance of a large and undiminishing informal sector, many transition economy governments, including those in this group of countries, are choosing to lower contribution rates as a way of increasing incentives for formal sector job creation. Initially, faced with rising pension expenditures, governments often responded by raising already high contribution rates. They found that not only did revenue not rise, but the informal sector also began to grow. Now these same countries are reducing contribution rates as a means of reducing the size of the informal sector. Although a reasonable proposition in the face of the positive experience from lower, flat tax rates, lowering the contribution rate in most cases is unlikely to generate enough additional formal sector employment to maintain the necessary revenues to finance the large pension expenditures already in place today. Hammermesh (1993) suggests on the basis of international experience that a 1% decrease in the contribution rate will generate approximately a 0.3% increase in employment. Formal sector employment will increase, but not enough to maintain the same level of revenues which existed prior to the contribution cut. Many individual country factors influence the impact on employment in any one country. Employers when deciding whether to offer employment in the formal sector or informal sector clearly consider payroll taxes in their decision. But other factors like the corporate tax structure, labor market regulations, and other licensing and regulatory requirements also impact the decision to offer formal sector employment. Changing just one of these, the payroll tax, may be insufficient to encourage employers to formalize their workforce.

The design of the pension system does not encourage compliance either. In four of the six countries, future pension benefits are expected to fall markedly from their 40-50% of average wage today to 10% of average wage in some cases. New entrants to the labor force look at the size of today’s contribution and the size of the expected future benefits and are understandably reluctant to contribute. Marginal changes in contribution rates are unlikely to change incentives when the future reductions in benefits are expected to be so large.

Furthermore, international experience also suggests a strong link between contributor coverage in the pension system and per capita GDP, measured on a purchasing power parity basis, as shown in Figure 7, based on a variety of reasons, including institutional capacity and structure of the economy. Within this group of countries, both Serbia and Montenegro are extremely close to the international trend line which arises from an analysis of data from 83 countries. Bosnia and Macedonia are also close to the line, although in the case of Bosnia contributor coverage might be expected to be slightly higher. Albania is well above the line suggesting in both cases that contributor coverage is as high as can be expected and decreasing the contribution rate is unlikely to achieve substantial further gains in coverage. In the case of Albania the number of contributors is somewhat artificially high because both rural and urban contributors are counted equally. However, rural contributors pay only 15% of the contribution due with the state paying the remainder. If the number of contributors is prorated by the extent to which the contribution is paid, the contributor coverage would
fall dramatically. What these numbers suggest is that these countries are in terms of contributor coverage about where they are expected to be given their income levels. While administrative and policy improvements might move the coverage rate somewhat, long term growth is required to achieve substantial improvements in coverage. Attempts to lower the contribution rate might achieve marginal improvements in coverage, but not sufficient to compensate for the loss in revenue.

Given the loss in potential revenue from lower contribution rates, the government will have to offset the loss by contributing general tax revenue, or in some cases more general tax revenue, to cover pension expenditures, essentially financing the deficit in the pension system. Given the historical nature of many of the pension liabilities, government financing of them might not seem problematic at first glance. However, one would need to compare the distortionary impact of raising the additional revenue to cover the pension deficits through other forms of taxation with the distortions created in the labor market when relying strictly on payroll contributions as a funding source before determining what the least distortionary source of finance would be. Furthermore, using scarce government revenues to provide differentiated pensions has a significant and negative impact on the income distribution, with government revenues being used to support larger pensions for higher income individuals and lower pensions for lower income individuals. Finally, given the future expected drop in coverage, it will become politically difficult to deny pensions to those who have not contributed, but have paid general taxes when general taxes are being used to finance pensions. Several of these countries have already provided benefits to workers on the basis of contributions their employers never paid. This type of political pressure will only increase as more government resources are used to finance the pension.

![Relationship between Per Capita Income and Contributor Coverage](image)

*Figure 7: Relationship between per capita income and contributor coverage*
IV. Looking to the Future

**Social Pensions.** Given the moderate level of contribution coverage for the near term, contributory pensions are unlikely to provide old age security for all of the next generation of elderly as they reach retirement age. The government will need to supplement with some form of old age assistance. How much old age assistance and to whom needs to be decided on an individual country basis. This old age assistance can be provided in the form of a universal pension available to all those above a certain age, as in many countries such as New Zealand. The age at which such a pension is given is often higher than the normal retirement age, providing some incentive for individuals to contribute if they are able, and the amount is generally lower than the minimum contributory pension for the same reason. Offering such a benefit may also relieve countries from the pressure to offer contribution credit for those workers whose enterprises did not remit contributions during wartimes and the transition to a market economy. From a fiscal perspective, the amount and age can be determined based on fiscal resources rather than on some previously acquired right, making the social pension fiscally sustainable. Administratively, this type of pension is relatively easy to manage since it only requires information on ages or birthdates. From a social perspective, the pension does provide needed old age support, but can be costly because it protects the entire elderly population including those who have other means of support.

An alternative form of old age assistance consists of more selective targeting of recipients which is less costly from the fiscal perspective and more effective at reaching those most vulnerable to poverty. In OECD countries, this type of pension is typically available on a means-and-asset-tested basis. However, the administration of a means and assets test is not costless and can lead to efforts to hide resources to gain eligibility to the old age assistance. An alternative lower cost approach might be to simply pensions test the individuals. Those individuals receiving a contributory pension will not be eligible for this type of old age assistance. Given the lower level of benefits and the possibly higher age for eligibility, most individuals will not change their contribution pattern just to receive this pension. The issue of rural workers who do not make full contributions, which is a problem in some countries, such as Albania and Serbia, could be resolved by requiring full contributions for a contributory pension. Those who are unable or unwilling to make such complete contributions could receive the old age assistance benefit instead. Given that about half the labor force is contributing in Macedonia, Serbia, and Montenegro, this targeted old age assistance may be sufficient to provide old age support for those who will not be receiving public support in the future. In Albania, a much lower percentage is actually contributing fully.

If a country were starting a new pension system today given the state of global financial markets, it might be sensible to offer a universal pension from the government meant to alleviate old age poverty, while leaving the income replacement function to a well-regulated voluntary pension system. However, there will always be political pressure to raise the level of the government-provided social pension, particularly coming from those who do not choose to save for themselves. For this reason, governments often make a savings program mandatory even if the income replacement function is carried
out by individuals. However, moving to such a system from the current contributory system can be difficult, particularly when the links between contributions and benefits are tight and where the pensions being received by individuals are significantly differentiated. In Albania, while there is some differentiation of pensions, the pension benefits are highly compressed with maximum pensions no more than twice minimum pensions and many people not receiving much more than the minimum pension. In all of the other countries, the pensions are far more differentiated today. However, as the average pension levels fall in Serbia, Montenegro, and Bosnia in the future, rather than maintaining the differentiation within a very small pension, one strategy would be to abolish the differentiation and instead offer a universal pension. Two levels of basic pension might be offered, one to those who had contributed and another to those who did not, but when the pension falls to 10% of average wage, whether one individual receives 9.9% of average wage and another receives 10.1% of average wage becomes less important as the amounts of money involved are significantly smaller. But in the short term, it is difficult to move from a differentiated contributory pension to one that is noncontributory and universal in nature.

**Contributory pensions.** Assuming that most countries will retain a contributory system for at least some segments of the population, the contributory system needs to become self-financing as soon as feasible to avoid the negative redistributions involved with a government financed pension system from which only some people are eligible to collect pensions. The historically generous benefits available at relatively young ages are simply not going to be affordable going forward. While this was clear in the early parts of the transition to a market economy and the elderly more or less accepted lower pensions, now that the economies have begun to recover, political pressure to make the systems generous again is beginning to reappear. Countries need to look at their demographics, choose a desired benefit level and then determine the contribution rate required to support the chosen benefit level. If that contribution rate is not affordable, adjustments need to be made in the benefit level and adequately communicated to the population. Conversely, countries could choose an affordable contribution rate and then determine what portion of income will be publicly replaceable by the pension system and what portion will need to be covered on a voluntary basis by additional savings.

In order to achieve the best combination of contribution rates and benefit rates possible given the current demographics, countries should try to realign their systems with international norms as quickly as feasible. The two primary elements of pension system design which remain outside international norms are the retirement age and indexation. Not only does the legal retirement age, particularly for women, need to rise, but the large number of new early retirees also needs to be stopped. Individuals could be allowed to retire early, but with actuarially reduced pensions. Such reductions are not currently being required and would serve to substantially reduce the inflow of new retirees. While some labor market transition is still taking place resulting in individuals unable to find formal sector work as bankrupt enterprises close, covering the affected individuals through unemployment insurance or through specialized or general social assistance is more appropriate at this point than bending the pension system to accommodate these special and transitory needs. In terms of indexation, the countries
need to move toward inflation indexation as quickly as possible. As the economies recover, most of the countries have experienced relatively rapid wage growth which is then translated into rapid growth of pension expenditures through formulas which continue to include wage growth in the adjustment of pensions already in progress. The inclusion of wage growth helps pensioners share in the current wage growth, but is simply not affordable given the demographics and the large number of pensioners relative to contributors. While indexation post-retirement should be linked to inflation only, those countries whose benefits are expected to fall rapidly have chosen to link other parameters of the pension system to the post-retirement indexation. It is the linkage of the other parameters to post-retirement indexation which causes the sharp fall in benefits. In the case of Albania, the maximum pension is indexed to inflation which causes future benefits to fall. In the cases of Serbia and of Montenegro, the value of the general point is linked to post-retirement indexation which results in freezing real pension values at their 2009 levels for all eternity in the case of Serbia. The consequences in Montenegro are not as drastic, but similar.

Finally, special care needs to be taken to avoid creating compliance disincentives in the pension system and to dismantling those that already exist. In middle income economies, employers and workers always have the option of informal labor markets. Access to pensions and health insurance can be seen as an advantage of formality. But if the systems are designed to finance existing pensioners only and not to provide reasonable benefits for future workers, formality will be seen as penalizing workers and employers rather than providing an advantage.

**Funded pensions.** In the longer run, countries may want to consider moving part of their mandatory contributions toward a funded system, where contributions are invested in individual accounts and earn market rates of return. Many neighboring countries have already moved in this direction, among them Poland, Hungary, the Slovak Republic, Croatia, Bulgaria, Estonia, Lithuania, Latvia, Kazakhstan, and of course Macedonia. While a long term move in this direction will be beneficial for these countries, in the short and medium run, they are constrained by transition costs. One approach toward moving in this direction could be gradual. As benefits fall and fiscal space appears, a portion of the contributions could be diverted toward funded pensions. These funded pensions would then provide a supplement to the future reduced level of public pensions. However, if policymakers want to pursue this type of strategy, they need to resist political pressure to counteract the falling level of public pensions. Policymakers need a clear long run strategy and need to articulate this to the population at large. Furthermore, even if additional fiscal resources were available to support the pension system, the countries often do not have sufficient secure financial market instruments in which to invest the pension contributions currently. Finally, sufficient supervisory and regulatory capacity to properly secure the long term savings does not yet exist in some cases. The limited regulatory capacity has first focused on bank supervision and regulation and is gradually moving to other financial instruments. All of these factors suggest that a move to funded pensions needs to be considered as a long-run strategy rather than an immediate measure, but careful country-specific analysis will be necessary to determine the appropriate policy in each case.
In fact, the future decline in pension levels relative to average wages in most of the countries, aside from Macedonia, provides the opportunity to achieve transition to a funded system at relatively minor costs. As contribution revenues continue to rise with wage growth, but pension expenditures remain relatively constant in real terms, the contributory pension could be transformed into a social pension or a flat supplement to one’s own savings and the bulk of the contributory system moved toward a funded system. The extent of the contribution devoted to funded accounts would depend on the country’s own philosophy regarding private vs. public sector responsibility, with a total contribution to the funded system signifying full reliance on the private sector while a small shift in contribution signifies diversification with major reliance on the government. The extent to which this decline in publicly provided pensions should be allowed to occur depends on the country’s choice of public-private mix. But governments need to make this choice to avoid short run political considerations from moving away from what would be the optimal long run combination for the country.
V. Conclusions

While the current state of pension systems in southeastern Europe can clearly be traced back to historical developments, the countries have begun to grow sufficiently such that they now need to focus on how to design the systems for the future. The growth of informal labor markets has encouraged policymakers to focus on reducing contribution rates in the hopes of increasing coverage in the formal labor market and pension system. However, this increased coverage is unlikely to be sufficient to solve the problems of the pension systems or to allow them to return to the generous old days. Instead, policymakers need to make concrete decisions about the design of their future pension system, which may involve lowering contribution rates, and then to move toward their target systems by continuing to reduce current expenditures and putting into place the administrative systems required by their future pension system design. Immediate measures include reducing early retirement and indexing pensions to inflation while removing disincentives to contribute. Longer term measures include introduction of a social pension and consideration of a funded component. While the immediate economic crises that these countries faced in the aftermath of transition is now over and most are experiencing strong growth, the countries need to be wary of dismantling the stringent pension expenditure reduction measures they initially put in place without a long run strategy for how the pension system should evolve.