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SOUTH ASIA

Pension Schemes for the Formal Sector

Emerging Challenges and Opportunities for Reform

The World Bank
Finance and Private Sector Development Unit
South Asia Region

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September, 2005

Finance and Private Sector Development Unit
South Asia Region
The World Bank

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Acronyms and Abbreviations

ADB	-	Asian Development Bank
APFF	-	Approved private provident fund
CBT	-	Central Board of Trustees
CD	-	Certificate of deposit
CIT	-	Citizen Investment Trust
CPF	-	Central Provident Fund
CPI	-	Consumer price index
CPP	-	Canada Pension Plan
DB	-	Defined benefit
DC	-	Defined contribution
EDLI	-	Employees Deposit Link Insurance
EOBI	-	Employees Old Age Benefits Institution
EPF	-	Employees Provident Fund
EPFO	-	Employees Provident Fund Organization
EPS	-	Employees Pension Scheme
ESGS	-	Employees Savings Growth Scheme
ETF	-	Employees Trust Fund
GDP	-	Gross domestic product
IPD	-	Implicit pension debt
LIC	-	Life Insurance Company of India
NDC	-	Notional defined contribution
OECD	-	Organisation for Economic Co-operation and Development
PAYG	-	Pay as you go
PFRDA	-	Pension Fund Regulatory and Development Authority
PPF	-	Public Provident Fund
SEC	-	Securities and Exchange Commission
SECP	-	Securities and Exchange Commission of Pakistan
WAPDA	-	Water and Power Development Authority
WB	-	World Bank

Local currencies and exchange rates (average 2004)

Country/Currency	Exchange Rate
Afghanistan (Afghanis)	AFA 50.00 = US$1
Bangladesh (Taka)	BDT 59.5 = US$1
Bhutan (Ngultrum)	BTN 45.3 = US$1
India (Rupees)	INR 45.3 = US$1
Maldives (Rufiyaa)	MVR 12.80 = US$1
Nepal (Rupees)	NPR 73.7 = US$1
Pakistan (Rupees)	PKR 58.3 = US$1
Sri Lankan (Rupees)	LKR 101.2 = US$1

Source: IMF International Financial Statistics 2005

GLOSSARY

Annuitant. A recipient of an annuity.

Annuity. A regular stream of payments made at an agreed rate payable until some contingency occurs (such as the death of the beneficiary).

Commutation factor. Share of the annuity component that can be converted into a lump sum immediately available at retirement.

Coverage ratio. The number of workers contributing to a mandated contributory scheme as a share of the estimated labor force.

Covered workers. Workers included in a formal pension plan.

Defined benefit plan. A pension plan with a guaranteed benefit based on a prescribed formula.

Defined contribution plan. A pension plan in which the benefit depends on accumulated contributions plus investment returns.

Dependency ratio. The number of beneficiaries from a pension scheme divided by the number of contributors to that scheme.

Discretionary changes. Changes in pension payments not specified by the rules of the pension scheme.

Earnings ceiling. The amount of earnings above which contributions to a pension system are not required.

Earnings-related pension. A pension from a pay-as-you-go scheme that is calculated on the basis of past earnings.

Full funding. The accumulation of pension reserves covering 100 percent of the present value of all pension liabilities owed to current members.

Funded pillars. Pension systems accumulating assets in order to fully (or partially) cover future liabilities-by contrast with a pay-as-you-go system, in which current outlays are paid out of current revenues.

Implicit pension debt. The discounted value of outstanding pension claims minus accumulated reserves.

Joint annuity. Annuity product that, upon the death of the main beneficiary, continues to provide an income stream to the spouse of the main beneficiary. The payout to the survivor can vary and is determined in the annuity contract.

Mandatory pension system. A pension system requiring participation by all workers in a country or in specific sectors.

Minimum contributory period. The minimum length of time that contributions must be made to a public pension system to receive a pension at retirement.

Minimum pension guarantee. A guarantee provided by the government to bring pensions to some minimum level.

Money's worth ratio. The ratio of the expected present value of annuity payouts to the premium.

Occupational pension scheme. A pension scheme sponsored by an employer or group of employers for their employees.

Old-age dependency ratio. The ratio of older persons to working-age individuals.

Parametric reform. A type of pension reform that maintains the pay-as-you-go structure of a scheme but changes key parameters defining the benefit structure or determining the contribution rate.

Pay-as-you-go scheme. A pension scheme in which current benefits are paid out of current revenues, either from contributions or from general taxes.

Portability. The ability to transfer accrued pension rights between plans.

Prefunding. The accumulation of assets in a pension scheme to fully or partially meet future liabilities.

Provident fund. A fully funded defined contribution scheme managed by the public or private sector.

Replacement rate. The ratio of a pension benefit to a worker's wage during some period, such as the last year of work, or to the worker's lifetime average wage.

Transition cost. The fiscal cost of transforming a pay-as-you-go system into a funded system by making the implicit liability explicit.

Variable annuity. Annuity paying an income stream that changes with longevity, market, or inflation risk.

EXECUTIVE SUMMARY

For centuries informal arrangements such as intrafamily transfers have been the primary source of old-age income support in South Asia. That remains true even today. Current patterns suggest that only around 1 in 10 of South Asia's half a billion workers will enter old age with a pension related to preretirement earnings. Pension schemes in South Asia cover small shares of the population, concentrated in the formal sector (table 1).

Formal retirement programs that help participants smooth consumption over their lifetimes, the main focus of this report, may cover only a small share of the population in South Asia, but their reform matters for everyone else as well-for three reasons: rising fiscal costs, economic inefficiencies, and long-term social policy. The escalating cost of pensions for civil servants is becoming a growing concern in many South Asian countries as it crowds out higher-priority spending aimed at accelerating growth and poverty reduction. Some retirement income programs are accumulating a

TABLE 1
Main pension programs in South Asia

Country	Programs for civil servants[a]	Mandatory programs for private sector workers	Voluntary programs[b]	Coverage of population ages 15-59 (%), 2003
Afghanistan	Pay-as-you-go (PAYG) defined benefit	None	None	0.9
Bangladesh	PAYG defined benefit; provident fund	None	Limited occupational schemes	2.1
Bhutan	PAYG defined contribution; provident fund	None	Very limited occupational schemes	4.3
India	PAYG defined benefit; defined contribution scheme for new workers as of 2004	National provident fund; partially funded defined benefit; exempt occupational funds[c]	Public provident fund; occupational schemes; personal plans; new pension scheme[d]; defined benefit for low-income beneficiaries with subsidy component	8.9
Maldives	PAYG defined benefit; provident fund	None	Publicly managed provident fund	18.4
Nepal	PAYG defined benefit; provident fund	National provident fund; exempt occupational plans[e]	Limited occupational schemes	2.7
Pakistan	PAYG defined benefit	National defined benefit (partially funded)	Limited occupational schemes	5.8
Sri Lanka	PAYG defined benefit; funded defined benefit for new workers as of late 2003	National defined contribution plans; exempt occupational plans[c]	Occupational schemes[f]	28.1

a. In some countries employees of state-owned enterprises belong to PAYG schemes similar to those available for civil servants; in others they belong to separate funded schemes.

b. Participation rates are probably underestimated because there are no consistent data on coverage of voluntary occupational pension schemes.

c. Firms can be exempted from the national program as long as they offer workers a program with a similar set of benefits (known as an exempt occupational fund). In addition, in India certain occupations covered by special statutes (such as coal mining) have separate exempt occupational schemes.

d. This scheme, still under development, will be an extension of the new defined contribution scheme for civil servants (see chapter 4).

e. Private firms can contribute to the national provident fund or set up a provident fund of their own (an exempt occupational fund) with similar benefits if managed by an authorized entity.

f. The government sponsors quasi-income support, quasi-contributory programs for low-income groups (farmers, fishermen, and the self-employed).

Source: World Bank.

substantial pool of long-term savings, but these are not being invested efficiently. More important, demographic and economic changes will put increasing pressure on traditional informal institutions for old-age support. Pressure to expand coverage of pension schemes is already being felt. But the region lacks robust platforms of pension arrangements that would allow coverage to be extended to other groups of workers with the ability to save toward their old age.

Moreover, even if the performance of contributory pension schemes were improved and incentives to participate sharpened, important parts of the population are likely to remain uncovered, such as poor people with little or no capacity to save. Additional public policy interventions will be necessary to mitigate poverty during old age. Holzmann and Hinz (2005) suggest a multi-pillar pension system to address and manage the risks of aging. Public interventions to assist the destitute elderly are already available in many countries in South Asia, but there is a need to understand their impact and efficiency better. These schemes involve trade offs, targeting challenges, and critical affordability issues. This opens a challenging and complex research agenda that merits special analysis on a country-by-country basis outside the scope of this report.

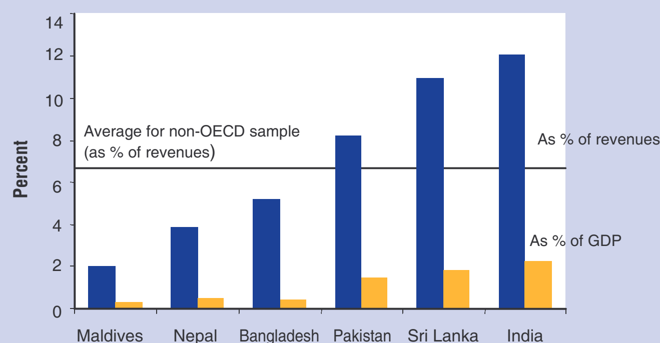
The historical legacy

The design of formal retirement income schemes in South Asia was influenced by the region's close historical ties to the United Kingdom, and for the most part the system has changed little during the past half century. Formal pension schemes for civil servants were introduced in the first half of the 19th century by the British colonial administration. In the second half of the 20th century, influenced by universal coverage in the industrial world, India, Nepal, Pakistan, and Sri Lanka introduced separate retirement savings plans for the private sector. Participation in these programs remains limited, however, with coverage generally extending to less than 10 percent of the population ages 15-59-and less than 5 percent in Afghanistan, Bangladesh, and Nepal (see table 1). Civil service schemes still dominate the pension landscape in most of South Asia.

Civil service pension schemes: growing liabilities

Until recently the entire region maintained the civil service pension systems inherited from the British-defined benefit schemes run on a pay-as-you-go basis. As these unfunded schemes matured, the magnitude of the hidden pension debt started to become evident. As a share of GDP, pension spending in South Asia does not appear to be high relative to that in other regions. But small tax bases in South Asia mean that the same ratio of pension spending to GDP will be less sustainable. In India, Pakistan, and Sri Lanka pension spending for civil servants as a share of tax revenues already surpasses the average for developing countries (figure 1). Globally, Sri Lanka's ratio of pension spending to revenues is

Figure 1
Public sector pension spending is reaching high levels in some South Asian countries



Note: Data are for 2002, except India's and Pakistan's that are for 1999. Expenditures include pensions and commuted amounts but not gratuity and health obligations.
Source: World Bank staff estimates.

second only to Brazil's. Even more worrisome, across the region these expenditures support only a small share of the population (table 2).

The benefit targets implied by the parameters of civil service pension schemes are generally high, both relative to the lifetime earnings of workers -especially in Bangladesh, Bhutan, Nepal, and Sri Lanka- and compared with target replacement rates in OECD countries. Nevertheless, discretionary rules often mean that retirees receive substantially lower benefits in reality.

But what explains the relatively generous implied benefit targets? One plausible explanation is that they enable governments facing tight budget constraints to borrow from the future to increase the compensation of current employees. Because no evidence of this obligation appears in the fiscal accounts, the policy imposes no penalty on policymakers. It has also been argued that large pensions compensate for public-private wage differentials penalizing civil servants, but the evidence in South Asia does not seem to support this. Indeed, the available evidence suggests that most civil servants, especially those in lower grades, receive a wage premium over private sector workers-and that their pensions add to this premium. But this extra compensation in the form of pensions appears to contribute little to recruitment objectives. And providing generous pensions for the vast majority of civil servants to address the wage compression problems of a few in the senior ranks is a very expensive strategy.

Motivated largely by fiscal pressures, several countries in South Asia are considering or already undertaking reform of civil service pension schemes. In Afghanistan pension spending is temporarily low, but the government is considering changes in the context of a broader reform to the civil service compensation package. Bhutan is considering parametric reforms to the defined benefit component of its pension scheme. India introduced a defined contribution scheme in January 2004 for new entrants to the federal civil service. And Sri Lanka introduced a contributory defined benefit scheme in late 2003. Although the Indian and Sri Lankan schemes are both contributory, sharp differences in design will lead to markedly different outcomes (as discussed below in the section on reforming pension schemes). Countries considering reforms have many options, but they need to adapt reforms to local conditions and take into account the broader civil service compensation package as well as the need for labor mobility between the public and private sectors.

TABLE 2

Estimated unfunded liabilities of civil service pension schemes in selected South Asian countries

Country (or state) and base year	Implicit pension debt		Groups covered[a]
	As % of GDP	As % of revenues	
Tamil Nadu (2002)	33[b]	-	All civil servants (1.1)
Nepal (2002)	15	150	Civil servants excluding teachers (0.4)
Sri Lanka (2002)	60	285	All civil servants and military (4.7)
Bhutan (2004)[c]	22	212	All civil servants and military (2.6)
Pakistan (2003)	33	252	Federal and provincial civil servants

- Not available
a. Figures in parentheses are percentage of population represented by the group or groups shown.
b. Liability reported as a percentage of gross state domestic products.
c. Bhutan is the only country with reserves to partially cover this liability.
Source: World Bank staff estimates using PROST (Pension Reform Option Simulation Toolkit) model and assuming price indexation and 4 percent discount rate.

Mandatory retirement savings schemes: minimal coverage for the private sector

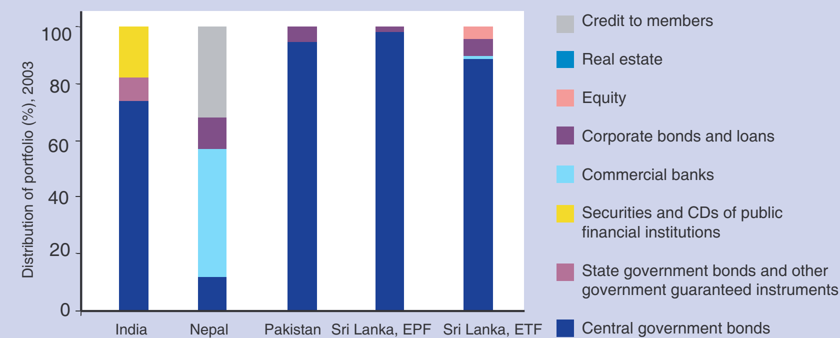
Four countries in the region have introduced mandatory retirement programs for private sector workers, though coverage remains minimal except in Sri Lanka.[1] Nepal and Sri Lanka have defined contribution schemes, or provident funds. Pakistan established a defined benefit scheme. And India

has a two-pillar system with a defined benefit and a defined contribution component. India and Sri Lanka have allowed large firms offering their employees similar plans to be exempt from the national plan, and in Nepal firms can contribute to the national plan or set up a similar program if managed by an authorized financial entity. The national schemes are centrally administered, including their fund management.

While the programs for civil servants have been a drain on the budget, mandatory schemes for private sector workers continue to record positive cash flows, providing an easy source of financing for governments-often to the detriment of participants (figure 2). Reconsidering the investment policies for these funds is critical given the sizable assets accumulated and the potential for adverse effects on the future retirement income of workers. While the national agencies responsible for these plans have undertaken the administrative tasks, the government, explicitly or implicitly, has determined investment policies. Transparency and disclosure, essential pillars of a strong governance framework, have been very poor.

Figure 2

Public debt dominates portfolios of mandatory pension schemes in South Asia



Source: India, Employees Provident Fund Organization; Nepal, Employees Provident Fund; Pakistan, Employees Old-Age Benefits Institution; and Sri Lanka, Employees Provident Fund.

Moreover, these programs have for the most part proved to be a poor retirement income tool for participating workers. Provident funds have tended to resemble long-term savings plans rather than retirement income programs, with members often having to rely on other sources of income after retirement. Although improving in recent years, the funds' investment performance has been feeble, adversely affecting members' balances. Defined benefit schemes, established more recently, still have a young demographic profile. But their positive cash flows mask growing pension liabilities and challenges to their long-term sustainability. At the heart of these problems is a serious imbalance between the high replacement rates promised relative to the contribution rates paid. The long-term viability of these programs must be addressed before benefit promises become deeply entrenched, but the lack of disclosure of actuarial plans has discouraged an open debate.

Centralized mandatory pension schemes for private sector workers in South Asia have traditionally offered poor service to members. Record keeping is greatly deficient, and compliance by employers apparently low. With no unique identification numbers for members, accounts are often duplicated-sometimes many times over-with the result that some members lose access to part of their retirement savings. Sri Lanka's Employees Provident Fund, for example, had 1.9 million active contributors at the end of 2003-but around 9.7 million accounts.

Although national provident funds lack credibility, "exempt" occupational pension funds in India and Sri Lanka-benefit plans offered by large employers exempt from the national plan-are declining in number and have failed to create a good benchmark for the national funds. A

combination of factors-regulatory constraints, inadequate supervision, and lack of professional management (especially in Sri Lanka)-has contributed to this outcome. In 1996 Sri Lanka prohibited the licensing of new exempt funds. While subsequent governments have worked to develop a new regulatory framework for private pension funds, no law has been enacted yet.

Voluntary pension schemes: a lackluster performance

Voluntary occupational schemes appear to provide only modest coverage in South Asia. Nevertheless, these programs have started to fill a gap for formal sector workers in countries where there are no mandatory retirement savings arrangements or where these provide only modest benefits. Personal retirement plans are offered by some financial institutions, but these play a minimal role. In addition, the governments of India and Nepal have sponsored voluntary long-term savings plans for the general public, though outreach has been limited.

The potential performance of occupational plans has been undermined by overly rigorous investment restrictions together with limited development of local markets and nonprofessional management. Lacking professional asset management, many funds have pursued excessively conservative portfolios, to the detriment of potential long-term returns. Government instruments and bank deposits dominate portfolios. Equities tend to be almost entirely underrepresented. And regulations have precluded foreign investments. Yet investment guidelines have failed to cover one of the most critical risks in employer-sponsored plans-self-lending.

Voluntary occupational plans in South Asia have historically lacked effective supervision. The primary oversight has come from the government agency responsible for income tax, which confirms that deductions are eligible but has no interest in ensuring that appropriate contributions are made, reasonable returns earned, assets properly safeguarded, and participants properly informed about the plan's performance. India and Sri Lanka are the only two countries requiring defined benefit plans to obtain external actuarial valuations.

Why undertake reforms now?

Retirement income plans for the formal sector have for the most part performed poorly-both for their participants and for the economy. But while several countries in the region are exploring or already introducing reforms of civil service pension schemes, the performance of retirement income schemes available to the rest of the formal sector has received far less attention. The policy framework for most of these programs has barely changed since they were created, in some cases nearly half a century ago. Moreover, these schemes involve even more complex political economy issues, because governments have often used their funded (or partially funded) structures to address fiscal gaps.

Now is a critical time to consider more broadly the problems affecting retirement income schemes for the formal sector. The two defined benefit programs in India and Pakistan, for example, have not yet matured. As time passes, future pension promises will become more deeply entrenched, making reform even more challenging. And as funded plans continue to grow, there is a risk of further misallocation of savings. Perhaps more important, there are encouraging signs of economic growth in the region and thus good possibilities for expanding the coverage of these programs. But even as a growing number of younger workers join the formal labor market and thus formal retirement schemes, urbanization is likely to weaken traditional informal arrangements for the elderly, including intrafamily transfers. Strengthening retirement income schemes for the formal sector will help the region better prepare for the demographic change occurring over the next half century.

A framework for reforming pension schemes for the formal sector

Although details vary across schemes, many issues and themes are common to several countries in South Asia. Here, a framework is outlined for improving the performance of pension schemes for the formal sector.

Combining modest mandatory pillars with expansion of voluntary retirement schemes

Mandatory schemes (especially provident funds) need to make retirement income objectives and target replacement rates more explicit. But high replacement rates are best avoided because of the tradeoffs between current and future consumption. High replacement rates require high contribution rates, which could result in current welfare losses. Even in the formal sector younger workers may be better served by having greater flexibility in managing their savings and life events. Workers could complement the mandatory benefit with voluntary arrangements. In countries that do not already have mandatory pension plans, creating such plans seems premature at this stage of their economic development.

This strategy calls for wider availability of efficient voluntary retirement income systems. Multiple approaches should be encouraged, including personal plans and occupational pension schemes. Occupational schemes have a long tradition in the region, though their role and performance could be greatly improved under a more robust regulatory and supervisory framework. India plans to make available its new platform of pension arrangements for new civil servants to the broader working population on a voluntary basis. The structure of this platform, with centralized administration and decentralized asset management, represents a novel and interesting approach, though it could be difficult to replicate in countries with a weaker governance structure.

Reforming compensation as well as pension schemes for the civil service

Reform of civil service pension schemes in South Asia will need to take into account the overall compensation package. Offering generous pensions to all civil servants to address wage compression problems affecting a few senior officials appears to be too costly. Reform also needs to ease the mobility of labor between the public and private sectors. This could be done by introducing design features in the civil service pension scheme that would facilitate the portability of benefits or by harmonizing schemes for public and private sector workers over the long run. Some countries could even consider a common scheme offering a modest replacement rate along with the possibility of a supplement for all civil servants or senior ones. A few countries around the world have taken this approach.

Besides supporting labor mobility, the harmonization of schemes can allow the sharing of institutional arrangements, avoiding duplication. In India, for example, future reforms to the pension scheme for private sector workers should explore the benefits of greater harmonization and sharing of institutional arrangements with the newly created scheme for new entrants to the civil service.

Exploring multiple design options for mandatory and civil service schemes

International experience points to multiple options in designing pension systems for formal sector workers. Many countries are moving toward greater funding, driven primarily by concerns about long-term financial sustainability. Most of these countries have established defined contribution structures (privately managed) rather than defined benefit schemes-because defined benefit schemes retain an open-ended liability for the sponsor (which, for mandatory schemes for civil servants or the private sector, is the government). The recent pension reforms affecting new civil servants in India

and Sri Lanka best illustrate these differences. India's defined contribution scheme for civil servants will be fully funded, while Sri Lanka's scheme will start to show a deficit in four to five decades.

Moreover, if funds are not invested in a diversified portfolio, there will be little difference between a pay-as-you-go defined benefit scheme and a contributory defined benefit scheme fully invested in government obligations. To diversify risks, some countries have established a two-pillar structure (mostly an unfunded defined benefit and a funded defined contribution component), with the relative importance of each pillar and the level of funding varying across systems.

TABLE 3
Initial conditions for reform of civil service pension schemes in South Asian countries

Country	Short-term pension spending	Implied benefit promise	Domestic environment for funding[a]	Institutional capacity for funding
Afghanistan	Low	Unclear	Very weak	Very weak
Bangladesh	Moderate and rising	High	Very weak	Very weak
Bhutan	Low and rising	High	Very weak	Weak
India	High	Low	Good	Good
Maldives	Moderate[b]	Highb	Weak	Good
Nepal	Moderate and rising	High	Very weak	Weak
Pakistan	Moderate and rising	Moderate	Moderate	Moderate
Sri Lanka	High	High	Moderate	Good

a. Based on capital market depth and liquidity and the potential for an effective pension supervisor.
b. Takes into account benefits and spending on elderly civil servants who are still active.
Source: World Bank staff estimates.

Countries in South Asia exploring reforms of large pension schemes-such as those for civil servants-should consider whether the local environment is appropriate for funding (table 3). Funding reforms are demanding in terms of initial conditions-requiring well-developed financial markets, experienced fund managers, and supportive institutional arrangements, such as supervision of funded schemes and record keeping. One way to mitigate the challenges of a less favorable domestic environment is to limit the proportion of the overall system that is funded. For example, a funded scheme could cover only younger workers or new entrants or form a modest part of a larger two-pillar structure. Small countries and those with a weak domestic environment introducing a funded component will generally need to rely extensively or fully on offshore investments and the expertise of international investment managers.

Countries with no viable solutions for funding can instead consider parametric reforms. These could include changes to accrual rates, earnings bases, indexation methods, vesting periods, and eligibility criteria. These reforms could help eliminate features leading to arbitrariness in the treatment of participants, facilitate the portability of benefits between the public and private sectors, and enhance financial sustainability. In addition, all countries in the region need to promote better accounting and disclosure of pension liabilities.

Fostering competitive fund management

New funded schemes in South Asia should avoid centralized asset management and permit competition. Large, centralized asset management structures have not had a positive history in South Asia and have eased the way to using pension fund resources for fiscal support. Nor would government participation in capital markets through investments of centralized pension funds be advisable, because of the risk that investments would be used to achieve other political objectives and

because of the economic distortions likely to result. India's proposed new defined contribution scheme, offering portfolio choice and competitive fund management, represents an important step forward and a marked departure from traditional practices.

Existing national provident funds in India, Nepal, and Sri Lanka will also need to improve governance and move toward more efficient decentralized fund management structures with portfolio choice. Because of the difficult local conditions, changes can be expected to occur only gradually. The situation in Sri Lanka is probably the most challenging because the national provident funds are so large relative to domestic financial markets. Fund management could be gradually decentralized through a combination of options: outsourcing asset management, opting out a share of accumulated assets, and fostering choice and competition through occupational pension funds.

In India and Pakistan mandatory defined benefit plans also are likely to accumulate sizable reserves over the medium term. Improving their governance and asset management will be vital to strengthen their financial viability. In the short term governments could focus on increasing disclosure. In the medium term they should deepen governance reforms and explore progressive outsourcing of asset management.

Strengthening administration

Efficient administration will be critical to support pension reform, especially in funded schemes. Most mandatory retirement savings schemes in South Asia face serious administrative problems, including duplication of accounts. While it is encouraging that some institutions are already initiating small changes to enhance record keeping, more needs to be done in registration and collection of contributions; record keeping on accounts and provision of information to members; and payment of benefits. In all these areas there is great scope for redesigning processes and investing more in information technology to increase efficiency.

Building stronger foundations for retirement savings schemes

The success of all these strategies will hinge on developing an environment more favorable to the robust growth of funded pension schemes, including a modern regulatory framework, strong supervisory capacity, and a more flexible investment regime. After years of neglect of pension regulation and supervision, some encouraging changes are under way in India and Pakistan. India plans to establish an independent body, the Pension Fund Regulatory and Development Authority, to oversee the new pension scheme. An interim agency has been set up, and draft legislation is under discussion in Parliament. In Pakistan the Securities and Exchange Commission has issued initial regulations for pension funds, and a draft law further strengthening its capacity to regulate and oversee voluntary pension schemes has been presented to Parliament.

In the future both these institutions will need their authorities expanded to other pension plans, including publicly administered plans. And given initial conditions, public pension funds will probably need a transition period to adjust to a sounder regulatory framework. But beginning now, small steps can be taken by encouraging greater disclosure.

Other countries in the region also will need to review pension regulation and identify the most suitable institutional structure for pension regulation and supervision. Because of limited resources, integrating this function with an existing supervisory institution may be desirable in most circumstances.

More flexible investment regimes are needed to foster healthy portfolio diversification by both public and private pension funds. Current restrictions have penalized members, with private securities underrepresented in pension portfolios across the region. But greater flexibility will not yield benefits unless the fiscal situation improves throughout the region. Weak fiscal environments increase the volatility of financial markets and the vulnerability of financial institutions. Given the region's nascent capital markets, a gradual lifting of restrictions on foreign investment also will be desirable, to broaden opportunities for diversification. And healthy growth of funded pension schemes will require a strong parallel commitment to financial sector development.

What are the expected gains from reform?

Reforming pension schemes for the formal sector could yield important benefits for the economy. The civil service pension schemes in most South Asian countries appear to have large unreported liabilities relative to GDP and to the supporting tax base. In Sri Lanka this liability is as much as 60 percent of GDP. As mandatory defined benefit plans in India and Pakistan mature, they too will face challenges to their financial sustainability. Without reform, these schemes could claim a large share of resources to assist a small share of the population. Reform could prevent the crowding out of critical investments in human development and infrastructure-and free resources to extend safety net programs to the elderly poor.

In addition, restructuring pension schemes for civil servants (or in some cases unifying them with those for private sector workers) could remove constraints to the portability of benefits from the public to the private sector. Most civil service schemes tie the pension benefit to the final wage, penalizing workers who try to exit the civil service before reaching the retirement age. And most schemes are not designed to allow portability of benefits. Removal of these constraints, along with other amendments to civil service compensation and exit rules, could change labor market incentives and encourage greater labor mobility between the public and private sectors.

Moving toward funded pension schemes opens opportunities for strong synergies to arise between these schemes and local financial markets. In some countries, such as India and Sri Lanka, pension funds could become a major force in the development of a vibrant secondary mortgage market and other forms of term finance for the banking system. Banks would in turn be able to extend longer-term credit to small and medium-size enterprises, expanding their investment and growth opportunities. Pension funds could also become important investors in corporate bonds and eventually in equity. Not all countries in South Asia will benefit equally from these potential synergies, which require certain initial conditions and a minimum market size. Small countries with highly concentrated financial markets and countries where governance practices are poor, private firms are reluctant to disclose their accounts or dilute ownership, and most large firms are publicly owned will have less opportunity to benefit.

Reform should also bring important gains for individuals. In the past the feeble performance of mandatory retirement income schemes led members to perceive these as a "quasi tax" rather than as a source of retirement income. More efficient management of retirement income schemes should improve benefits and provide a more secure and reliable source of income for retirement. And expansion of voluntary retirement income systems will create new opportunities to save for old age, complementing more traditional arrangements.

Developing solid pension arrangements for the formal sector will be the starting point for expanding coverage. Experience elsewhere shows that as structural changes in the economy continue

and the formal labor market gradually expands, pension schemes will slowly be able to embrace a larger share of the population. In the medium term, however, existing schemes in South Asia will be unable to cover most of the active population. Additional public interventions will probably be needed as part of a comprehensive, multipillar pension strategy to address risks related to aging. This subject is of prime importance and merits special investigation complementing this report.

Notes

1. The mandatory scheme in Sri Lanka covers 12.7 percent of the working-age population, or 65 percent of the eligible population. Coverage in the other three countries is far smaller and as little as 0.5 percent of the working-age population in Nepal.

CHAPTER 1

Challenges Facing Retirement Income Schemes in South Asia

Formal retirement income schemes cover only a modest share of the population in South Asia, yet their performance is becoming a growing concern for policymakers. The performance of these schemes not only affects the welfare of their participants. It also matters for the rest of the population-for three reasons: long-term social policy challenges, rising fiscal costs, and economic inefficiencies.

The challenges of old-age income security in South Asia

Current patterns suggest that only around 1 in 10 of South Asia's half a billion workers will enter old age with a pension related to preretirement earnings. Among the workers covered by a formal retirement income scheme, almost half are public sector employees, while most of those in the private sector work for large firms. Workers in rural areas, where poverty is greatest, are rarely covered except in Sri Lanka. In short, coverage of formal retirement income schemes in South Asia is low and tends to be concentrated in the formal sector, a common pattern among low-income countries with large rural economies.[1]

Growing vulnerability of informal arrangements for old-age support

Informal institutions such as intrafamily transfers serve as an important source of old-age income support in South Asia, as they have for centuries. In India, the 1994 National Sample Survey points to high coresidence rates, with fewer than 4 percent living alone (World Bank 2001). Preliminary findings by Rajan, Perera and Begum (2005) suggest high rates of coresidence in Bangladesh and Sri Lanka as well.[2]

Although relatively little is known about exactly how these informal arrangements work, several studies have found that they are not always adequate (Dreze and Srinivasan 1997; Kochar 2000; Pal 2004). Many households are too impoverished to provide sufficient transfers to the elderly, with the result that they often work until they become too frail to continue.[3] In other cases children with adequate means will not make adequate transfers. Where the elderly must rely on informal family support systems, it is those without children who are especially vulnerable.[4]

Changing demographic patterns and increasing urbanization in South Asia over the coming decades are bound to strain informal systems of old-age support. The region's population is relatively young today, but the share over 60 is expected to increase from 7.1 percent in 2000 to 15.6 percent in 2045. This ratio will at least double in all countries of the region except Afghanistan and Bhutan (figure 1.1). In Sri Lanka, the region's most rapidly aging country, the ratio is expected to increase by a factor of 2.6, reaching a level in 2045 comparable to that in the oldest OECD countries today. In India the overall ratio hides big disparities across states, with populations in the southern states (such

as Kerala and Tamil Nadu) aging at a rate closer to that of Sri Lanka than to the rate for India as a whole.

Driving these demographic changes are the decline in fertility rates and increase in life expectancy over the past 40 years, trends that will continue in coming decades (see annex 1). With lower fertility rates, children may no longer be a reliable source of support in old age. The rapid urbanization under way in much of South Asia will add to this, contributing to the erosion of traditional norms and establishing a physical distance between children and parents.[5]

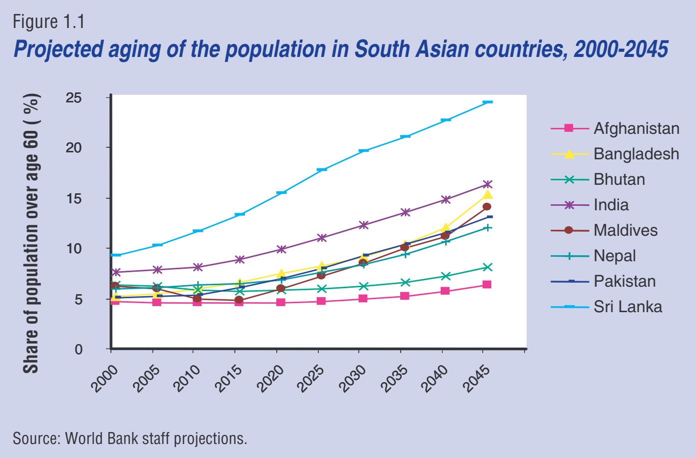


Figure 1.1
Projected aging of the population in South Asian countries, 2000-2045

Source: World Bank staff projections.

The pressure that such structural changes exert on traditional arrangements for old-age support has been observed in industrial countries. In Japan and the Republic of Korea, for example, rates of coresidence have been declining steadily (Knodel and Debavalya 1997; Martin 1990). In the United States, while more than 75 percent of the elderly resided in multigenerational households at the beginning of the 20th century, this share fell to about 20 percent by the 1990s (Costa 1998).

Increasing pressure for expanding the coverage of formal retirement income schemes

While there is little evidence today that the elderly in South Asia suffer higher poverty rates than other groups, changing household structures and declining fertility suggest greater vulnerability for the elderly in coming decades unless coverage of formal arrangements expands.[6] But South Asia lacks robust platforms of pension arrangements that would allow coverage to be extended to other groups of workers with the capacity to save toward their old age.

Pressure to expand coverage of formal retirement income programs is already being felt. In countries that have responded to this pressure, initiatives for the informal sector have tended to create new parallel schemes, in part because of weaknesses in existing pension programs. This has been the approach in India and Sri Lanka, for example (see the following section). Among the problems with this approach are restrictions on portability of benefits and duplication of bureaucracy, which raises administrative costs. Meanwhile, a growing number of elderly will rely on social safety net programs with limited resources.

So while formal retirement income schemes may cover only a modest share of the population in South Asia, long-term social policy considerations show the importance of reforming these schemes. A weak foundation for expanding coverage ties the hands of future governments and makes adjusting to the needs of an aging population more difficult.

Even if formal retirement income programs were improved and incentives to participate sharpened, however, important parts of the population are likely to remain uncovered, such as poor people with little or no capacity to save, the low-income self-employed, and seasonal workers. In India, for example, a recent study found that a small segment of the agricultural population had both the capacity and the desire to save for old age-yet including all of this segment would add only marginally to the overall coverage rate (see ADB 2005).

Mitigating poverty during old age will therefore require additional public policy interventions. Holzmann and Hinz (2005) suggest a multipillar pension system to address and manage the risks of aging. A multipillar approach might include a noncontributory, basic pension-or "zero pillar"-to provide a minimum income along with mandatory contributory systems, voluntary savings arrangements, and informal intrafamily support.[7] The relative importance of these pillars would vary across countries at different stages of development.

Public programs to assist the destitute elderly already exist in many countries in South Asia, but a better understanding of their impact and efficiency is needed.[8] These schemes involve tradeoffs, targeting challenges, and critical issues of affordability, raising challenging and complex research questions that merit country-by-country analysis beyond the scope of this report. Studies analyzing public support for the elderly poor are already under way in several South Asian countries.[9]

Overview of formal retirement income schemes in South Asia

The design of formal retirement income schemes in South Asia was influenced by the region's close historical ties to the United Kingdom. The first formal pension schemes were introduced in the first

TABLE 1.1
Main retirement income programs in South Asia

Country	GNI per capita (US$) 2003	Programs for civil servants[a]	Mandatory programs for private sector workers	Voluntary programs[b]	Coverage of population ages 15-59 (%), 2003
Afghanistan	207	Pay-as-you-go (PAYG) defined benefit	None	None	0.9
Bangladesh	400	PAYG defined benefit; provident fund	None	Limited occupational schemes	2.1
Bhutan	720	PAYG defined contribution; provident fund	None	Very limited occupational schemes	4.3
India	540	PAYG defined benefit; defined contribution scheme for new workers as of 2004	National provident fund; partially funded defined benefit; exempt occupational funds[c]	Public provident fund; occupational schemes; personal plans; new pension scheme[d]; defined benefit for low-income beneficiaries with subsidy component	8.9
Maldives	2,300	PAYG defined benefit; provident fund	None	Publicly managed provident fund	18.4
Nepal	240	PAYG defined benefit; provident fund	National provident fund; exempt occupational plans[e]	Limited occupational schemes	2.7
Pakistan	520	PAYG defined benefit	National defined benefit (partially funded)	Limited occupational schemes	5.8
Sri Lanka	930	PAYG defined benefit; funded defined benefit for new workers as of late 2003	National defined contribution plans; exempt occupational plans[c]	Occupational schemes[f]	28.1

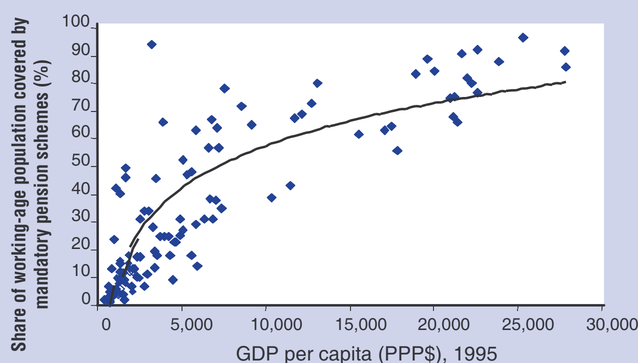
a. In some countries employees of state-owned enterprises belong to PAYG schemes similar to those available for civil servants; in others they belong to separate funded schemes.
b. Participation rates are probably underestimated because there are no consistent data on coverage of voluntary occupational pension schemes.
c. Firms can be exempted from the national program as long as they offer workers a program with a similar set of benefits (known as an exempt occupational fund). In addition, in India certain occupations covered by special statutes (such as coal mining) have separate exempt occupational schemes.
d. This scheme, still under development, will be an extension of the new defined contribution scheme for civil servants (see chapter 4).
e. Private firms can contribute to the national provident fund or set up a provident fund of their own (an exempt occupational fund) with similar benefits if managed by an authorized entity.
f. The government sponsors quasi-income support, quasi-contributory programs for low-income groups (farmers, fishermen, and the self-employed).
Source: World Bank.

half of the 19th century by the British colonial administration, initially only for civil servants.[10] Like the retirement arrangements in place for U.K. civil servants at the time, these schemes were noncontributory and financed from the general budget. After achieving independence in the middle of the 20th century, the region's former British colonies reestablished these schemes for civil servants, usually without changing their design.

In the second half of the 20th century, influenced by universal pension coverage in the industrial world, India, Nepal, Pakistan, and Sri Lanka introduced laws requiring private employees of mostly large firms to participate in a retirement scheme of some kind (see table 1.1 and annex 2). The resulting plans were generally structured as defined contribution schemes (provident funds) similar to the occupational pension plans popular in the United Kingdom. Pakistan's mandatory national scheme, created later, in 1976, relies on a defined benefit structure, while India introduced a defined benefit scheme in 1995 to complement the provident fund established in 1952. The coverage of these schemes falls far short of universal, however, and civil service schemes still dominate the pension landscape in South Asia. In most countries in the region the broad design of pension schemes remained largely unchanged during the last four decades of the 20th century. In more recent decades, however, a few contributory and quasi-contributory programs have been developed for the informal sector, mainly in India and Sri Lanka.[11]

Figure 1.2

Pension system coverage and income per capita in 104 countries

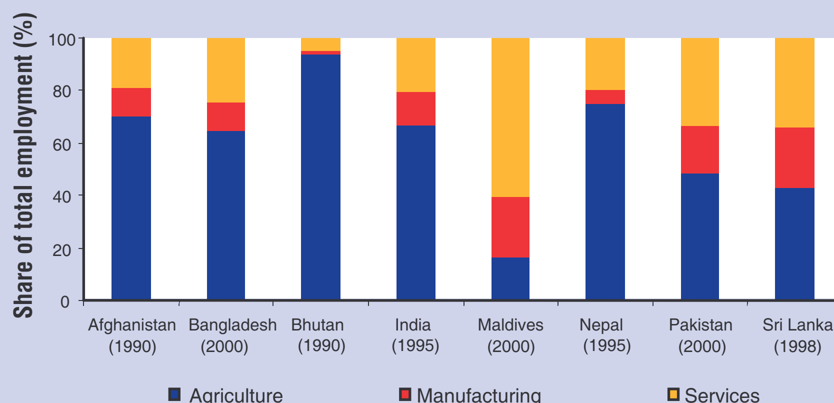


Note: Coverage data are for various years between 1989 and 2001.
Source: World Bank.

The low participation rates in South Asian countries' pension programs are fairly consistent with patterns observed in other low-income countries with an extensive informal sector and a substantial rural population largely engaged in subsistence activities (figure 1.2). Excluding the Maldives, gross national income (GNI) per capita in the region ranges from about US$200 in Afghanistan to US$930 in Sri Lanka (see table 1.1). Agriculture remains the primary source of employment in most countries (figure 1.3).

Figure 1.3

Employment by sector in South Asian countries, various years



Source: World Bank

Sri Lanka is a notable outlier, however, with coverage of formal retirement income schemes approaching 30 percent of the population ages 15-59. Its higher coverage is explained

largely by its stronger human capital, the greater formalization of its economy, and the broad participation in its farmers' scheme, which now covers more than 700,000 farmers. The Maldives also has higher coverage rates, though the reason is that about 30 percent of its labor force is in the public sector. Coverage rates in the rest of the region are among the lowest in the world.

Emerging fiscal, economic, and social concerns for formal pension schemes

While the design of most formal pension systems in South Asia has remained broadly the same since their inception, new challenges-including fiscal, economic, and long-term social policy needs-are forcing policymakers to reconsider that design.

Pension schemes for civil servants have already become a fiscal burden in many South Asian countries and are crowding out critical investment spending to accelerate growth and poverty reduction. South Asian countries have a much smaller taxable share of GDP than industrial economies, and their capacity to collect taxes is generally weaker. Yet many are spending a very large share of their limited budgets on civil service pensions, even as they struggle with persistent fiscal deficits (table 1.2; see annex 8 for more data on macroeconomic indicators). Civil service pensions now claim more than 10 percent of annual revenues in three countries, and preliminary evidence suggests that their cost will escalate in coming decades. This spending, targeted to a small group, is crowding out investments in infrastructure and human development that would benefit a much wider segment of the population, including the poor. Such investments are badly needed: South Asia is home to a larger number of poor people than any other region, its human development indicators are disturbingly low, and much of the population still lacks access to basic infrastructure services such as roads, water, and electricity. Growing concerns over the escalating costs of civil service pension schemes are motivating reforms in several countries in the region.

Mandatory pension programs for the private sector are primarily defined contribution and therefore self-financing by definition. However, preliminary evidence on mandatory defined benefit programs in India and Pakistan, as well as publicly sponsored voluntary programs in Sri Lanka, suggests that these plans too are accumulating sizable pension obligations for the future. (Although actuarial studies have been conducted to measure future pension obligations, their findings are not available to the public.) Today's positive cash flows are misleading: these plans, now young, will experience growing deficits upon reaching maturity.

TABLE 1.2

Selected macroeconomic indicators for South Asian countries, 2004

Country[a]	Annual GDP growth (%)	Annual Inflation (%)	Fiscal accounts (% of GDP)		
			Revenue	Expenditures	Fiscal deficit
Afghanistan	8[b]	14[c]	9.2[d]	9.8	0.6
Bangladesh	5.5	5.8	10.2	13.4	3.2
Bhutan	5.9	3.5	36.5[d]	41.2	4.7
India[e]	8.6	3.9	18.8	28.7	9.9
Maldives[f]	8.4	-2.9	33.2	38.2	5.0
Nepal[g]	3.5	4.0	12.3	16.2	3.9
Pakistan	6.0	4.6	14.5	16.9	2.4
Sri Lanka[f]	5.2	7.6	15.8	23.9	8.1

a. Data are for July 2003-June 2004 except where otherwise noted.
b. Data are for July 2004-June 2005.
c. Data are for end-February 2005.
d. Data includes grants.
e. Data are for April 2003-March 2004.
f. Data are for January-December 2004.
g. Fiscal year ending July 15 2004.
Source: International Monetary Fund (IMF), International Financial Statistics; World Bank and IMF staff estimates.

Through their design and performance, South Asian pension programs also undermine the efficiency of labor markets. Civil service pension programs, rarely designed to allow portability of accrued pension rights, have constrained the mobility of labor between the public and private sectors. Most mandatory pension programs for the private sector are characterized by poor performance, which fosters evasion and, together with other regulatory burdens, discourages formalization of the economy. A rapid process of urbanization is under way in much of South Asia, with most new urban residents ending up in informal employment.

Moreover, while some pension programs are accumulating substantial long-term savings, these savings are not being efficiently allocated. Assets are invested primarily in public sector instruments, leaving the private sector deprived of long-term finance and hurting the broader economy though forgone opportunities for growth. Centralized public fund management explains much of this phenomenon. Sri Lanka is probably the most striking case: its mandatory pension funds, which hold assets amounting to more than 20 percent of GDP, invest more than 95 percent of those assets in public instruments. As a result of such investment patterns and poor investment returns, national provident funds have been an opaque-and inequitable-form of taxation for much of their history. Progress has been made in recent years, with plans offering their members better rates, but with few exceptions portfolios remain heavily weighted toward public sector products. The picture for private pension funds is little different, with restrictive regulations on their investments also favoring public sector investments. Thus Indian pension funds, for example, cannot invest in growing and dynamic Indian companies, while OECD pension funds can.

As a growing literature asserts, pension funds can have positive effects on the economy by contributing to the development of financial markets. Walker and Lefort (2002) document this effect in Chile, for example. The potential effect on capital markets arises from the presence of a new class of institutional investors interested in longer-term instruments (see chapter 5). In India and Sri Lanka, however, the centralized management of provident fund assets coupled with overly tight investment regimes prevents these positive synergies from materializing. In addition, countries throughout the region lack the regulatory and supervisory infrastructure to promote sound pension fund management, though a few have recently started to take positive steps to address these gaps.

While there are opportunities for improving the management of funded schemes, policy solutions will need to vary across countries to accommodate differences in the depth and quality of capital markets and banking sectors. Options for reforming civil service schemes will similarly need to vary across countries, to take into account local financial market and other conditions.

As demographic changes and increasing urbanization exert growing pressure on traditional family support systems, the region needs to prepare itself for the challenges of an aging population. Most South Asian countries are experiencing positive economic growth that is generally favorable to the gradual expansion of formal pension systems. What is needed is a robust platform of pension arrangements to support this expansion, so that more households in a position to save can benefit from participation in retirement schemes.

Notes

1. Data on the incidence of coverage by these programs within the general income distribution are scarce, though many studies show that the groups covered by formal schemes-employees of the public sector and large private firms-receive higher wages than workers in the informal sector. A recent survey in India found that 80 percent of the members of the Employees Provident Fund Organization fell into the top two quartiles of the income distribution and that almost 99 percent of those in the poorest quartile were not covered.
2. Rajan, Perera, and Begum's findings should be interpreted with caution, since they are based on small samples.
3. In Bhutan, for example, about 55 percent of the elderly continue to work (World Bank 2005c).
4. Forthcoming World Bank studies will shed more light on the adequacy of informal support systems and their effect on the welfare of the elderly. A study in Sri Lanka will include a special sample survey to gather more detailed date on the factors determining coresidence, the role of the elderly in the household, and intrahousehold allocation of resources (World Bank 2005a). A similar survey will be conducted in India (World Bank 2005b).
5. For example, the urban population share in Pakistan increased from about 22 percent in 1960 to about 35 percent in 2000, while that in India rose from 18 percent to almost 30 percent (see annex 1).
6. In Bhutan preliminary estimates based on a 2003 household survey suggest a poverty rate for the elderly (age 60 and above) that, at 33 percent, is higher than the national average of 32 percent. But this is mainly because of the poverty rate among those over age 70 (36 percent), which reflects their greater vulnerability (World Bank 2005c; World Bank staff estimates). In Bangladesh, Nepal, Pakistan, and Sri Lanka preliminary estimates suggest poverty rates for the elderly below national averages, with rates for the group older than 70 approaching national averages (World Bank 2005d, forthcoming; Del Ninno, Vechhi, and Hussain 2005; and World Bank staff estimates). In Sri Lanka, for example, preliminary estimates based on a 2002 household survey suggest poverty rates of 18 percent for the elderly, 20 percent for the group over age 70, and 20 percent for the national average.
7. The basic pillar could be based on providing a small benefit to all individuals above a certain age (universal pension) or targeting the elderly poor through means testing or other mechanisms (Holzmann and Hinz 2005).
8. These safety net programs take the form of means-tested benefits targeted to the elderly (Bangladesh and India) or universal old-age benefits (Nepal) or are part of general social assistance programs (Pakistan and Sri Lanka). For more information, see World Bank (2005a, 2005b, 2005d), Holzmann and Hinz (2005), and Issues and Policy Consultants (2004).
9. See note 4 above.
10. In India the Honorable East India Company's Civil Service established an annuity scheme for its officers in 1826, and some voluntary retirement plans existed even earlier. In Sri Lanka the pension scheme for civil servants was established in 1901.
11. In India the Public Provident Fund is available to the entire population, including the unorganized sector, and the government plans to launch a new voluntary scheme using the institutional arrangements for the new contributory pension scheme for civil servants (see chapter 4). In addition, in 2004 the Ministry of Labor piloted a new defined benefit scheme with a large implicit fiscal subsidy for low-income groups. Preliminary evidence suggests that take-up among targeted groups has been relatively low, and new proposals have been presented to Parliament. Sri Lanka created three separate quasi-contributory, quasi-income support pension schemes for farmers (1987), fishermen (1990), and the self-employed (1996). The programs are still young, but they will involve a very large subsidy component once they mature. These Sri Lankan programs are not covered in this report because they merit comparative analysis with alternative public support programs for the elderly poor. See Eriyagama and Rannan-Eliya (2003) for a discussion of the programs.

CHAPTER 2

Civil Service Pension Schemes: A Rising Tide of Reform

Reforming pension schemes for government employees has become a fiscal priority in most of South Asia. Every country in the region except Bhutan maintained the defined benefit schemes originally set up under British rule. These schemes, run on a pay-as-you-go basis, have always been financed directly from the budget. As these unfunded schemes matured, the magnitude of the hidden pension debt started to become evident. Wages and interest payments already consumed a large share of tax revenues, and the growing pension bill further restricted governments' room for maneuver. Thus while there may have been other reasons for reforming civil service pension schemes, the fiscal pressure has become the most pressing one in many countries.

The extent of the problem varies across countries and even among the states of India and the provinces of Pakistan. Despite their common colonial ancestry, the schemes have evolved differently over the past 50 years. Even so, they share some similarities. One is an arbitrariness in their rules that undermines the schemes' consumption smoothing objectives. Even individuals planning to spend a full career in the civil service cannot be sure how much their income will decline after they retire. Beyond uncertainty, the arbitrariness leads to inequities among members, some of whom get a better deal than others. But as part of a broader compensation package, preliminary evidence suggests, civil service pensions add to the public sector wage premium prevalent in most of the region.

What are the future prospects for civil service pension schemes in South Asia? Historical hiring patterns imply that without reform, pension spending is likely to continue rising in most countries in the region. But some countries have already begun reforms. This chapter assesses recent reforms, in particular the different approaches taken by India and Sri Lanka, and provides guidance for other countries contemplating change, underlining the importance of adapting reforms to local conditions.

Analyzing scheme parameters

Most pension schemes for civil servants in South Asia share a number of common features. The most important is a defined benefit structure financed on a pay-as-you-go basis coupled with a defined contribution component that tends to contribute little to retirement income (table 2.1). Under the defined benefit component in all countries, civil servants with at least 10 years of service are eligible for a pension once they meet age or service requirements. The retirement age tends to be around 60 years, and the service period 20-25 years. Except in Bhutan, there are no contributions to the defined benefit component.

The earnings base used in determining pensions is the final salary (except in Bhutan) and usually excludes a significant share of remuneration in the form of allowances.[1] The most recent estimates of nonpensionable remuneration in South Asian countries fall between 10 and 40 percent of the total, so the effect of its exclusion is not trivial.[2]

Pension indexation is mostly discretionary. Only India indexes pension benefits to inflation. Nepal partially indexes pensions to the wages of specific posts, and Bhutan indexes pensions to changes in the average net wage of civil servants. These practices pose several problems, as discussed below.

TABLE 2.1

Key parameters of defined benefit schemes for civilian, central government civil servants in South Asia (2004)

Parameter	Bangladesh	Bhutan	India	Maldives	Nepal	Pakistan	Sri Lanka
Contribution rate							
Defined benefit	None	10%	None	None	None	None	None
Defined contribution	2-10%	6-10%	6-8%	Voluntary	20%	3-8%	None
Annual accrual rate	3.2%	2.0%[a]	1.52%	2.5%	2.0%	2.33%	3.0%
Earnings base[b]	Final salary	Lifetime revalued salary	Final 10 months' salary	Final salary	Final salary	Final salary	Final salary
Commutation factor	At least 50%	None	40%	None	None	40%	None[c]
Retirement age	57[d]	56 years[e]	60 years	None[f]	None[g]	None	60 years[h]
Minimum length of service for retirement	25 years	None	None	20 years	None	25 years	10 years
Minimum vesting	10 years	10 years	20 years	20 years	20 years	10 years	10 years
Minimum monthly pension	None	30% of average wage	Rs 1,310	None	50% of wage[i]	PRs 800	SL Rs 3,500
Indexation method	Discretionary	Net wage	CPI and ad hoc[j]	Discretionary	2/3 wage	Discretionary	Discretionary
Survivors' benefit (as share of pension)	100%	50%	30%	None	50%	50%	100%

Note: The table excludes Afghanistan because the parameters of its pension scheme are largely irrelevant to the actual benefits paid. It also omits recent changes in India and Sri Lanka, which introduced contributory schemes for new entrants to the civil service in 2004 and 2003 (for comparisons of the old and new schemes, see the section in this chapter on ongoing reforms).

a. Falling to 1.76 percent by 2026.

b. Definition of pensionable salary varies across countries. See text.

c. Sri Lanka pays two years' pension in exchange for a 10 percentage point reduction in the replacement rate for workers with fewer than 30 years of service. Workers with at least 30 years receive the unreduced pension and the two-year lump-sum payment.

d. Retirement mandatory at age 57.

e. Retirement age rising to 60 by 2026.

f. Active employees can receive pensions.

g. Pension paid out only at age 60. Lump sum of up to seven years' pension paid for earlier retirement depending on number of years left before retiree reaches age 60.

h. Retirement at age 55 possible with reduced pension.

i. Refers to the wage of the specific active employee, used for both calculating the minimum pension and indexing postretirement benefits.

j. Automatic indexation twice a year to changes in the consumer price index (CPI) plus discretionary increases. Indexation in state-level schemes may differ slightly.

The pension schemes for civil servants also differ in several important ways. The most obvious difference is in the accrual rates, which range from 1.5 percent to more than 3 percent a year. This range translates into large differences in the implied target replacement rates and in the relative generosity of the pension schemes. Another important difference is in the use of commutation rules: only three countries apply such rules, though Sri Lanka pays out a lump sum equivalent to two years' pension in addition to the pension. The tables used for calculating the commutation lump sums are not based on appropriate interest or mortality rates, which often results in an actuarially unfair payment, typically to the advantage of the pensioner (see annex 4 for the commutation formulas and their effect on pension incomes). Rules for minimum pensions and survivors' benefits also differ.

Mandatory contributions to the defined contribution component vary markedly, ranging from as low as 2-3 percent for low-income workers in Bangladesh to 20 percent in Nepal. In the Maldives the contributions are voluntary and are matched by the government. Only in Bhutan, where the assets are invested in a diversified portfolio, does this component contribute significantly to retirement income. In the other countries it resembles a long-term savings program rather than a retirement scheme because of high rates of withdrawal. Moreover, the funds tend to be transferred directly to the budget, with the government prescribing the rate of return on these notional accounts. In some cases (such as in Pakistan) these prescribed rates have exceeded market rates, leading to an implicit subsidy for civil servants.

Afghanistan presents a unique situation, with sharp differences between the basic rules and the actual benefits paid (box 2.1).

BOX 2.1

Afghanistan's civil service pension scheme: a fluid situation

Afghanistan has a pension system that has survived decades of war. But with the country in the midst of a dramatic economic and political transition, the system operates under great uncertainty and government discretion.

The statute of Afghanistan's unfunded, defined benefit scheme broadly resembles those in neighboring South Asian countries: target replacement rates are relatively high (100 percent after 40 years of service), and workers may retire after 25 years of service. A big difference, however, is that legal coverage extends to both public and private sector workers.

But the reality on the ground is a far cry from the statute. Coverage extends only to public sector workers-and these workers often fail to pay mandated contributions. The benefit formula is largely irrelevant. The pensionable wage base is a small fraction of cash compensation, and benefits are not automatically indexed. As a result, average benefits fell to roughly US$1 a month by 2003. Indeed, benefits were so low that of the more than 50,000 eligible to receive payments, only 4,000 bothered to collect them.

The irrelevance of the scheme's parameters became even clearer in 2004 when the government decreed a sevenfold increase in benefit levels (with new minimum and maximum benefits). This massive increase came alongside a sudden hike in pay scales that will eventually affect pension values. As the new government enters office in 2005, further dramatic changes are expected as part of a complete overhaul of the civil service.

The government has set up a task force to look at options for reforming the pension system. For this group the challenge of separating short-term crisis management from long-term policy formulation is more daunting than usual. Given the state of the current system, modest short-run objectives that take into account weak institutional capacity and preempt no long-term options are recommended. A coherent national pension policy should probably be formulated only after the country stabilizes and after careful consideration of the possible models.

What kind of benefit targets are implied by the parameters of South Asian pension schemes for civil servants? This question can be best addressed by simulating outcomes for a typical worker participating in each scheme. For purposes of comparison, the analysis here simulates outcomes for the same individual across all schemes-a new male entrant who begins government service at age 25, receives the average wage throughout his career, and retires at the normal retirement age under the existing rules and benefit formula.[3]

The analysis focuses on two indicators: the gross replacement rate and pension wealth. The gross replacement rate compares the value of a person's initial pension at retirement with that person's average lifetime wage. This is an important indicator for pension schemes because of their consumption smoothing objectives.[4] Pension wealth is the present value of the stream of benefits until death (assumed here to be adjusted with inflation), expressed as a multiple of the average wage. The wealth indicator is useful because it takes into account the expected duration of retirement, which will vary across countries. Given the same initial benefit, a longer life expectancy after retirement means a higher present value of the stream of payments. (The pension wealth taking into account survivors' benefits did not significantly change the results and so is not presented here.)

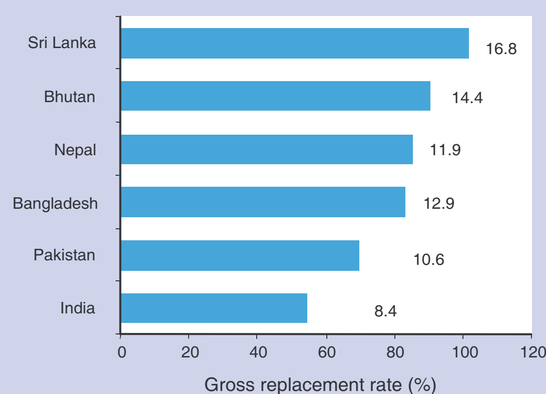
The analysis suggests that the target replacement rates implied by the accrual rate schedules are generous across most countries in the region (figure 2.1). Predictably, Sri Lanka tops the scale on both measures. Its high value for pension wealth, equal to almost 17 years of wages, is due not only

to high accrual rates but also to a relatively long duration of retirement.

The implied benefit targets are generous even by international standards. Sri Lanka (before reform), Bhutan, Nepal, and Bangladesh have benefit targets similar to those of the more generous civil service schemes in the OECD. Only those of India and Pakistan are close to or slightly below average OECD levels. The Maldives may have the highest replacement rates in the region: since there is no mandatory retirement age, most workers continue to receive both pensions and wages until they die.[5]

Figure 2.1

Gross replacement rates and pension wealth in civil service pension schemes in selected South Asian countries, 2003



Note: Figures to the right of the bars are gross pension wealth expressed as a multiple of the average wage. For India and Sri Lanka only pre reform values are included.

Source: Palacios and Whitehouse 2005.

Highly discretionary practices

While the target replacement rates in these South Asian pension schemes appear to be high, the way the schemes are implemented reduces the actual replacement rates, often arbitrarily. Three main issues underline the arbitrariness of the rules.

First, the practice of excluding allowances from the calculation of benefits means that much of the compensation workers receive (10-40 percent of basic wages) is not taken into account in determining their pension. Moreover, the pensionable share of compensation (such as pensionable allowances) varies across individuals and over time within the same scheme.[6] Since the objective of pension schemes is to smooth consumption over the life cycle and avert a sharp drop in income during old age, the logic of these exclusions seems questionable and arbitrary.

Second, the use of final salary for the earnings base everywhere except in Bhutan introduces a bias in favor of those with steep age-earnings profiles and against those with flat profiles (and, potentially, those able to arrange for a promotion during their final year of service). This bias is one reason that many OECD public pension schemes have recently shifted to lifetime (revalued) wages.

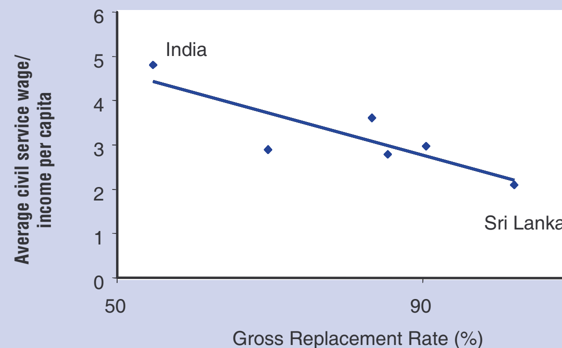
Third, discretionary indexation practices introduce arbitrary differences in the real value of pensions over time and across individuals. Only India indexes pensions automatically to prices (India has also adjusted pensions at the same time as wages on an ad hoc basis). Bhutan indexes pensions to net wages, and Nepal indexes them to two-thirds of the wage growth for the position from which a pensioner retired. Even in these cases the pension adjustment is uncertain, since wage adjustments do not follow predictable policies. In other countries high initial benefits may fall over the course of retirement with respect to either wages or prices. This uncertainty impairs the longevity insurance function of the annuity. In contrast, almost all OECD pension schemes now automatically index benefits, normally to prices.

This arbitrariness undermines both the actuarial fairness of pension schemes and their ability to achieve old-age income security and consumption smoothing. Even participants planning to spend

their full career in the civil service cannot be sure how much their consumption will decline after they retire. The arbitrariness also leads to inequity. Workers with steep age-earnings profiles and a small share of allowances in their remuneration package get higher lifetime replacement rates. And two workers with exactly the same careers may get very different deals from their pension scheme as a result of ad hoc indexation decisions that affect pension wealth outcomes. Most of these problems can be corrected through appropriate parametric reforms.

Are pensions compensation for low wages?

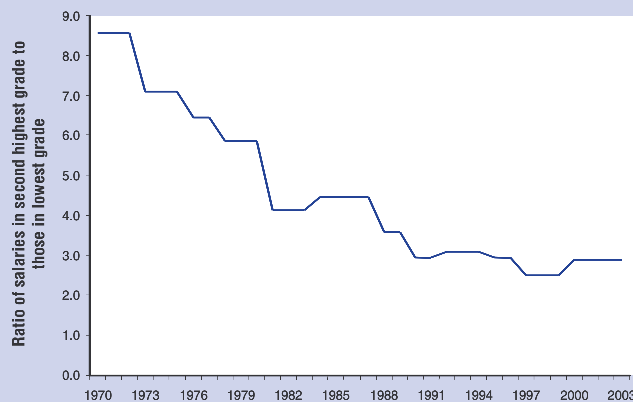
Figure 2.2
Relative government wages and implied replacement rate targets in South Asian countries



Note: The replacement rates are based on 2003 information, while the ratios of wage to income per capita are based on data between 2000-2002 depending on the country.
Source: World Bank staff estimates

By promising high pensions, a government facing budget constraints is able to borrow from the future to increase the compensation of current employees. Because there is no evidence of this obligation in the fiscal accounts, the policy has little cost to policymakers. As the previous section indicates, the proportion of civil servants' compensation coming from pensions rather than wages varies across South Asia. One plausible explanation is that some countries have in the past adopted policies of increasing pensions in order to compensate for an inability to increase wages. Indeed, higher replacement rate targets tend to be associated with lower ratios of average government wages to income per capita (figure 2.2). Of course, given the caveats noted about actual replacement rates, this observation only suggests that government wages and pensions in South Asia may be linked in some way that merits further analysis.

Figure 2.3
Wage compressions for civil servants in Nepal, 1970-2003



Source: Palacios forthcoming

While the composition of civil service compensation warrants further study, the more pressing question is whether the combined pay and pension package is currently set at the right level. How do public and private sector wages compare? Are pensions meant to compensate public sector workers for lower wages? Preliminary evidence for South Asia suggests that in fact most public sector workers, especially those in the lower grades, earn a wage premium over private sector workers. But differentials tend to be smaller, and sometimes negative, for those with

higher education as a result of a long history of wage compression, with salaries increasing faster at lower grades than at higher grades. In Nepal the public sector shows a clear pattern of wage compression during the past three decades (figure 2.3). A similar pattern is reported for Bangladesh.[7] In both countries wage compression was accompanied by disproportionate hiring at the lower grades.

In India a recent study found a large positive differential in favor of public sector workers compared with both formal and informal private sector workers (see Glinskaya 2004). Although the premium was smaller for higher skill workers, it remained significant. Similarly, in Bangladesh World Bank staff estimates found that public sector workers received more compensation than workers in the broadly defined private sector (30 percent more for men and 66 percent more for women). Another World Bank study, using data from the Pakistan 2001-02 Labor Force Survey to compare salaried, full-time private and public sector employees, found evidence of a significant premium for public sector workers. All these studies, after taking into account human capital endowments, experience, and other factors, showed that the majority of public sector workers were paid more than equivalent workers in the private sector.

How do pensions affect the public-private differential in compensation? For public sector workers whose alternative employment would be a job without a pension, it generally adds to the compensation premium.[8] For those who would otherwise find employment in the formal sector, the comparison depends on the pension coverage. In Pakistan the scheme covering private firms generates much lower replacement rates and is financed in part by employee contributions. Including pensions in the compensation analysis for Pakistan would therefore generally increase the public sector premium.[9] In Bangladesh, where only a small number of workers in the private sector are covered by an occupational pension scheme, the limited evidence available suggests that the majority of public sector workers in lower grades receive extra compensation in the form of pensions. To the extent that this practice is not targeted to specific ranks within the civil service, it does not alleviate the recruitment problems at the higher skill levels but increases future public expenditures.

So, pensions appear to add to a public sector compensation premium, yet do not resolve wage compression problems-and the hidden cost of deferred compensation eventually comes due. The main difference is that deferred compensation creates a fiscal liability that does not appear on the balance sheet, while an increase in the wage bill is felt immediately. Conversely, if wage compression is reversed, the positive effects will be magnified by a defined benefit pension scheme.[10]

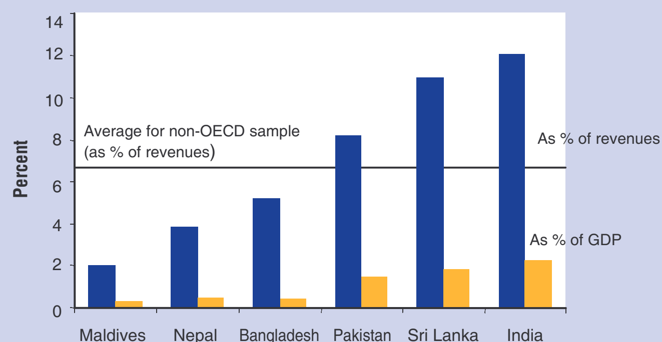
How big is the fiscal liability?

Spending on civil service pensions in India, Pakistan, and Sri Lanka is higher as a share of tax revenues than the average for developing countries (figure 2.4).[11] And it has been rising rapidly in all other countries in the region except Bhutan.

As a share of GDP, pension spending in South Asia does not appear to be high

Figure 2.4

Public sector pension spending is reaching high levels in some South Asian countries



Note: Data are for 2002, except India's and Pakistan's that are for 1999. Expenditures include pensions and commuted amounts but not gratuity and health obligations.
Source: World Bank staff estimates.

relative to that in other regions. But a more relevant measure is the ratio of pension spending to the revenue base from which it must be financed: small tax bases in South Asia mean that the same ratio of pension spending to GDP will be less sustainable and add more to deficits in that region than in some others. Public sector pension spending as a share of government revenues in India, Pakistan, and Sri Lanka lies above, and in Bangladesh just below, the average of 7 percent for a sample of 21 developing countries for which data are available. (The ratio in the Maldives would be close to 6 percent if it included the wages of workers over age 65.) The average for OECD countries is closer to 5 percent of revenues. Globally, Sri Lanka's ratio of pension spending to revenues is second only to that of Brazil.

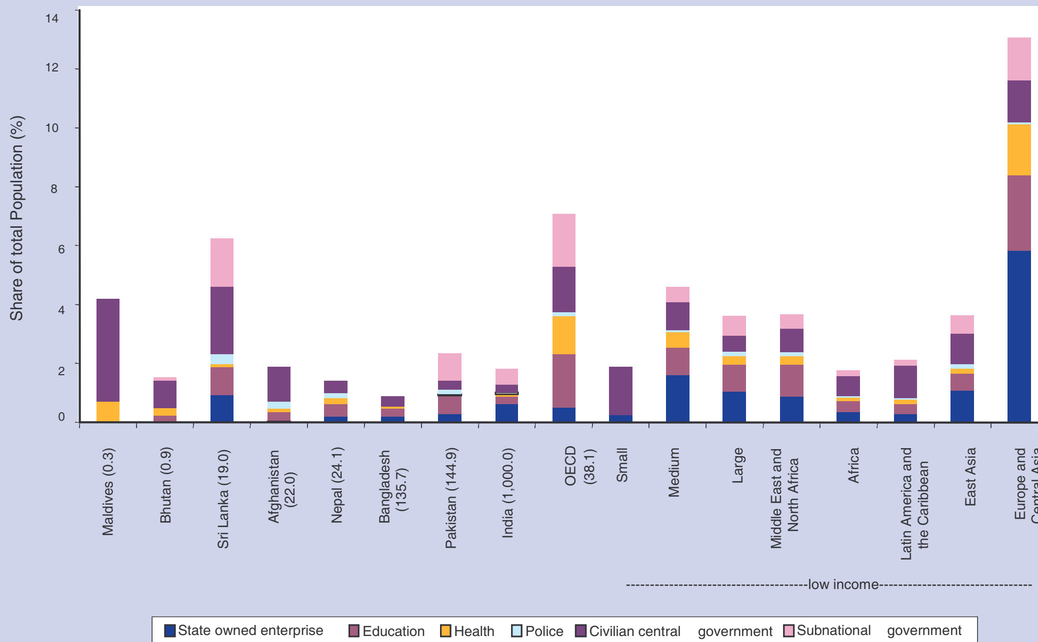
An important caveat is that military pensions account for a larger share of the total government pension bill than is normally the case. Pakistan is the extreme case, with about half of pension spending for the military. But the share is also significant in India and Sri Lanka and growing in Nepal (see Palacios and Whitehouse 2005).

Understanding the dynamics of public pension spending

While comparing recent figures for public spending on civil service pensions is straightforward, shedding light on the dynamics of this spending is more difficult. In Bangladesh and most large states in India it has been the single fastest growing expenditure in recent years. In Bangladesh World Bank staff estimates show that in 1985-2005 pension spending grew at twice the rate of current compensation for civil servants. In Pakistan the main source of growth appears to be military pensions, though no time-series data on this category are available. In Nepal the ratio of spending to tax revenues has doubled in the past decade. In Sri Lanka spending stabilized as a share of both GDP and revenues after a period of rapid growth in the 1980s, but it is likely to continue trending upward

Figure 2.5

Public sector employments by sector as a share of population in selected countries and country groups, various years, 1995-2002



Note: Figures in parentheses are population, in millions
Source: Asian Development Bank, World health Organization and World Bank

in the coming decades as the demographic profile of the civil service matures. Sri Lanka has a high ratio of public sector employment to population compared with most other South Asian and low-income countries. Indeed, its ratio approaches those of OECD countries (figure 2.5).

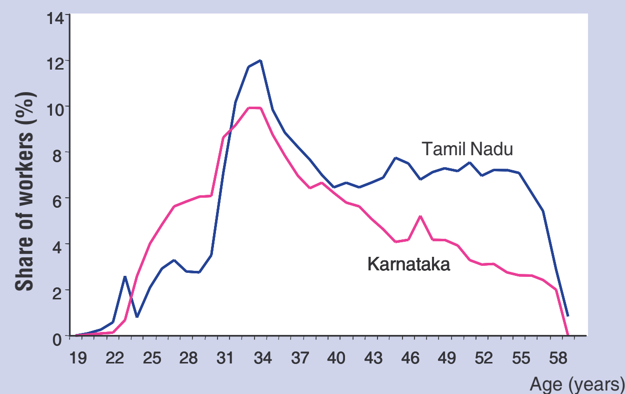
Perhaps the most dramatic growth in pension spending in the past decade was among state governments in India. Pension spending grew so much more rapidly than state domestic product that this ratio tripled (though from a relatively low base) in Uttar Pradesh (from 0.4 to 1.3 percent) and Rajasthan (from 0.8 to 2.3 percent) during the 1990s alone (see annex 3). Moreover, these figures do not include the quasi-autonomous agencies such as the electricity boards, where spending was probably rising just as quickly. The experience of Karnataka and Tamil Nadu is useful for understanding these trends, driven as much by the demographics of the civil service as by the parameters of the pension schemes (box 2.2).

BOX 2.2

Links between demographics and public pension spending trends in Karnataka and Tamil Nadu

The Indian states of Karnataka and Tamil Nadu have almost identical pension rules for civil servants. They also have similar ratios of civil servants to the state population (Tamil Nadu's is slightly higher), similar shares of civil servants who are women (about a third), and similar life expectancies. And the states' ratios of tax revenues to gross state domestic product are almost identical. Yet during the past two decades Tamil Nadu's public pension spending has grown at a rate 5 percentage points higher. The proximate explanation lies in the stage of maturation of its civil service pension system. In Tamil Nadu the ratio of pensioners to workers is about 43 percent, while in Karnataka it is only about 33 percent. This difference is reflected in the demographic structures of the active civil service in the two states (see figure). But while the demographic structure of the active civil service clearly shows why Tamil Nadu's pension burden has increased faster than Karnataka's, it does not explain the ultimate cause-the historical hiring practices that created this disparity.

Demographic structure of the active civil service in Karnataka and Tamil Nadu



Note: Karnataka Tamil Nadu data are for 2001 and 2002, respectively.
Source: State governments of Karnataka and Tamil Nadu and World Bank staff estimates

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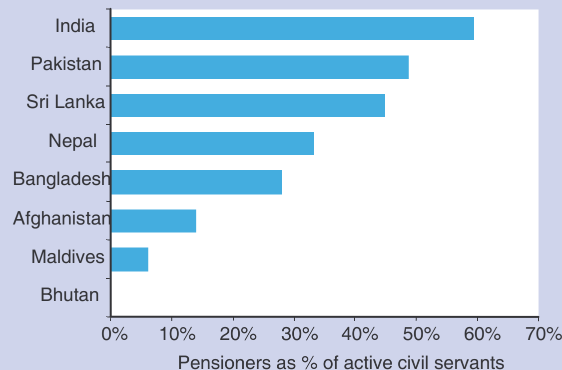
It was only after concerns arose over growing pension bills that some South Asian countries started to collect the information needed to understand the system's dynamics and the underlying demographics. In Nepal, for example, a new information system was set up in 2004 that allows the government to track the age, gender, and wage profiles of all central government employees as well as pensioners. Still, data are unavailable or incomplete for most of South Asia's civil service pension schemes,

making it difficult to project future spending.[12] With these caveats, figure 2.6 presents best estimates for system dependency ratios in the region-the number of pensioners divided by active members of the schemes.

Although these ratios are fairly consistent with current spending levels, they provide little information about future spending. Extrapolating from recent trends is not useful. For example, Bhutan's pension scheme started only in 2001, so the system dependency ratio is low today but will rise quickly in the coming years.

Figure 2.6
Ratio of pensioned to active civil servants in South Asian countries



Note: Data for India include estimate for states. Those for Pakistan include the central government and the Punjab provincial government but exclude other provinces and the military. Data for Bangladesh exclude the military.
Source: World Bank staff estimates

One clue about future pension spending can be found in historical patterns of hiring in South Asia. These suggest that pension spending is likely to rise in the region, at least until the inertia of past government expansions has run its course. The demographic structures of civil services will age to varying degrees, depending on how historical patterns of government expansion, stabilization, or contraction played out in each country. In Bangladesh, for example, the civil service more than doubled between 1971 and 1986, contracted in the early 1990s, and has since remained stable. Similar patterns can be observed in Sri Lanka and in India's central government. State governments in India continued to expand into the 1990s, but the growth of several has slowed dramatically in recent years. Projections for Sri Lanka suggest a doubling of the already high ratios of pension spending to GDP in the next few decades, despite recent reforms (see the following section). For Pakistan preliminary projections suggest that most spending growth will occur for provincial governments, where expansion has occurred more recently than at the central level. In the Maldives public sector expansion has been a more recent phenomenon, with the number of public employees doubling in the past decade.

Estimating the implicit pension liability

Another way to assess the future burden of pension obligations already incurred is through the implicit pension debt, which measures the discounted present value of future pension spending.[13] As noted, the data required for a proper actuarial evaluation are rarely available for active and retired civil servants in South Asia. Thus while some estimates have been made based on heroic assumptions,[14] only those for which a minimum amount of information was available are reported here (table 2.2).

The estimates should be interpreted with caution, for several reasons. First, the quality of data varies across countries. Second, the modeling in each country uses different assumptions about patterns of early retirement, wage distributions, and other variables. Finally, the scope of the estimate ranges from only about a third of pensionable workers (as in Nepal) to all workers and pensioners (for Tamil Nadu). The lowest estimate is for Nepal, where teachers outnumber civil servants but are excluded from the analysis.

TABLE 2.2

Estimated unfunded liabilities of civil service pension schemes in selected South Asian countries, various years

Country (or state) and base year for estimate	Implicit pension debt		Groups covered[a]
	As % of GDP	As % of revenues	
Tamil Nadu (2002)	33[b]	-	All civil servants (1.1)
Nepal (2002)	15	150	Civil servants excluding teachers (0.4)
Sri Lanka (2002)	60	285	All civil servants and military (4.7)
Bhutan (2004)[c]	22	212	All civil servants and military (2.6)
Pakistan (2003)	33	252	Federal and provincial civil servants

- Not available
a. Figures in parentheses are percentage of population represented by the group or groups shown.
b. Liability reported as a percentage of gross state domestic products.
c. Bhutan is the only country with reserves to partially cover this liability.
Source: World Bank staff estimates using PROST (Pension Reform Option Simulation Toolkit) model and assuming price indexation and 4 percent discount rate.

These caveats aside, the estimates confirm that implicit pension liabilities are large throughout the region, especially when compared with the tax base from which these liabilities will have to be financed. They are also large relative to reported public debt figures, themselves often a concern. Moreover, this large liability relates to only a small percentage of the population (see table 2.2). Several countries have made recent efforts to improve the reporting of these pension liabilities, reflecting their perceived importance to policymakers in the region.[15] The mounting fiscal pressure is not the only rationale for changing pension schemes that have remained essentially the same for most of the past century. But without it, reforms would probably not have been considered.

Ongoing reform initiatives

Out of concern for the rising costs, most countries in South Asia are considering options for improving pension systems for civil servants. In Afghanistan pension costs are low, but the government, in trying to rebuild the civil service, is reassessing the pension scheme in the context of

TABLE 2.3

Status of ongoing reform initiatives for civil service pension schemes in selected South Asian countries (2005)

Country	Entity responsible for reform initiative	Status
Afghanistan	Government task force	Data collection in progress; initial discussions of reform options under way.
Bhutan	Bhutan Pension and Provident Fund	New defined benefit pension scheme introduced from 2001, and parametric reforms for the scheme under consideration. Capacity building initiative under way.
India	Ministry of Finance	Order issued for federal workers hired after January 1, 2004, to join new defined contribution scheme; new state entrants to join the scheme in Tamil Nadu (after April 2003), Rajasthan (January 2004), and Karnataka (January 2006). Other states have introduced the scheme, including Andra Pradesh, Himachal Pradesh, and Orissa. The new pension regulator and centralized record keeper are being set up, but key legislation is still under discussion in Parliament.
Maldives	Interministerial working group	Preliminary projections of unreformed scheme completed. Proposal for new contributory scheme being defined and costed.
Nepal	Ministry of Finance	Framework proposal drafted to introduce new contributory scheme with details undefined. Preliminary projections produced for core civil servants and in process for teachers.
Pakistan	Pay and Pension Committee	Government actuary costing different parametric and systemic reform options. Pay and Pension Committee made recommendations in May 2005.
Sri Lanka	Ministry of Finance	Contributory defined benefit pension with lower accrual rate introduced for workers hired after November 2003. Reforms partially implemented.

the overall compensation package (table 2.3). Pakistan introduced parametric reforms in 2001. Bhutan too is considering introducing gradual parametric changes to its defined benefit component, to rein in spending before the system matures. Afghanistan, the Maldives, Nepal, and Pakistan are considering reforms that involve a fundamental shift in the method of financing civil service pensions, and India and Sri Lanka have already instituted reforms that include contributions for new civil servants. The Indian reform, though not yet fully implemented, is the most ambitious, as it would rely on private asset managers and full funding of future pension obligations.

Parametric reforms in Pakistan

In 2001 Pakistan introduced parametric reforms designed to start streamlining its complex defined benefit formula and reduce pension spending. Civil servants were offered a choice: stay with their current compensation package or accept lower pension benefits but higher wages. Most accepted the reduction in pension benefits, which the reform would achieve in three ways: First, it reduced the commutation factor (the share of the annuity that can be converted to a lump-sum payment at retirement) from 50 to 40 percent. It eliminated the restoration feature, which raised the postcommutation pension to the original amount after 15 years. Finally, it reduced accrual rates after the 30th year of service from 1.4 percent to zero.

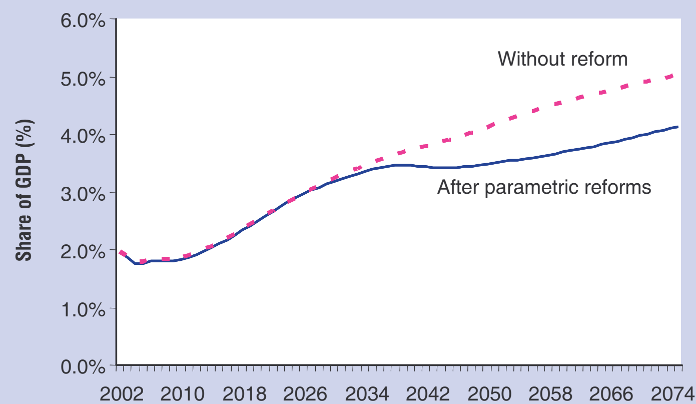
Together, these measures would have reduced the pension liability, but the wage increase will have a countereffect. The net impact, not yet calculated, will depend on the assumed counterfactual-that is, would the wage increase have been as large if the pension reform had not been a part of the package? Faced with the prospect of continued growth in spending, the government is considering further reforms.

Parametric reforms with partial funding in Sri Lanka

In 2003 Sri Lanka introduced a contributory scheme for new entrants to the civil service but retained the basic defined benefit structure. Parametric reforms were limited to a cut in the replacement rate from 80 to 70 percent. The government's contribution is 8 percent, and civil servants' 12 percent. In principle the system applies to all new entrants after November 2003. But because of confusion about its legal status, not all new workers have been shifted to the new system. The law introducing the new scheme was approved in Parliament but never signed. The government has indicated its support for the new system and plans to clarify its legal status, which will eliminate uncertainties about future pension rights for new recruits.

Because the reform applies only to new entrants, its impact cannot be assessed for about three decades. But assuming that all new workers

Figure 2.7
Civil service pension spending as a share of GDP in Sri Lanka, 2002–74



Source: World Bank staff calculations

are shifted to the new system and pensions are indexed to inflation, the reform should generate some savings (figure 2.7). The savings would come from workers' contributions to the new scheme (assuming no compensatory increase in wages) and from the reduction in the replacement rate.

Investment performance will be critical to the scheme's long-term sustainability, which will depend on the net differential between wage growth and the rate of return on the fund's assets. Baseline projections suggest that the scheme will run into deficits in about four to five decades, assuming that the rate of return equals wage growth. The fund's assets will be invested by the Employees Provident Fund, which now handles the provident fund (defined contribution) balances for private sector workers. Until the mid-1990s the Employees Provident Fund had put in a very weak performance, and today its portfolio remains concentrated in government debt. Changes to governance and investment policy will be vital to improve its investment performance (see chapter 3). Moreover, a funded pension scheme with a portfolio concentrated in public debt will not differ significantly from the previous unfunded scheme except that the implicit pension liability will have become more explicit.

A paradigmatic shift to full funding in India

In a fundamental, long-run policy shift, India is replacing an unfunded, noncontributory defined benefit scheme with a fully funded defined contribution scheme that will be largely privately managed.[16] All federal civil servants hired after January 2004 contribute 10 percent of their salary to a defined contribution scheme, with a matching contribution by the government. The central government has devised temporary administrative arrangements until the new system's design and infrastructure are fully in place. While only new entrants must participate, the possibility of allowing those already covered by the old defined benefit scheme to switch is being discussed. By May 2005, 14 state governments had introduced the new scheme for their new hires.

While many of the design details have yet to be spelled out (such as the process for selecting asset managers and investment policies), the scale and nature of the new system make India's pension reform among the most important under way in South Asia and possibly the world. In marked contrast to other large funded schemes in South Asia, the system will invite private asset managers to participate, allowing individuals to choose from a narrow range of investment portfolios with predetermined asset class limits.[17] The scheme will also be available to the rest of the working-age population on a voluntary basis. The reform envisions a centralized record-keeping agency with the aim of lowering administrative costs and passing savings on to participants. These details (and many key regulations) have not yet been finalized, as legislation giving full regulatory jurisdiction over the system to the Pension Fund Regulatory and Development Authority (PFRDA) is still pending in Parliament.

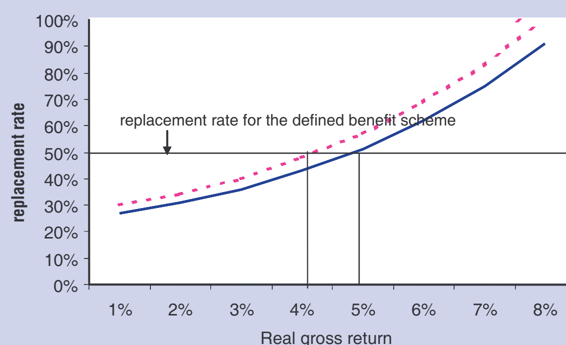
The replacement rate for a civil servant under the new scheme will be highly sensitive to the net realized rate of return relative to wage growth and the future cost of annuities. These variables are unknown, and the first two difficult to project. The rate of return will depend largely on the worker's asset allocation choices and future returns on the assets. Wage growth in the public sector is a policy decision subject to fiscal constraints. And the cost of price-indexed annuities in the Indian market is unknown, and international experience quite thin. For illustrative purposes, figure 2.8 simulates a range of outcomes for a male, full-career worker who buys the required joint, price-indexed annuity at retirement. The figure shows the real rate of return before fees, which are assumed to be 50 basis points on assets annually. The top (dotted) line is based on a 3 percent interest rate for the annuity calculation, and the bottom line on a 2 percent rate. Annuities are calculated on an actuarially fair basis. The replacement rate paid by the old defined benefit scheme, 50 percent, would

occur when the real rate of return is between 4 and 5 percent.

The simulation uses assumptions consistent with the proposed asset allocation strategies that would be allowed. Differences between wage growth and returns (after administrative costs) of 1.5-2 percentage points over long periods have been observed in many countries and appear to be in line with circumstances in India.[18] Similarly, the assumed cost of the scheme that would ultimately be deducted from members' accounts is consistent with international experience.

Figure 2.8

Sensitivity of replacement rate to investment returns in India's new defined contribution scheme



Note: It is assumed that wages grow at 3 percent a year and that the worker accumulates between ages 25 and 60. The top (dotted) and bottom lines are based on a 3 percent and 2 percent interest rate for the annuity calculation, respectively.

Source: World Bank staff estimates.

Comparing the reforms in India and Sri Lanka

The Indian and Sri Lankan reforms are similar in at least one way: both introduce a contribution totaling 20 percent for new civil servants-though the employee contribution, which could potentially reduce the long-term government liability, is 10 percent in India and 8 percent in Sri Lanka. There is also a clear contrast between the two reforms: India's shifts investment and demographic risks to the worker, while Sri Lanka's does not. In other words, India's new pension system is fully funded in the long run, while Sri Lanka's scheme retains an open-ended liability. In addition, India's scheme removes government discretion to change benefits in the future by making contributions the private property of its members.

From the perspective of workers, the key differences are as follows:

- The Indian reform allows public sector workers greater portability of their pension wealth, while there is little or no change in Sri Lanka.
- Shorter-tenure workers tend to do better in the highly nonlinear defined benefit scheme in Sri Lanka than in the defined contribution scheme in India.
- Workers in Sri Lanka will clearly receive smaller pensions than previous cohorts, while in India the outcome will depend on several factors, including the net rate of return, wage growth, and the money's worth ratio at the annuity stage.
- The risk to workers in India's new scheme arise mostly from the investment process and the competence of regulators, while in Sri Lanka the government's fiscal situation is most likely to determine pension wealth.

How will the two reforms affect the fiscal situation and overall economy in India and Sri Lanka? This is a complex question. The answer depends on at least three more questions. First, how will the transition from an unfunded to a funded (or partially funded) pension scheme be financed? Second, and related to the first, how will funds be invested in the economy? Third, how will the changes affect the labor and capital markets in the long run?

By introducing a new government contribution, both reforms create a "transition deficit" because the public sector must continue to pay for existing pension liabilities while also starting to prefund the pensions for new civil servants. The amounts involved grow in the medium term as an increasing share of active civil servants participates in the new scheme. Eventually these costs must be covered by additional taxes, spending cuts, or new borrowing-or some combination of these. In Sri Lanka contributions to the new civil service scheme go to the Employees Provident Fund, which historically has invested almost all its funds in public debt. By contrast, India's scheme would, in principle, allow significant investment in other assets. Sri Lanka's investment arrangements, by providing a captive source of credit to the government, could make debt financing of the transition more likely. To the extent that the transition deficit is financed through new debt, this would undermine a key objective of the reform-more sustainable fiscal policy.

The impact on labor markets is likely to be minimal at first and only moderate in the long run. The reason is that marginal changes in compensation through pensions are unlikely to significantly alter the public-private wage differentials. The impact on capital markets may depend on the regulatory environment. A growing literature asserts that pension reforms that involve funding can have positive effects on the economy through the presence of a new class of institutional investors interested in long-term savings instruments and the impact of these investors on financial markets (for further discussion, see chapter 5). But restrictive investment regulations and failure to properly regulate local capital markets can weaken these effects.

Unless the Sri Lankan investment policies change dramatically, the Indian reform appears more likely to foster these positive effects on capital markets. Moreover, given the substantial size of the Employees Provident Fund (close to 20 percent of GDP) relative to domestic capital markets, Sri Lanka's reform will exacerbate the concentration of institutional investor funds in one public monopoly.

Adapting reforms to local conditions

The examples in the previous section of parametric and systemic reforms to civil service pensions already under way in South Asia illustrate possible approaches, but many other variations are possible. Both types of reform can be applied to new entrants only-phased in gradually so that they do not affect those close to retirement-or applied immediately to all participants. The pace of the reform, and thus its fiscal implications, can be varied, with faster parametric reforms leading to larger reductions in pension obligations and faster systemic reforms requiring greater short-term transition financing. Faster systemic reforms also demand more rapid progress on institutional arrangements for improved record keeping as well as on new pension regulations and supervisors to enforce them.

The contrasting reforms in Sri Lanka and India illustrate a clear distinction between public defined benefit and private defined contribution models. Between these two poles lie a spectrum of possible combinations. In some countries, such as Costa Rica and Sweden, the fully funded, privately managed defined contribution component plays a minor role, while the public defined benefit scheme provides most retirement income. In Hungary and Poland the defined benefit scheme still dominates, but the defined contribution component will eventually generate a significant share of retirement income. In Chile and Colombia the defined contribution component dominates, but a variant on the defined benefit element exists in the form of a state-financed minimum pension. All these countries cover civil servants through mixed or hybrid pension schemes, with differing proportions of defined benefit and defined contribution elements.

Among South Asian countries, Bhutan already has a hybrid scheme, though the defined benefit component was introduced only in 2001 and pays out few benefits. Several other countries have quasi-defined contribution elements (such as the General Provident Fund in Pakistan) that could be converted into funded, privately managed defined contribution schemes. That would require fundamental changes to ensure that the provident funds generate significant retirement income and would make sense only if the reform also reduced the share of pensions coming from the defined benefit scheme.

Countries considering reform options should analyze the following main policy issues:

- What should be the balance between current and deferred compensation? How will the overall compensation package, particularly retirement benefits, contribute to a highly competent and efficient civil service?
- What modifications should be made to the current parameters of the defined benefit scheme, and should they apply to new entrants, younger workers, or all participants?
- Should funding be considered, and if so, in what form? Are local conditions conducive to funding, and if not, could these constraints be overcome and how?
- Should there be a fully funded, privately managed defined contribution component (in contrast to existing public provident fund arrangements)? If so, what proportion of the defined benefit scheme should it replace, and should it apply to new entrants, younger workers, or all participants? If it is to apply to workers already covered by the defined benefit scheme, how should accrued pension rights be valued after the reform?
- How will the reform facilitate labor mobility between the public and private sectors? Is there scope for greater harmonization with private sector schemes?

Countries in South Asia face different initial conditions and are therefore likely to arrive at different answers in considering their reform options. Table 2.4 sets out some of these factors for each country along with their policy implications. The table assigns broad and somewhat subjective ratings based on the state of the pension system, the domestic environment for funding (financial market and overall governance conditions), and initial institutional capacity for record keeping.[19] The table is not an attempt to prescribe reforms but a starting point for assessing the arguments in favor of different approaches.

TABLE 2.4

Initial conditions for reform of civil service pension schemes in South Asian countries

Country	Short-term pension spending	Implied benefit promise	Domestic environment for funding[a]	Institutional capacity for funding
Afghanistan	Low	Unclear	Very weak	Very weak
Bangladesh	Moderate and rising	High	Very weak	Very weak
Bhutan	Low and rising	High	Very weak	Weak
India	High	Low	Good	Good
Maldives	Moderate[b]	Highb	Weak	Good
Nepal	Moderate and rising	High	Very weak	Weak
Pakistan	Moderate and rising	Moderate	Moderate	Moderate
Sri Lanka	High	High	Moderate	Good

a. Based on capital market depth and liquidity and the potential for an effective pension supervisor.
b. Takes into account benefits and spending on elderly civil servants who are still active.
Source: World Bank staff estimates.

Other things constant, the table suggests that the case for reform affecting current civil servants is greatest in Sri Lanka, followed by Bangladesh, the Maldives, Pakistan, and Nepal. India is a more complicated case because the aggregate figures hide significant variation across states. A complication in both India and Pakistan is that they have the highest military shares of pension spending, and reforms affecting the armed forces must recognize their special characteristics. Bhutan's scheme is very immature, so gradual parametric changes can reduce future spending before it reaches the levels seen elsewhere in the region.

In Bhutan's hybrid system a large share of the defined contribution component is invested abroad (in the U.S. equity market), making it possible to partially circumvent the limitations of domestic capital markets. But institutional capacity is still weak, and processes to contract and monitor external asset managers could be greatly improved. Nevertheless, Bhutan illustrates how a South Asian country can move to funding even though domestic capital markets provide insufficient investment options. (For further discussion of financial sector preconditions for reforms involving prefunding, see chapter 5.)

Beyond the question of foreign investment, the ability to manage pension funds effectively under difficult investment constraints depends largely on institutional capacity. This term embraces the quality of governance, the initial conditions in record keeping and information technology, and the state of the bureaucracy dealing with pensions and public administration issues. Not surprisingly, Afghanistan scores low on each of these counts. It will probably need years to rebuild institutions and restructure the civil service. Bangladesh also appears to have limited capacity and tends to score very low on governance. Only the Maldives appears to be a good candidate for systemic reforms (like those in India). The country already has some experience administering a voluntary defined contribution arrangement (one covering more than half its civil servants) and invests in foreign markets.

This preliminary assessment suggests that conditions for funding vary markedly across countries. Pakistan and Sri Lanka are likely to find it more difficult to shift to funding than India. That said, the pace of the transition and the share of the system that is funded matter. A gradual transition involving new entrants or a partial shift to funding through the introduction of a hybrid scheme would alleviate the problems stemming from a lack of investment instruments and allow time for parallel reforms to develop in tandem. But the disadvantage of a more gradual or partial shift to funding is that the reform may not reap the economies of scale inherent in the new system during the early years, especially in smaller countries. And the government would still need to develop a complex institutional infrastructure to support a well-functioning funded scheme.

A final note: parametric and systemic reforms are not mutually exclusive. Indeed, parametric reforms may be needed to offset the short-term transition costs involved in prefunding future pension obligations. Many of the measures are sensible even when fiscally neutral because they eliminate inequities in the system. Parametric reforms are also needed to avoid large discontinuities between cohorts of civil servants retiring in the future as well as very high contribution rates for the younger workers affected by a systemic reform.

Summary and recommendations

Available data suggest that civil service pension schemes have large unfunded liabilities, even relative to public debt, throughout South Asia. But unlike conventional public debt, these liabilities relate to only a small share of the population. These schemes have parameters implying target replacement rates that are generally high, though the actual outcomes depend on a series of arbitrary factors. Still, civil service pensions generally exacerbate public-private differentials in compensation and are not a cost-effective solution to wage compression problems, which affect a relatively small group of higher-ranking civil servants.

Motivated largely by fiscal concerns, a few countries are already reforming the parameters and funding of civil service pension schemes. India, Pakistan, and Sri Lanka illustrate possible approaches to parametric and systemic reforms and important differences between partially funded defined benefit schemes (publicly managed) and fully funded defined contribution schemes (privately managed). India's new scheme shifts investment and demographic risks to the workers, while Sri Lanka's reform does not. That means that India's new defined contribution system will be fully funded in the long run, while Sri Lanka's defined benefit scheme retains an open-ended liability. Many other variations are possible, including combinations of funded and unfunded pillars.

While reforms are warranted in other countries as well, the strategy and pace of reform need to take into account local conditions. Prefunding future pensions can introduce greater transparency and force present governments to assume the cost of both current and deferred compensation. That should promote more sustainable pension schemes for civil servants. But it also demands greater institutional capacity and careful attention to capital market constraints.

Parametric reforms would be useful throughout the region-to eliminate arbitrary and inequitable features of current rules and, in some cases, to improve financial sustainability. Possible parametric reforms include changes to accrual rates, earnings bases, indexation methods, and eligibility criteria. Reformers could also consider introducing a contribution for employees where that has not already been done.

All countries (and subnational governments) would benefit from better accounting of their pension liabilities through regular actuarial valuations and analysis of the underlying demographics done as part of budget planning. These pension liabilities could then be systematically reported as memorandum items in the budget.

The conditions for a shift to funding vary markedly across countries. In some countries the conditions for funded schemes could be improved through foreign investment and institutional capacity building, while in others a cautious approach toward funding is warranted.

Notes

1. The use of final basic salary in calculating the benefit appears to have a long history and was easy to administer at a time that salary histories, if maintained at all, were kept on paper. Today, however, the information systems required to track individual compensation histories are readily available.
2. Recent estimates put the pensionable remuneration at 90-95 percent of the total in Nepal; 80-85 percent in India, the Maldives, and Sri Lanka; and 60-70 percent in Bangladesh and Pakistan. In Afghanistan the pensionable portion of remuneration was only around 10 percent until the wage increases of 2004.
3. For example, in India, with a normal retirement age of 60, the length of service is 35 years (though the defined benefit formula is capped at a 50 percent replacement rate). The factors that would affect the initial replacement rate, such as wage growth, are assumed not to vary across countries, making it possible to observe the pure effect

of the parameters of each scheme. As discussed below, comparing the actual benefits paid requires taking into account the effect of differences in indexation practices as well as variations in the share of actual compensation used in calculating benefits. The analysis excludes the Maldives, since its workers can receive a pension without ever retiring.

4. With a gross replacement rate of 100 percent, for example, an individual will receive more income in retirement than he did on average during his working life. The simulations assume that the worker always received the same proportion of the average wage throughout his career. To the extent that seniority increases and promotions result in steeper age-earnings profiles, the results in figure 2.1 will understate the lifetime replacement rate. Net replacement rates-after-tax pensions relative to after-tax wages-are generally higher than gross rates, especially for higher-income workers, because of progressive income tax schedules.
5. For the relatively small number of pensioners in the Maldives who do leave service, lack of indexation has resulted in very low pensions by eroding their real value.
6. For example, the share of allowances in total remuneration jumped from 15 percent to 40 percent in Pakistan in 2001, while it fell dramatically in Nepal in 1999.
7. World Bank staff estimates found that the ratio of the highest to lowest basic pay had fallen from 40 to 1 to 9.6 to 1 between 1972 and 2005, and the ratio of the highest to lowest total monetary compensation from 25.5 to 1 to 5.9 to 1.
8. The comparison is more complicated because it depends on the internal rate of return on contributions to the scheme and the incidence of the employer contribution. Here, however, the comparison is generally between schemes where the employee does not contribute.
9. Palacios (forthcoming).
10. This is especially clear in Nepal, where pensions are indexed to the wage for the position from which an individual retired. The result is that the wage compression illustrated in figure 2.3 was exacerbated by the postretirement indexation of pensions, which followed exactly the same pattern.
11. In addition to the pension obligations of central and state governments, local bodies also have obligations. Further research on a country-by-country basis will be necessary to account for these obligations given the large number of local authorities and the diversity of programs.
12. In fact, key indicators such as the total number of pensionable employees and pensioners are often based on estimates because of the lack of a central database. Official publications often refer to "sanctioned posts" rather than actual employees, and comparisons based on household survey data for India have shown large differences between figures for the two.
13. The most direct way to assess the liability is to project spending and take the discounted present value of the stream of expenditures through a certain point in time. For a review of issues in defining and measuring pension debt, see Holzmann, Palacios, and Zviniene (2004).
14. Examples include estimates for India in World Bank (2001) and for Bangladesh in ADB (2003).
15. For example, the government of India launched a new initiative, supported by the World Bank and the Asian Development Bank, for at least a dozen state governments interested in measuring civil service pension liabilities.
16. India's reform is similar to that of Hong Kong (China): both started with essentially the same inherited British pension scheme, applied the mandate only for new entrants, and introduced a privately managed defined contribution scheme with limited portfolio choice. Unlike the system in Hong Kong (China), however, India's system remains dualistic, with the formal private sector covered by different rules and institutions. Administration of defined contribution balances in India's system will be centralized.
17. Until India's reform, Bhutan was the only South Asian country that had incorporated a defined contribution component, though it is publicly run and offers no choice of portfolio or provider. Bhutan's defined contribution scheme is centrally administered, but unlike in similar schemes in South Asia the rate of return depends on market returns and a private asset manager has been contracted to manage funds invested overseas (nearly 40 percent of the portfolio).
18. Shah (2005) uses a Monte Carlo simulation method with assumptions justified by historical data from India to show the probability of replacement rate outcomes with different portfolios. Results show that the probability of ending up with a lower replacement rate than the defined benefit scheme is low under most circumstances. The simulation case differs from those presented here, especially with respect to the assumption of a joint life annuity purchase.
19. See for example Thomas (2004).

CHAPTER 3

Mandatory Pension and Provident Fund Schemes for the Private Sector: The Need for Change

South Asian workers outside the civil service have had only modest access to retirement savings plans and other pension programs-and where such programs are available, their performance has been mixed. Until the 1950s occupational schemes sponsored by large enterprises were the only formal retirement savings programs available to private sector workers. Over the past 40 years or so, however, influenced by universal pension coverage in industrial countries, India, Sri Lanka, Pakistan, and Nepal have introduced mandatory provident funds or defined benefit programs (or both) for the formal private sector to widen coverage. In most other South Asian countries occupational schemes remain largely the only retirement savings programs for the private sector.[1] Coverage by mandatory pension programs remains mostly modest, especially in Nepal. Low income levels, predominantly rural economies, and small formal sectors have worked against their expansion. In addition to mandatory programs, the governments of India and Nepal have sponsored voluntary plans, reaching mainly formal sector workers (table 3.1).

In contrast with civil service programs, which have been largely noncontributory, mandatory programs for the private sector are fully funded defined contribution schemes (provident funds) or partially funded defined benefit schemes. Their performance has been generally feeble, raising

TABLE 3.1
Pension programs for private sector workers in South Asian countries

Country	Mandatory Programs	Voluntary Programs
Afghanistan	None	None
Bangladesh	None	Limited occupational schemes
Bhutan	None	Very limited occupational schemes
India	National provident fund and partially funded defined benefit scheme; exempt occupational funds[a]	General provident fund; occupational schemes; personal plans
Maldives	None	Publicly managed provident fund
Nepal	National provident fund; occupational plans[a]	Limited occupational schemes
Pakistan	National defined benefit scheme (partially funded)	Limited occupational schemes
Sri Lanka	National defined contribution plans; exempt occupational plans[a]	Occupational schemes[b]

a. Firms can be exempted from the national program as long as they offer workers a program with a similar set of benefits or, as in India, their workers are in certain occupations covered by special statutes (such as coal mining). These firm- or industry-operated programs are known as exempt occupational schemes. In Nepal occupational schemes need to be managed by an authorized financial entity.

b. The government sponsors programs that are partly income support and partly contributory for low-income groups (farmers, fishermen, and the self-employed).

Source: World Bank.

questions in some cases about whether they have been welfare enhancing for their members. Centralized fund management structures have failed to promote good governance and are difficult to isolate from political influence. Although defined benefit programs are still young and thus have positive financial flows, these flows mask serious long-term sustainability issues.

While a growing number of South Asian countries are considering reforms for civil service pension programs, the debate on mandatory schemes for the private sector remains nascent. This chapter delves into the problems of these mandatory programs, assesses their impact on participants and the economy, and examines opportunities for reforming them.

Basic features of mandatory pension programs for private sector workers

The first countries in South Asia to establish mandatory retirement programs for private sector workers were India (in 1952) and Sri Lanka (in 1958). The programs follow a defined contribution structure, inspired by the provident fund model of occupational schemes prevailing at the time. In both cases preexisting occupational schemes were grandfathered under the new systems. Both countries later expanded the range of mandatory programs (table 3.2). India established the

TABLE 3.2

Basic features of mandatory pension programs for private sector workers in South Asia

	Program and year sstablished	Legal coverage	Contribution rates	Retirement age
INDIA	Employees Provident Fund (1952)	Firms with more than 20 workers	Employer: 3.67% Employee: 12% Covered wage: basic salary up to Rs 6,500 a month plus dearness allowance	55 years
INDIA	Employees Pension Scheme (1995)	Same as above with some exemptions	Employer: 8.33% Covered wage: as above	58 years (or earlier with penalties)
INDIA	Employees Deposit Linked Insurance (1976)	Same as above	Employer: 0.5% Government contribution: 1.16% Covered wage: as above	
NEPAL	Employees Provident Fund (1934)[a]	Civil service, army, police, teachers, and firms with more than 10 workers	Employer: 10% Employee: 10% Covered wage: basic salary plus increments No ceiling on covered wage	60 years
PAKISTAN	Employees Old Age Benefits Institution (1976)	Mandatory for firms with more than 10 workers; voluntary for smaller firms	Employer: 5% Covered wage: basic salary plus allowances Covered wage ceiling: PRs 3,500 a month Employee: flat monthly contribution of PRs 20 Government contributions	60 years
SRI LANKA	Employees Provident Fund (1958)	Mandatory for private sector employees	Employer: 12% Employee: 8% No ceiling on covered wage	55 years for males; 50 for females
SRI LANKA	Employees Trust Fund (1981)	Mandatory for private sector employees	Employer: 3% No ceiling on covered wage	60 years

a. The Employees Provident Fund was expanded to the private sector in 1991

Source: Employees Old-Age Benefits Institution (Pakistan), Employees Provident Fund (Nepal), Employees Provident Fund (Sri Lanka), Employees Provident Fund Organization (India), and Employees Trust Fund (Sri Lanka)

Employees Pension Scheme in 1995 to provide retiring workers an annuity that would complement the lump-sum amount accumulated in the main provident fund. Sri Lanka established a second (though smaller) provident fund in 1981 with ambitious but unclear objectives. The program encompassed a defined contribution tier to promote equity ownership among employees along with a wide range of uncoordinated noncontributory programs covering health, education, and housing benefits. Over the years Sri Lanka's two provident programs have become largely duplicative, especially in their administrative and investment structures.

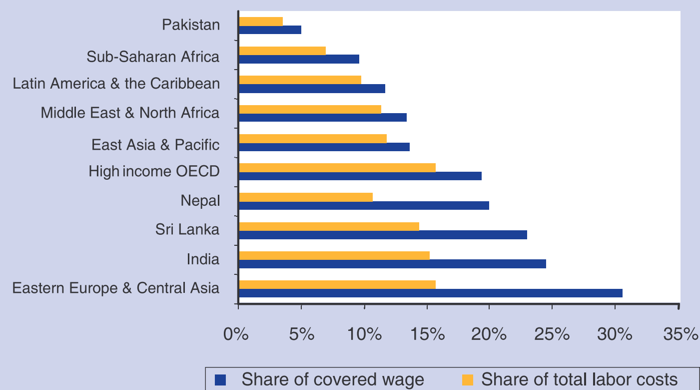
Nepal's mandatory program for the private sector is far more recent. It was established only in 1991, by expanding the coverage of the existing national provident fund scheme for public employees.[2] In contrast with the defined contribution schemes elsewhere, Pakistan opted for a mandatory defined benefit plan for the private sector, in operation since 1976.

While there are no precise estimates on compliance levels, participation in these programs remains modest-reflecting the large rural economies, extensive informal sectors, and possibly evasion. After half a century in existence, India's Employees Provident Fund (EPF) had only 40 million members in 2002 (including about 3.75 million members of exempt funds), roughly 6 percent of the working-age population. Participation in Pakistan's Employees Old Age Benefits Institution (EOBI) is estimated at 1.9 million, only 2.3 percent of the working-age population. In Nepal private sector participation in the Employees Provident Fund is negligible, amounting to a mere 78,000 members, or 22 percent of the total membership. Sri Lanka's provident fund system stands out as the only one in South Asia with broad coverage, thanks to higher income per capita, a larger formal sector, and the highest literacy and life expectancy in the region.[3] Its Employees Provident Fund has about 1.9 million active contributors out of an eligible population of 2.9 million; active membership is equivalent to 13 percent of the working-age population.

Mandatory pension programs in South Asian countries are financed mostly through payroll charges levied on employers and employees. These levies, generally high compared with those in other low-income countries, may encourage evasion, discourage wider participation, and work against formalization of labor markets. The earmarked payroll tax amounts to 20 percent of the covered wage bill in Nepal, 23 percent in Sri Lanka, and 25.66 percent in India.[4] Contributions are somewhat lower as a share of labor costs, however. The charges are levied only on basic salary and dearness allowances and not on other benefits (such as canteen, transport, and in-kind benefits), which may constitute as much as 25-35 percent of total compensation. Even so, payroll charges tend to be high by international standards, approaching rates prevalent in countries with more mature demographic profiles such as Eastern European countries and high-income OECD countries (figure 3.1).

Figure 3.1

Payroll charges for mandatory pension programs for private sector workers in selected countries and regions



Note: Estimates assume that in-kind benefits are roughly 27 percent of total compensation and that in Nepal in-kind benefits and dearness allowances sum to about 40 percent. Payroll taxes in Latin America differ markedly across countries. See annex 5 for country data.

Source: World Bank.

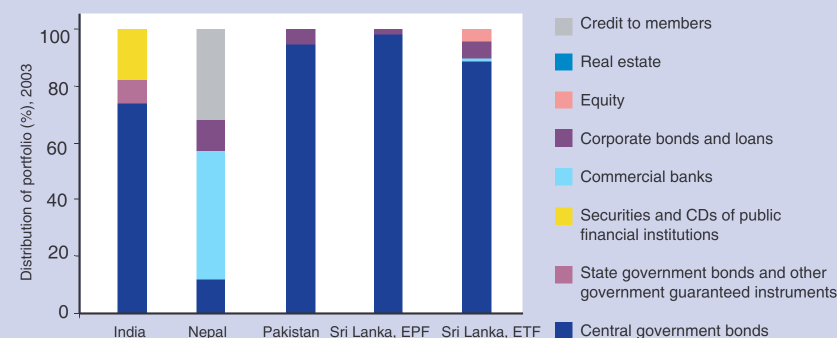
Pakistan is a notable exception: its Employees Old Age Benefits Institution (EOBI) is financed with a payroll tax of only 5 percent paid by employers and a flat levy on employees of PRs 20 a month.[5] For workers earning more than the earnings ceiling of PRs 3,500 a month, this flat levy amounts to a payroll charge of 0.6 percent or less. Once the system reaches maturity, these payroll taxes will be insufficient to finance the relatively high replacement rate promised by the system (equivalent to 70 percent of the final wage for 35 years of contributions). Moreover, there are no predefined procedures for adjusting the flat levy, for example, by linking it to GDP growth or to average wage growth in the formal sector. Flat levies favor high-income workers, since benefits are linked to final wages.

Historically the Employees Old Age Benefits Institution also benefited from fiscal support. Its statute required public transfers matching contributions until 1995, when statutory transfers were drastically reduced to PRs 100 million a year (roughly 10 percent of the amount due in 1995). But because of fiscal constraints, even these smaller transfers have not always been made.[6] Given the program's thin participation and formal sector workers' higher earnings relative to the rest of the population, such transfers represent a less than equitable use of scarce fiscal resources. For analogous reasons, fiscal financing of mandatory pension programs for the formal sector would be undesirable in other countries in the region as well.

Tight investment regulations

Figure 3.2

Portfolio distribution by mandatory pension funds for private sector workers in selected South Asian countries, 2003



Source: India, Employees Provident Fund Organization; Nepal, Employees Provident Fund; Pakistan, Employees Old-Age Benefits Institution; and Sri Lanka, Employees Provident Fund.

South Asian governments have traditionally subjected most mandatory pension funds to tight investment restrictions, often in pursuit of other fiscal policy objectives, with adverse consequences for the funds' performance and members' returns. Faced with low tax revenues, poorly functioning public debt markets, and large deficits, governments often turned retirement programs into quasi-fiscal instruments, a problem especially acute during the programs' early years. Today most of the assets in the mandatory pension funds of India, Pakistan, and Sri Lanka remain invested in public debt or other government-guaranteed instruments (figure 3.2). Nepal's Employees Provident Fund is a notable exception to this pattern. None of the four countries has allowed the funds to invest in foreign assets, reducing opportunities for diversifying country risk.

Pakistan introduced a more flexible investment regime for pension funds in 2003 as the return on government debt fell dramatically and the country embarked on ambitious financial sector reforms.[7] But in India and Sri Lanka the regulatory framework has barely changed (table 3.3). In these two countries modernization of investment regulations seems to be lagging progress made in other

areas of the financial sector, such as insurance. India took a small but symbolic step in 1998 by allowing portfolios to include private corporate bonds (up to 10 percent of new investment allocations), but no such investments have yet been made.[8] By contrast, India's insurance companies are allowed to invest in a wide range of private securities (see annex 6). Similarly, in Sri Lanka the Employees' Provident Fund was limited to investments in public debt until the mid- to late 1990s. Since then it has undertaken minimal investments in publicly traded corporate securities.[9]

TABLE 3.3

Portfolio limits for mandatory pension funds for private sector workers in selected South Asian countries, 2003 (limit as % of portfolio)

Asset class	India[a]	Nepal[b]	Pakistan[a]	Sri Lanka (EPF)
Central government bonds	25	30	100	100
State government bonds and other government-guaranteed instruments	15	n.a.	100	n.a.
Securities and CDs of public financial institutions	40	50	100	0
Commercial banks	–[c]	50	–[c]	0
Corporate bonds and loans	10	25	80	10
Equity	0	25	80	2
Real estate	0	25	30	0
Credit to members	0	60	0	–[d]
Foreign investment	0	0	0	0
Total assets accumulated (% of GDP)	3.3[e]	7.1	1.7	18.1

n.a. Not applicable.
a. Portfolio limits apply to new investment allocations
b. Portfolio limits are for 2004.
c. The limits for public commercial banks are 40 and 100 percent for India and Pakistan, respectively.
d. Up to 75 percent of account balance can be used as mortgage collateral.
e. Total assets accumulated in Employees Pension Scheme, Employees Provident Fund, and Employees Deposit Linked Insurance.
Source: India, Employees Provident Fund Organization; Nepal, Employees Provident Fund; Pakistan, Employees Old-Age Benefits Institution; and Sri Lanka, Employees Provident Fund.

The excessive concentration in public or government-guaranteed instruments contrasts with the composition of other pension portfolios around the world (table 3.4). Many emerging market economies-such as in Eastern Europe and Latin America-have also applied portfolio investment limits. But they have generally granted fund managers more flexibility, allowing investments in a wider range of private instruments, including equity. Equity investments register greater fluctuation in the short term, but the long-term investment horizon of pension funds can help smooth the short-term volatility while offering higher returns.

TABLE 3.4

Portfolio composition of pension funds in selected countries, various years (% of total portfolio)

Country and year	Cash and Deposits	Fixed income[b]	Loans	Equity	Other	Foreign securities[a]
Australia (2002)	8	20	4	60	9	19
Bolivia (2002)	-	97[c]	-	0	1.5	1.3
Canada (2001)	1	41	3	50	6	21
Chile (2003)	15	46	0	38	2	24
El Salvador (2002)	-	99.5[c]	-	0.5	0	0
Hungary (2002)	4	82[d]	-	14	0	4
Poland (2002)	4	68[d]	-	28	0	1
United Kingdom (2001)	3	14	0	61	22	23

- Not available.
a. Foreign securities are also included in other asset classes here.
b. Investments in government bonds are 69 percent, 84 percent, 68 percent, and 67 percent for Bolivia, El Salvador, Hungary, and Poland, respectively.
c. Includes deposits and loans.
d. Includes loans.
Source: FIAD 2003; Gill, Packard, and Yermo 2005; and Rocha and others forthcoming.

Many countries with a common law tradition have followed a different regulatory approach, applying a "prudent person" rule-in which a broad prudential standard of diligence and expertise is established-rather than quantitative portfolio limits. South Asian countries with a common law tradition but less developed capital markets might consider combining the two approaches. For example, they could establish prudential standards of diligence alongside some basic quantitative limits that are less restrictive than the current ones. Indeed, there is room for greater portfolio diversification even within nascent domestic capital markets.

Reconsidering the investment policies of these funds is critical given the sizable assets accumulated-particularly in Sri Lanka (where they amount to 20.6 percent of GDP),[10] Nepal (7.1 percent), and India (3.3 percent)-the potential economic misallocation of scarce long-term savings, and the effects on members' potential returns and retirement savings. A related concern is that the interest rates credited to members' accounts are largely administered in India, Nepal, and Sri Lanka, with the result that there is often a disconnect between these and the yield of the underlying portfolio. In India historically, administered interest rates had generally implied a subsidy from members to the government. But that started to change in the late 1990s as inflation fell and the nominal interest rate remained unchanged as a result of heavy political pressure. In 2000 the government started to reduce this rate in small steps, bringing it to 9.5 percent for fiscal 2003/04, still above the rates of traded public debt.

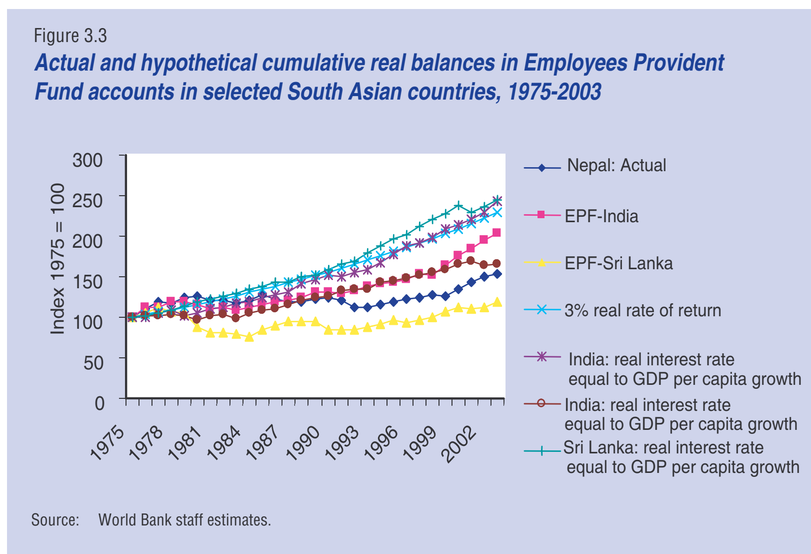


Figure 3.3

Actual and hypothetical cumulative real balances in Employees Provident Fund accounts in selected South Asian countries, 1975-2003

Source: World Bank staff estimates.

Although the investment performance of provident funds has improved during the past decade, it has nevertheless imposed a significant long-term penalty on members' balances. This penalty has been especially large in Sri Lanka, where the real rate of return declared on Employees Provident Fund accounts during the past three decades averaged a mere 0.4 percent, reflecting negative returns in the 1970s and 1980s. For the provident funds of India, Nepal, and Sri Lanka comparisons of the real growth trajectory of contributions made in 1975 with that in a hypothetical scenario-in which real interest rates are assumed to be equivalent to real GDP per capita growth-show that fund performance lagged GDP per capita growth in all cases (figure 3.3). The gap is widest in Sri Lanka and narrowest in Nepal, where economic performance has been weaker.

The performance of national provident funds in South Asia is consistent with that of funds in other Asian countries (such as Indonesia, Malaysia, and Singapore) and of many publicly sponsored pension plans around the world whose portfolios show a strong bias toward public sector instruments and in which interest rates are often administered and delinked from the underlying portfolio.[11] Most of these funds have been subject to a poor governance structure that has failed to isolate them from political pressures.

Principal-agent problems in the governance of public pension funds

The governance frameworks for mandatory pension programs for private sector workers in South Asia are poorly suited to protecting members' interests and minimizing the risks of principal-agent problems. The agencies responsible for these plans undertake the administrative tasks while the government, explicitly or implicitly, determines investment policies.

Most of the funds are administered by representative boards, few of whose members have the necessary investment expertise. For professional boards, by contrast, trustees are selected on the basis of their experience and subject to unambiguous conditions for their appointment and removal, enhancing the accountability of members and isolating them from political interference. For the South Asian funds most boards are tripartite, with representatives of employers, employees, and governments. But government representation generally dominates, making the boards more vulnerable to political pressures. In India, for example, the tripartite board administering the Employees Provident Fund Organization reports to the minister of labor. Moreover, the board had as many as 39 members in 2003, a number that seems far too large to allow clear accountability of trustees.

In Sri Lanka the investment function of the Employees Provident Fund is vested with the Monetary Board of the Central Bank, an arrangement that poses several problems because the board is also financier for the Treasury and a bank supervisor. (The provident fund acquires and holds around 34 percent of government debt.) As a bank supervisor, the Monetary Board has access to privileged information from banks-and it has followed the prudent policy of not allowing the fund to invest in bank instruments. But this policy has limited the fund's investment opportunities and hampered the development of new long-term financial products by banks. In the few instances when a share of a Sri Lankan fund's portfolio was subcontracted to the private sector (such as by the Employees Trust Fund), the experience was not positive because of a lack of transparency in the selection of managers, the absence of performance benchmarks, and improper oversight.

TABLE 3.5

Core governance features of public pension funds in selected South Asian and comparator countries

Feature	India (EPFO)	Nepal (EPF)	Pakistan (EOBI)	Sri Lanka (EPF)	Canada	New Zealand
Fiduciary responsibility	Tripartite board	Tripartite board	Tripartite board	Monetary Board (hybrid board)	Professional board selected by finance minister from short list of nominees	Professional board selected by governor-general from list of nominees
External audit requirements	Yes	Yes	Yes	Yes	Yes	Yes
External actuarial valuation requirements	Highly restricted availability	n.a.	Highly restricted availability	n.a.	Full disclosure	Full disclosure
Share of portfolio that is outsourced	0	0	0	0	All	All
Explicit and objective criteria for selecting and monitoring external asset managers	n.a.	n.a.	n.a.	n.a.	Yes	Yes
Statutory asset class restrictions	Yes	Yes	Yes	Yes	30% limit on foreign securities	No

n.a. Not applicable.

Source: Employees Old-Age Benefits Institution (Pakistan), Employees Provident Fund (Nepal), Employees Provident Fund (Sri Lanka), and Employees Provident Fund Organization (India) and World Bank staff.

Transparency and disclosure-essential pillars of a strong governance structure-have fallen short of international best practice in South Asia's mandatory pension funds (Impavido 2003). Stakeholders, especially members and taxpayers, lack access to proper information to hold trustees accountable. In India and Pakistan, for example, the national provident funds are required by law to obtain independent actuarial valuations. But they do not make these valuations publicly available, preventing members and taxpayers, who bear ultimate responsibility for maintaining funding levels, from understanding the plans' long-term financial positions. Nor is information on board procedures and rules easily available to the public and members. And board procedures often are inadequately defined.

Core governance features of mandatory public pension funds in South Asia contrast in several ways with those of Canada and New Zealand, both part of a larger group of OECD countries that have recently strengthened the governance of prefunding arrangements (table 3.5). Reforms in Canada were far-reaching and ambitious and may not be easily replicated in other countries-especially in South Asia, where the overall governance environment is weak. Nevertheless, specific elements, such as extensive disclosure and reporting, could be applied in South Asia as policymakers assess options for gradually improving the governance of public funds (box 3.1).

BOX 3.1

Emerging best practices in public fund governance: the case of Canada

In the mid-1990s Canada enacted ambitious reforms to improve the long-term finances of its defined benefit plan, the Canada Pension Plan (CPP). These included a phased increase in the contribution from 6 percent in 1997 to 9.9 percent in 2002 and improvements in the investment of reserves, which in the past had automatically been invested in government bonds at below-market rates.

In addition, the reforms introduced critical changes to minimize the potential for political interference and foster professional asset management in the best interests of participants. While the federal and provincial governments remained responsible for the plan's design, an independent organization-the CPP Investment Board-was created to manage the assets.

The reform legislation specifies that the CPP Investment Board "must have a sufficient number of directors with proven financial ability or relevant work experience." In addition, it defined an appointment procedure with several checks and balances to minimize opportunities for cronyism: federal and provincial finance ministers appoint a nominating committee of public and private sector representatives, the committee identifies suitable candidates, and the federal finance minister makes the final selection in consultation with provincial governments. This procedure has resulted in a board of professionals with strong accounting, actuarial, and investment management credentials. And the legislation's prescription that no director may be removed except for just cause during his or her three-year term safeguards the board's independence.

The legislation clearly defines the CPP's investment mandates: to manage the assets in the best interests of contributors and beneficiaries, and to maximize investment returns without incurring undue risk with respect to the CPP's financial requirements and future obligations. One constraint, however, is a requirement to invest 70 percent of assets in Canada.

Public accountability and reporting are extensive. The board is accountable to Parliament and must submit a comprehensive annual report to all members of Parliament as well as to the press, trade unions, and associations of pensioners and other stakeholders. The annual report includes audited financial statements and information on corporate governance practices, such as compensation, mandates, activities, and other management decisions that require board approval.

Source: Palacios (2002)

Do mandatory pension programs provide adequate benefits?

Mandatory pension programs in South Asia have generally provided inadequate retirement income support. Members often rely on other sources of income during retirement, including family transfers. Some even continue to work while drawing pensions. The reasons for inadequacy of benefits differ between provident and defined benefit programs.

In provident plans a number of factors have contributed to inadequacy of benefits, including poor historical returns, excessive withdrawals during the accumulation phase, and lump-sum withdrawals at retirement that expose members to longevity risks (box 3.2). In Sri Lanka, for example, the low historical rate of return (0.4 percent), combined with a low minimum retirement age, would result in a replacement rate of less than 25 percent (assuming actuarially fair annuities). Early withdrawal policies could have made this replacement rate even lower. In Nepal accumulated balances are reportedly very low because of policies that allowed flexible early withdrawals until

BOX 3.2

Early withdrawal policies in national provident funds

In Sri Lanka the Employees Provident Fund permits early withdrawals by members who leave employment for health reasons, female members who marry, or members who permanently emigrate. In addition, since 1998 the program has allowed members to pledge their balances as collateral for home loans from certain state banks. Many workers who have done so have later defaulted on their loan, permitting the lender to recover the interest and principal owed plus a penalty of 30 percent. Pledging balances as collateral has thus become a costly mechanism for early withdrawals.

In India, after five years of membership in the Employees Provident Fund, workers can withdraw the equivalent of three years' wages to purchase a house. After seven years workers can withdraw up to 50 percent of the employee share of accumulated contributions for their own marriage or that of a son or daughter, or for tuition for higher education for a son or daughter. Withdrawals can also be made to repay a loan to a cooperative society, or as an advance in case of a strike or if the electricity is cut off to a factory in which a worker is employed. And the total balance in an account can be withdrawn in the event of resignation, retrenchment, dismissal, enterprise closure, or permanent invalidity. In 2001-02, 86 percent of full claims made were due to resignation, and less than 12 percent to retirement, death, or permanent invalidity.

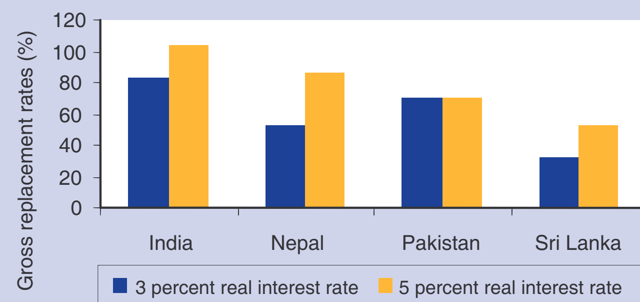
Source: Sri Lanka, Employees Provident Fund; India, Employees Provident Fund Organization.

2001.[12] No specific data are available on retirees' average balances, however. In practice, mandatory provident programs have tended to resemble long-term savings plans more than they do retirement plans.

To illustrate how different factors affect benefit levels, the potential long-term gross replacement rate is simulated across national provident funds (figure 3.4). The simulation is based on an individual who works without interruption from age 25 until the statutory retirement age, with 3 percent real wage growth. It assumes no early withdrawals and real interest rate scenarios of 3 and 5 percent. Sri Lanka's gross replacement rate would be the lowest, because of its very low minimum retirement age of 55. India's would be the highest, thanks to the relatively generous pension received through the defined benefit pillar.

Figure 3.4

Replacement rates in national provident funds under different interest rate scenarios in selected South Asian countries



Note: Annuities are calculated on an actuarially fair basis. For other assumptions, see text

Source: World Bank staff estimates

Defined benefit programs promise relatively generous replacement rates, but the real value of benefits has been partly eroded by inflation (table 3.6). In Pakistan only the minimum pension (now set at PRs 700, or about US$12, a month) has benefited from ad hoc indexation policies. The combination of a low ceiling on the covered wage and no indexation of benefits to inflation can make the scheme relatively flat. In India the Employees Pension Scheme (EPS) has usually adjusted benefits following actuarial valuations. But it did not do so after the last two actuarial valuations. This situation will become untenable in the long term as the real value of pensions further diminishes. In addition, the benefit formulas in both countries are based on final salary, which penalizes unskilled workers because of their generally flatter earnings profile.

A problem common to most mandatory provident funds and defined benefit programs in the region is the inadequacy of the minimum retirement age, at between 50 and 60 years. The low statutory retirement ages will add to the financial problems of the defined benefit schemes as liabilities grow-and cut the ratio of saving to retirement years in defined contribution schemes. While some retirement ages may have been adequate at the time the funds were established, changes in life

TABLE 3.6

Basic features of defined benefit formulas for mandatory programs in India and Pakistan

Country and program	Monthly pension	Retirement age (years)
India, EPS	Final salary x (years of service + 2)/70	58
Pakistan, EOBI[a]	Final salary x years of service x 0.02	60

a. There is a low ceiling of PRs 3,500 a month (about US$60) on the covered wage.

Source: India, Employees Provident Fund Organization; Pakistan, Employees Old Age Benefits Institution.

expectancy suggest a need for revision (table 3.7). Sri Lanka faces the most acute problem, with the region's longest life expectancy. In that country life expectancy at retirement for participants in the Employees Provident Fund is 20.1 years for men and 27.2 for women. For female participants, the higher life expectancy and lower retirement age mean that the accumulation and retirement phases will last a similar number of years and that accumulated account balances during the working years will be insufficient to provide adequate income for retirement. Many countries around the world with different statutory retirement ages for men and women are moving toward unification through incremental changes. The United Kingdom, for example, is raising the minimum retirement age for women to 65 years over a 10-year period; others have introduced such changes at a faster pace.

TABLE 3.7

Life expectancy at retirement for participants in selected pension programs in South Asia, 2005 and 2040 (years)

Country and program	Statutory retirement age		Life expectancy in 2005		Life expectancy in 2040	
	Male	Female	Male	Female	Male	Female
Pakistan, EOBI	60	55	16.2	22.1	17.4	24.9
Sri Lanka, EPF	55	50	20.1	27.2	21.5	28.3
Sri Lanka, ETF	60	60	16.7	18.5	17.8	19.4

Source: World Bank staff estimates.

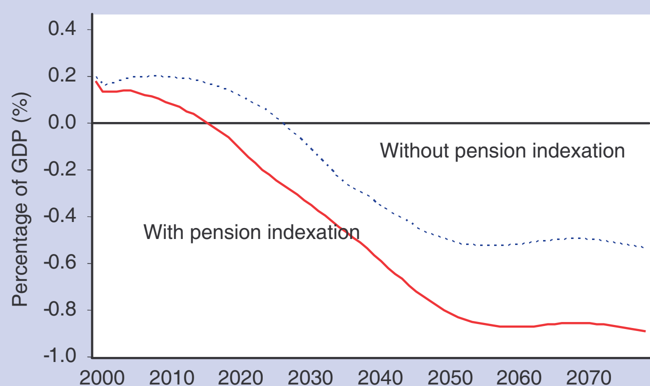
Adjustments to the statutory retirement ages of mandatory schemes in South Asia are desirable both to harmonize the minimum retirement ages for men and women and to achieve a better balance between the number of years spent in the accumulation and retirement stages. In Sri Lanka, for example, the minimum retirement age for the Employees Trust Fund is already 60 years, while the Employees Provident Fund has retained the retirement ages set in 1958-55 for men and 50 for women. Further incremental changes above 60 may become necessary in the future in anticipation of additional rises in life expectancy.[13]

Challenges to long-term sustainability

The two large mandatory defined benefit plans in the region-Pakistan's Employees Old Age Benefits Institution and India's Employees Pension Scheme-are still young and showing positive cash flows. But both face considerable challenges to their long-term sustainability. The problems stem from a serious imbalance between the high replacement rate promised and the low contribution rate. In addition, retirement ages will need to be progressively adjusted with changes in life expectancy.

Assuming that benefits were indexed to inflation (and assuming real wage growth of 3 percent), the implicit real rate of return of the Employees Old Age Benefits Institution would be close to 10 percent and that of the Employees Pension Scheme close to 7 percent, both significantly above the cost of public debt. For the Employees Old Age Benefits Institution the results of the most recent actuarial analysis, in 2002, are not publicly available. But earlier studies suggest that financial flows could remain positive for around the next two decades, after which reserves would begin to be depleted. Reserves could be exhausted soon thereafter, leading to growing negative cash

Figure 3.5
Cash flow projections for India's Employees Pension Scheme with and without benefit indexation



Note: Estimates based on PROST (Pension Reform Option Simulation Toolkit) model.
Source: World Bank 2001

flows (the 1999 actuarial audit suggests that reserves could be exhausted by around 2035). For India's Employees Pension Scheme the World Bank actuarial analysis conducted in 2000 suggested that net flows into the fund would be positive through almost 2035 without indexation of pensions (figure 3.5). Assuming price indexation, the scheme would face a negative cash flow much earlier. Public disclosure of the actuarial plans would encourage a more open debate on the long-term viability of these programs before pension promises become deeply entrenched.

Actuarial analysis of the noncontributory benefits of the Employees Trust Fund in Sri Lanka is also needed to shed light on future costs. Although the program is still relatively small, benefits are being paid from the investment returns of the provident fund pillar, a situation that will clearly become untenable when the program grows.

By design, the defined contribution component of national provident funds will not accumulate unfunded liabilities, but early withdrawal policies are seriously affecting their cash flow profile. In Sri Lanka's Employees Provident Fund, for example, total claims and payments rose from 35 percent of contributions in 1995 to 66 percent in 2002 and a peak of 85 percent in 2003 as a result of the new home loan policy (see box 3.2). If these trends were to continue, the fund could face a negative cash flow in a few years despite a demographic profile in which less than 10 percent of the population is over 60. Such cash flow trends are another indication that provident funds are not building sufficient assets while the population is still relatively young.

Weak administration

Centralized mandatory pension schemes for private sector workers in South Asia have traditionally offered poor service to members. These plans have been organized mostly around the employer, not the employee, and their business processes are outdated and mostly manual. Record keeping, a core business function, is particularly deficient. With no unique identification numbers, accounts are duplicated and some members lose access to part of their retirement savings. Sri Lanka's Employees Provident Fund, for example, had 1.9 million active accounts at the end of 2003-but around 9.7 million accounts. (It is estimated that about 500,000 belong to people who are deceased.) Each time a member changes employment, a new account is opened. At retirement, participants try to consolidate their accounts, but because of poor record systems some of these accounts are lost. Similarly, in 2002 the fund had 135,745 registered employers, of which only 47,660 (35.1 percent) contributed. Most of the noncontributing employers were probably defunct enterprises whose records had not been cleared.

Compliance appears to be low throughout the region, though most countries have no thorough studies on the matter. Cases of collusion have been reported in which employers settle contributions by paying off inspectors and underreporting their payroll and their employee numbers. The limited automation makes it difficult to monitor compliance and share information with the tax authorities. In addition, most tax administration agencies in the region are just beginning to modernize and so are not yet ready to help in monitoring compliance. And because pension funds provide information to members only through their employer, members too have limited ability to monitor employers' compliance.

Lackluster performance of exempt occupational funds

Some large public and private sector firms in India and Sri Lanka are exempt from participation in the national retirement plans if they operate similar mandatory plans for their own employees. These plans, known as "exempt" occupational schemes, could potentially act as a catalyst for reform of national provident funds, which lack public credibility, face growing problems, and are saddled with heavy bureaucracy. But the exempt occupational schemes have failed to create a good benchmark for national provident funds. Instead, they have put in a lackluster performance and are declining in number due to a combination of regulatory constraints, inadequate supervision, and lack of professional management. In Nepal private firms are allowed to contribute to the Employees Provident Fund or to set up a provident fund offering similar benefits and managed by an authorized financial entity. But no detailed information exists on the assets under management and the performance.

The number of firms with exempt occupational funds is small in both India and Sri Lanka. But these funds manage substantial assets because of the large size of the firms, the high average wage of participants, and (possibly) low levels of early withdrawals (table 3.8).[14] Yet in recent years Sri Lanka's exempt funds, known as approved private provident funds, have not materially surpassed the investment performance of government provident funds, and in India regulation effectively precludes that outcome. Administration is probably one of the few areas in which exempt funds have significantly outperformed national funds.

TABLE 3.8

Coverage and assets of exempt occupational funds in India and Sri Lanka, 2003

Country	Firms	Workers (thousands)	Assets (US$ millions)
India[a]	2,564	3,750	8,115
As % of EPF	0.8	10.5	41.4
Sri Lanka	182	164	950[b]
As % of EPF	3.8[c]	8.3	29.6

a. Data are for end-March 2003.
b. Includes loans to members.
c. Active contributors as a percentage of those in the Employees Provident Fund.
Source: India, Employees Provident Fund Organization; Sri Lanka, Ministry of Labor.

A regulatory prohibition in Sri Lanka and bureaucratic hurdles in India are leading to a decline in the number of exempt funds. In 1996 a two-decades-old provision in Sri Lanka's Employees Provident Fund Act was suddenly activated, prohibiting the issuance of new licenses for such funds. This step was driven by concerns about the poor regulatory framework and the failure of several large plans in the early 1990s, most of which had been operated by large public companies in distress.[15] As several plans closed and no new licenses were issued, the number of plans in Sri Lanka fell from 204 in 1998 to 182 in 2003. Various governments have supported the drafting of a modern regulatory and supervisory framework, but no new law has taken effect yet.

In India no new plans have been approved in recent years. Establishing an exempt fund involves a long, complex process, and employers often complain that the Employees Provident Fund Organization (EPFO) makes the process even more difficult. The EPFO has oversight of exempt funds and could be interested in preserving a captive market of retirement plans for private sector workers.

Moreover, regulatory constraints imposed on exempt funds in India have prevented them from competing effectively with the EPFO. These funds face investment guidelines as tight as those for the EPFO-managed funds, and are required to declare an interest rate on members' accounts no lower than the EPF interest (see table 3.3). Current guidelines allow exempt funds to put up to 10 percent of new investments in private fixed income securities, but few have chosen to profit from this discretion, probably because the EPFO has not done so and funds are benchmarked against it. In the past most funds had managed to achieve the EPFO benchmark on rate of return. But meeting this benchmark has become more challenging in recent years because the EPFO's administered interest rate now surpasses market rates.

Exempt funds in Sri Lanka are allowed greater investment freedom than those in India, but they have not profited from it. The funds have continued to favor fixed income instruments, mainly government securities and bank deposits. In light of their uncertain regulatory status, the funds may have been reluctant to stray too far from the conservative practice of the Employees Provident Fund, which invests nearly all assets in government debt. In addition, most exempt funds manage investments in-house and, lacking professional investment managers, may have preferred to hold overly conservative portfolios, to the detriment of their long-term performance.[16]

The regulatory framework for exempt funds has barely changed over the years in both countries, and supervision, which falls under the purview of the EPFO in India and the Ministry of Labor in Sri Lanka, could be greatly improved. Both countries expect plans to be established as independent trusts, with the laws governing trusts dating to the late 1800s in India and early 1900s in Sri Lanka. In Sri Lanka the fiduciary duties and liabilities of a trustee are relatively well defined for a general trust, but not binding enough for a retirement plan, which requires greater diligence. Arrears on contributions have been a problem for several exempt funds in both countries, and in these cases the funds are closed and their members transferred to the national provident plan.

The need to reform mandatory pension schemes for the private sector

A careful review of the broad policy framework for mandatory pension programs for private sector workers in South Asia is long overdue. There has been little change in the regulatory framework for these funds since they were established, in some cases more than 50 years ago. While some institutions are taking initial steps to improve record keeping, far more needs to be done on both administrative and policy fronts. These programs have not met their core objective of ensuring old-age income security, and defined benefit plans face serious challenges to their long-term financial sustainability. Addressing the weaknesses of mandatory pension schemes will be important to eliminate distortions that could hinder the expansion of the formal sector and to mitigate the potential fiscal costs of supporting what is a small group of beneficiaries. Also critical is improving the design of the schemes, to better help households meet their consumption smoothing needs and ensure that their retirement savings are efficiently intermediated rather than serving as a quasi-fiscal instrument.

In exploring reform strategies for mandatory pension schemes, policymakers should focus on their core function of achieving old-age income security. Making the target replacement rate more

explicit will be desirable, but high replacement rates in the mandatory pillar are best avoided, since they would not be welfare enhancing. High replacement rates require high contribution rates, which could lead to current welfare losses for younger workers with modest incomes and limited access to finance. Younger workers may be better served by having greater freedom to manage their savings. And in some cases it could even be desirable to revisit the mandatory nature of plans.

All these objectives could be achieved through a defined contribution (provident) plan, a defined benefit structure, or a combination of the two. In addition, policymakers should consider how to more closely harmonize pension schemes for civil servants and private sector workers, to facilitate labor mobility and share institutional arrangements.

Addressing challenges of national provident funds

Countries with national provident plans that would like to retain the defined contribution structure face two critical challenges: they need to transform these plans from long-term savings instruments into genuine retirement income programs and gradually introduce decentralized fund management.

Transforming national provident plans into retirement income programs. Having tried to achieve too many-and often conflicting-objectives, mandatory provident funds have not been an effective instrument for providing retirement income. There are tradeoffs between having a large mandatory pillar and offering workers greater flexibility in managing their savings. As an option, policymakers may want to pursue a smaller but more effective mandatory retirement income pillar that will allow participating workers to secure a minimum level of income for old age.

A smaller but more effective mandatory defined contribution pillar could involve the following critical changes:

- *Reducing the contribution rate while rationalizing withdrawals or introducing a scheme with two accounts-a mandatory account with no withdrawals and a voluntary account with selected withdrawals.* The two-account approach may be easier for political reasons. In Sri Lanka the Employees Provident Fund and Employees Trust Fund could be unified to avoid duplication. In addition, unfunded programs of the Employees Trust Fund (health, education, housing) could be revisited, with those that are a priority considered within broader national policy strategies.
- I*ncreasing clarity on the target replacement rate for the mandatory pillar.* The contribution rate for the mandatory pillar (or account) should be revisited to ensure that it is in line with the target replacement rate for that pillar. A 10-15 percent contribution rate, for example, could result in a replacement rate of 30-45 percent, assuming a 30-year contribution period and a retirement age of 60. In Sri Lanka there is also a need to establish a ceiling on covered earnings (for example, three times the average formal sector wage).
- *Raising the minimum retirement age.* The minimum retirement age, which has remained the same over the lifetime of these programs, will need to gradually increase in line with life expectancy. Sri Lanka's Employees Provident Fund should also seek to unify the retirement ages for men and women, probably targeting a unified minimum retirement age of at least 60 years.
- *Introducing phased withdrawals.* In the absence of well-developed annuities markets, mandatory phased withdrawals should replace lump-sum provisions at retirement to prevent retirees from quickly using up their mandatory savings. This change should

apply to younger and middle-aged workers, since those nearing retirement generally have small account balances. In parallel, policymakers should foster the development of annuities markets, a challenge requiring long-term efforts (see chapter 5).

All these reforms should be phased in, with the changes applied only to younger members to ease the transition. For members close to retirement, account balances are probably too small for most of these changes to be meaningful.

Decentralizing fund management through a phased approach. The second greatest challenge for mandatory national provident plans is to strengthen governance and move to decentralized fund management offering greater choice to members. National provident funds, especially in Sri Lanka, are too large relative to domestic capital markets and the economy, leading to inherent political risks and potential economic distortions. Thus the shift to a decentralized approach should include liberalization of investment regulations. Without more flexible investment regulations, plans will remain hostage to fiscal needs, rendering competition in fund management almost irrelevant.

Progress in improving the governance of pension funds and decentralizing fund management can probably be only gradual given the difficult initial conditions-weak national governance environments, small local financial markets, and a high level of investment in nontradable instruments. In Sri Lanka, for example, the Employees Provident Fund holds more than a third of the government's long-term debt. Even so, there are opportunities for making progress on these issues, at least in small steps.

On the governance front the priority should be to increase disclosure. Reforms could focus on greater public disclosure of boards' rules, key decisions, and processes for defining investment guidelines; and wider publication of external audits and other formal reports on fund performance. Also desirable would be to appoint investment advisers to assist investment committees and boards, though final responsibility for determining investment guidelines should always rest with board members.

In the medium term deeper governance reforms will be needed. Necessary reforms include increasing the clarity of boards' mandates and ensuring that their prime objective is to safeguard members' interests; moving toward more professional and independent boards by including a few independent experts with a strong knowledge of investment management under clear rules for appointment and dismissal to ensure their independence; and introducing oversight by an independent agency (this should also be done for private pension providers; see chapter 5).

Options for reform leading to gradual decentralization of fund management could include some combination of the following three steps: outsourcing asset management, opting out a share of accumulated assets, and permitting greater choice and competition through occupational funds.

- *Outsourcing asset management.* The more cautious approach to decentralizing fund management would be to outsource management of a share of assets to the private sector. Transparent procedures and careful monitoring and benchmarking would be essential to avoid the misguided outsourcing experience of Sri Lanka's Employees Trust Fund in the 1990s. The board of the national provident fund could define the overall investment policy, with the private sector invited to manage specific parts of the portfolio. Asset managers should be selected through competitive bidding on the basis of fees and qualifications. Given the limited experience in some countries,

foreign professional managers should be invited to bid. The outsourcing could be undertaken in small, gradual steps, starting with a modest share of the portfolio. A good place to begin would be with the non-public debt part of the portfolio, a choice that would also help safeguard against public interference in capital market development and politically motivated investments.

- *Opting out a share of accumulated assets.* In a second approach pension funds could allocate a share of new contributions from a member (or a share of the assets in the member's account above a minimum level) to investment portfolios managed by other private entities. To avoid the high fees that have characterized retail plans, the government could use competitive bidding to select a few pension funds and allow individual members to choose among them. The share of the opt-out contribution could grow over time. This approach would allow a smooth transition and could be a feasible alternative to the quasi-monopolistic fund management approach of the national provident funds. These reforms should occur in tandem with the governance reforms discussed above.
- *Introducing competing occupational plans.* As a complement to the first two approaches, employer and industry group funds could function in parallel with national provident funds. This model has operated in India and Sri Lanka since the national provident funds began, though with mixed results. To be effective, occupational schemes need greater freedom in managing their portfolios along with a more robust regulatory and supervisory framework and professional asset management. Sound regulation may also mean requiring a minimum size (in terms of employees) to avoid the emergence of too many small plans that would be difficult to supervise.

Fostering greater sustainability of defined benefit plans

Mandatory defined benefit plans such as Pakistan's Employees Old Age Benefits Institution are still young. That makes this a propitious time to explore reform strategies-before the plans' liabilities increase and expectations based on unsustainable pension promises become deeply entrenched. Reforms for defined benefit plans should seek to:

- Foster greater financial sustainability.
- Correct design flaws in the benefit formula to eliminate inequities and excessive discretion.
- Promote better management of funds' reserves.

Addressing the financial sustainability and design flaws of benefit formulas. Improving the long-term financial sustainability of defined benefit plans will require correcting the serious disconnect between contributions and benefits. In principle, this could be achieved by increasing contributions, reducing replacement rates, or doing both. But given current labor market conditions in South Asia, where there is a need to encourage the expansion of the formal sector, the region's countries would do well not to impose a large mandatory defined benefit pillar-thus avoiding the mistakes of other developing countries-and instead combine a more modest mandatory defined benefit pillar with voluntary arrangements. A fairly modest pension would be enough to meet the core objective of mandatory schemes-to prevent old-age poverty.

Pakistan's Employees Old Age Benefits Institution, for example, could move to a modest flat pension benefit indexed to inflation (a benefit closer to 25-30 percent of the average formal

sector wage, for example), a strategy that would be more financially sustainable. In some ways this shift would represent little change from today's situation, since the lack of pension indexation has led to a flattening of benefits. Even with a modest flat-rate benefit, a small increase in Pakistan's very low contribution rate would still be needed to strengthen the system's financial sustainability.[17] The increase could be phased in. Other changes will also be desirable, such as raising the minimum retirement age, introducing a rule for adjusting the ceiling on the covered wage, and adjusting eligibility rules and benefits for the disabled.[18] The proposed reform and low contribution rate would leave room for individuals (and employers) to complement the benefit from the Employees Old Age Benefits Institution with voluntary retirement savings, for which the government is already drafting legislation. As an alternative to the defined benefit pillar, the government could consider shifting to a defined contribution program, which would eliminate the fiscal sustainability risk.

Improving the management of funds' reserves. Defined benefit plans will build up significant reserves during their early phases, reserves that will eventually be depleted as the schemes mature. Improving the management of these reserves is important to strengthen the funds' financial viability. That will require both greater flexibility in investment and a more robust governance framework. Just as for the national provident plans, short-term priorities should be enhancing disclosure (including publishing actuarial valuations), laying the foundations for deeper governance reforms, and outsourcing asset management. In the medium term reforms could range more widely, including appointing a few highly competent independent experts to the board, outsourcing the management of some assets (possibly new investments) under transparent rules, and further strengthening disclosure.

Moving toward greater integration of schemes for civil servants and private sector workers

Greater harmonization of retirement income schemes for civil servants and private sector workers could bring benefits by facilitating labor mobility and reducing costs through shared institutional arrangements. In India, for example, there seems to be some asymmetry between the single defined contribution pillar for civil servants and the two-pillar structure for private sector workers. Moreover, India will be investing substantial resources in developing solid institutional arrangements for the defined contribution scheme for new civil servants. Thus as policymakers evaluate reform options for the mandatory scheme for private sector workers, they should consider whether to extend the new pension scheme for civil servants to the private sector. That also raises a more fundamental policy question: should the defined benefit pillar for private sector workers, which faces serious challenges to its long-term sustainability, be rationalized, or should it be converted into a defined contribution pillar, possibly with a minimum pension guarantee? Within this range of possible reforms, one option worth considering is to transform it into a flat benefit pillar complementing the defined contribution pillar.

Other countries with mandatory schemes could also consider having private sector workers and civil servants share a common platform of pension arrangements, one that provides a modest replacement rate. Policymakers could assess whether this basic scheme needs to be supplemented by another pillar as part of the overall compensation package for civil servants.

Enhancing the administration of mandatory plans

The success of all these policy reforms will depend on efficient administration. Awareness of serious

administrative problems is growing, and some institutions are already taking small, positive steps to strengthen member services and record keeping. But more can be done. On the administrative front three critical functions need to be undertaken: registration and collection of contributions, record keeping on accounts and provision of information to members on account balances, and payment of benefits. In all these areas, there are great opportunities for redesigning and improving processes and investing in information technology to enhance efficiency. Critically, the redesign of business processes must precede rather than follow the implementation of new information technology systems.

To improve administration, several institutions are considering the introduction of a unique identification number for members to replace the old employer-oriented system that resulted in serious duplication of accounts. But where reasonably good identification numbers exist, pension administration agencies should avoid developing their own. In Sri Lanka the Employees Provident Fund is examining the coverage and accuracy of existing identification numbers (such as for tax registration and the national identity card) and seems to be leaning toward using the national identity card number. In India the EPFO has piloted a unique identification number for members that will be extended to the rest of the country over the next couple of years. The EPFO decided to issue its own number because India has too many identification numbers and many of those have questionable coverage and accuracy. The government also is considering using this identification number for the new civil servants' scheme.

Besides streamlining registration and collection procedures, pension administration agencies could collaborate more with tax administration agencies to improve compliance. Any discussion of merging collection systems is premature, however. National tax administration agencies in South Asia face their own big institutional challenges. Better record-keeping systems and a unique identification number should allow pension administration agencies to provide information directly to members rather than through their employers, allowing members to monitor employers' compliance. On the benefit front, procedures need to be strengthened so that agencies can verify information on beneficiaries, speed the processing of benefit applications, and track deceased beneficiaries.

To reduce costs and minimize the burden on employers, policymakers should avoid duplicating administrative structures. The government of Sri Lanka, for example, is considering the unification of collection systems for the two national provident funds (Employees Provident Fund and Employees Trust Fund) so as to lessen the compliance burden on employers. Further integration of the two administrative structures (and policy programs) could avoid unnecessary duplication.

Summary and recommendations

The policy debate on mandatory retirement income schemes for private sector workers in South Asia has barely begun, but the need for change is mounting. In the four countries in the region with mandatory retirement income programs for private sector workers, the systems have been largely dominated by state monopolies. While the programs for civil servants have been a drain on the budget, those for private sector workers (provident funds and defined benefit schemes) continue to record positive cash flows, providing an easy source of financing for governments. But for participating workers these programs have for the most part proved to be a poor retirement income tool. Provident funds have resembled long-term savings plans rather than retirement income plans, with members often having to rely on other sources of income after retirement. Although improving in recent years, the funds' investment performance has been feeble, adversely affecting members' balances. Defined benefit schemes, established more recently, still have a young demographic profile. But their positive cash flows mask growing pension liabilities.

In exploring reform options for mandatory schemes, policymakers should focus on their core function of achieving old-age income security. Making the target replacement rate more explicit will be desirable, but high replacement rates are best avoided. In the face of volatile incomes and limited access to finance, younger workers (especially those with modest incomes) may be better served by having greater flexibility in managing their savings. Those seeking higher replacement rates could complement the mandatory pillar with voluntary savings.

All these objectives could be achieved through a defined contribution (provident) plan, a defined benefit structure, or a combination of the two. Whatever structure is chosen, past mistakes in design need to be corrected. In addition, to facilitate labor mobility and reduce costs through shared institutional arrangements, policymakers should consider opportunities for harmonizing pension schemes for civil servants and private sector workers.

The traditional defined contribution pillars-or national provident funds-face the dual challenge of evolving from long-term savings plans into more genuine retirement income programs while introducing stronger governance and competitive asset management. Progress can probably be only gradual-especially in strengthening governance and introducing competitive asset management-because of the difficult initial conditions. But there are opportunities for at least small steps in the right direction. Measures to decentralize fund management could include some combination of outsourcing asset management, opting out a share of accumulated assets, and permitting greater competition through occupational funds.

For defined benefit plans, now is a propitious time to explore reform options-before liabilities continue to grow and expectations based on unsustainable pension promises become deeply entrenched. Reforms should focus on increasing financial sustainability, eliminating inequities embedded in the benefit formula, and promoting better management of the funds' reserves.

The tradeoffs between having a large mandatory pillar and offering workers greater flexibility in managing their savings argue in many cases for a smaller but more effective mandatory scheme. That option underlines the importance of promoting the development of complementary voluntary schemes, an issue addressed in the following chapter.

Notes

1. In Afghanistan the main pension program traditionally covered both the public and the private sector, but the long period of war and conflict has reduced participation to government employees.
2. Originally established in 1934 as the Army Provident Fund, Nepal's Employees Provident Fund was extended in 1944 to include civil servants in the Kathmandu Valley and in 1948 to include all civil servants. Later, membership was further expanded to all government employees (including the police) and teachers and finally to the private sector in 1991. In addition, Nepal introduced a modest noncontributory pension, the Employees Pension Fund, in 1996, but that was replaced in July 2004 by the Additional Benefits Scheme, whose costs are lower. Under the new scheme beneficiaries receive a lump-sum amount in addition to the account balances accumulated with the provident fund at retirement. The lump sum is calculated as "accumulated balance on retirement x contribution years x 0.0075." There is a benefit limit of about US$4,200, or 15 percent of the provident fund balance. Although the new program appears to lower costs significantly compared with the Employees Pension Fund, there is still a need to project its future costs and identify a sustainable source of financing. Otherwise the program will need to be reconsidered.
3. Sri Lanka's literacy rate is 92 percent, and its life expectancy 74 years (World Bank, World Development Indicators database).
4. India's earnings ceiling (the level above which no contributions need be made) of Rs 6,500 a month appears to be low given average wages in the formal sector, and there are no preestablished procedures for adjusting the ceiling. In addition, many firms in India, including those that are financially ailing, are allowed to pay 10 percent rather than 12 percent.
5. There is a self-assessment scheme for small employers, who contribute voluntarily to the Employees Old Age Benefits Institution. Under this scheme the employer pays PRs 150 (roughly US$2.50) a month, and the employee PRs 20 a month.
6. In 1995 transfers amounted to PRs 645 million (roughly US$20 million), while employers contributed PRs 984 million (roughly US$31 million). Minimal transfers of PRs 100,000 (roughly US$1,735) were made in 2002 and 2003, while no transfers occurred in the previous two years.
7. The new investment regime introduced for Pakistan's Employees Old Age Benefits Institution in 2003 permits total new investments in selected classes of corporate debt and equity and real estate to reach up to 80 percent. The regime prescribes lower ceilings within specific asset classes to foster greater diversification, and within these asset classes permits more flexible limits for securities with higher ratings. It also introduces ceilings on investments in a single security to promote risk diversification.
8. Until the 1970s investments were limited to central government debt. Investments in public financial institutions (also guaranteed by the central government) were allowed only in the early 1990s.
9. The portfolio of Sri Lanka's Employees Trust Fund is also concentrated in public debt. Its initial forays into the stock market and outsourcing of fund management were unsuccessful, and a widespread perception emerged that portfolio investments were politically motivated, leading to a reversal of policies and a shift toward public investments. Moreover, the selection process for investment managers was not transparent, fund managers were not given clear mandates with performance benchmarks, and oversight was poor.
10. Data refer to total assets accumulated in the Employees Provident Fund and Employees Trust Fund.
11. For Singapore's Central Provident Fund, for example, the average real rate of return credited to members in 1983-2002 was close to 2 percent, while the government was investing these long-term resources in largely nongovernment assets at a much higher rate. See Asher (2004).
12. Before 2001 members could withdraw 60 percent of their accumulated balance after five years. Every two years thereafter, members could withdraw another 60 percent of the accumulated balance.
13. Most countries with mature demographic profiles (such as the OECD countries) already have a minimum retirement age of 65. That is the case, for example, in Canada, where life expectancy at 65 is 16.25 years for men and 15.68 for women, and in the United States, where life expectancy at 65 is 19.99 years for men and 19.4 for women.
14. In India exempt occupational schemes include substantial funds for railway workers, coal miners, Assam tea plantations, and seamen. The Coal Mines, Assam Tea Plantations, Jammu and Kashmir, and Seaman's Provident Funds operate under legislation separate from that for other exempt funds. In Sri Lanka the largest exempt fund is a multi-employer fund, the Mercantile Sector Provident, which covers more than 10,300 employees in around 70 organizations.
15. Many of these large failed plans were operated by public sector companies that faced difficulties and cash flow

problems. Some of these companies not only were unable to make contributions to their provident funds but also diverted some of the assets to other uses.

16. Many funds have also extended home loans to members (up to 75 percent of a member's balance).

17. Such a modest pension pillar makes sense only if it includes redistribution, however, since a 25-30 percent replacement rate for lower-income workers in the formal sector would not be enough to keep them above the poverty line.

18. Under the present disability rules of the Employees Old Age Benefits Institution, a member is eligible for a lifetime pension after receiving disability benefits for five consecutive years. To prevent abuse and encourage reentry into the labor force, disability schemes in most countries around the world require periodic medical evaluations unless a participant has been declared permanently disabled by an appropriate medical body. In addition, they set disability benefits as a percentage of the member's wage. Under the rules of the Employees Old Age Benefits Institution, however, benefits are proportional to the number of contributing years. Thus workers disabled at a young age are left with a very small benefit and inadequate income security, while older workers receive a relatively large benefit, discouraging their reentry into the labor force. If poorly designed, disability benefits are often used as a form of unemployment insurance or early retirement. Although disabled pensioners account for only a small share of total pensioners (2.4 percent at the end of 2003), revising these rules will be important to prevent misuse of the disability benefit.

CHAPTER 4

Facilitating the Expansion of Voluntary Retirement Savings Arrangements

Voluntary employer-sponsored schemes were the first retirement savings instruments available to workers outside the civil service in South Asia. These schemes remain important for formal sector workers in countries where there is no national pension plan or where the national plan provides only modest pension benefits. Even in countries with national plans, voluntary occupational schemes often complement mandatory programs. But these voluntary schemes are beset by the same problems afflicting exempt occupational funds: a poor regulatory environment, limited availability of local financial instruments, and no opportunities for diversifying into foreign assets. Personal retirement income plans are offered by some financial institutions, especially insurance companies, but these play a negligible role. In addition, the governments of India and Nepal have sponsored voluntary long-term savings plans for the general public, though coverage has been modest. And an interesting new initiative in India is promoting the expansion of voluntary schemes as part of the pension reform for civil servants. This chapter analyzes the performance of these voluntary retirement savings programs and the role they play.

Beyond these voluntary retirement schemes, many public programs in the region provide income support to the poor during old age. These range from means-tested support, to categorical targeting (such as Nepal's allowance for those above 75), to quasi-contributory programs with a large implicit fiscal subsidy (such as Sri Lanka's programs for farmers, fishermen, and the self-employed).[1] While important, these income support (or quasi-income support) programs merit separate analysis as part of the broader safety net for vulnerable groups.

Voluntary occupational pension schemes: starting to fill a gap

While complete data are not available, voluntary occupational pension schemes in South Asia appear to provide only modest coverage. Nevertheless, these programs have started to fill a gap for formal sector workers in countries where there are no mandatory retirement savings arrangements or where such arrangements offer modest pension benefits. In Bangladesh, for example, pension plans are sponsored by state-owned enterprises, nationalized commercial banks, other financial institutions, large international companies (for example, most subsidiaries of U.K. firms), and some local companies. Among locally listed companies, only three provide retirement plans. Most of the plans are defined contribution, but a few companies have sponsored defined benefit plans. State-owned enterprises are especially likely to offer defined benefit plans, emulating the pension benefits extended to civil servants. (But the recent restructuring and closure of state-owned enterprises revealed that many had failed to make required contributions to plans or had used some of the assets for self-financing.) State banks administer defined contribution and defined benefit plans, and some private companies also sponsor both types of plans but extend the defined benefit program to management only. Contribution rates are standardized at 10 percent of basic salary for both the employer and the employee. Managerial workers often pay another 2.5 percent in unmatched contributions.

TABLE 4.1
Retirement benefit arrangements offered by large firms in Pakistan, 2001

Type of retirement arrangement offered	Share of firms (%)
Provident fund only	12
Gratuity only	6
Defined benefit plan only	6
Provident fund and gratuity	61
Provident fund and defined benefit plan	6
All three plans	8
No plan	1

Source: Morshed 2004

In Pakistan, where the national plan provides such small benefits that it is not a meaningful system,[2] it is mandatory for firms with more than 50 workers to offer a gratuity or provident fund scheme. The law does not stipulate the minimum contribution level for provident funds, however.[3] A survey of large firms by an actuarial firm in 2001 found that most offer both a gratuity and a provident fund (table 4.1).[4] State-owned enterprises (which historically included the major banks) and autonomous bodies such as the Water and Power Development Authority (WAPDA) and Pakistan Railways generally offer both defined benefit and provident plans, often following the pattern of benefits provided by the federal government. These plans are significant in size, with more than 180,000 contributors in the WAPDA plan and 90,000 in the Pakistan Railways plan. Employers face no legal requirement to obtain an actuarial valuation, but a few large ones do.

In other countries with mandatory provident plans, many companies, encouraged by tax incentives, sponsor defined benefit plans or provident funds to complement mandatory benefits. A number of firms in Sri Lanka offer a defined benefit program to their employees, or at least to their management, in addition to the mandatory provident fund. For purposes of tax deductions, employers' contributions are subject to the same cap as provident funds (25 percent of salary). These schemes, extended by private and state banks as well as insurance companies, have accumulated significant assets. The Bank of Ceylon's defined benefit plan, for example, had more than US$140 million in assets in 2003, while its provident fund had about US$60 million.

In Nepal a few large entities provide pension plans, including financial institutions, state-owned or formerly state-owned enterprises (such as Nepal Telecommunication and the Electricity Authority), and Tribuhuvan University. Many of these plans function on the same defined benefit principles as the government's program.

In India more than 5,000 employers offer voluntary pension plans to their employees-around 700,000 in total, including pensioners-in addition to the plans under the Employees Provident Fund Act. These funds are typically provided through the Life Insurance Company of India (LIC), though about 20 percent are self-managed. A similar number of people reportedly have individual pension plans, almost invariably purchased from the LIC.

Investment strategies overly restricted and conservative

Overly rigorous investment restrictions together with limited development of local markets and nonprofessional management have undermined the potential performance of occupational plans. Among the benefits of collective investment schemes is the access they provide to a wider pool of assets than might otherwise be available. Modest contributors to a U.K. or U.S. pension fund, for example, may be able to participate in investment opportunities and returns that would simply be unavailable to an individual or beyond the scope of normal portfolio diversification. But their counterparts in South Asia face a different reality: the region's financial markets are limited, and

heavy government regulation has precluded investing in foreign assets and restricted investments to a small range of products. Government instruments and bank deposits dominate portfolios, while other private securities tend to be almost entirely unrepresented. Thus for individual contributors, participating in a provident fund offers little advantage over managing their own retirement savings. Contributors in Bangladesh and Pakistan face the opposite situation, however: under recently imposed restrictions, high-yield national savings certificates are available to individuals but not to institutional investors, including retirement savings schemes.

In addition to the restrictive investment regulations, lack of professional management of retirement assets also has encouraged many funds to pursue overly conservative portfolios-to the detriment of potential long-term returns. Until institutional investment in national savings certificates was prohibited in Pakistan (in March 2000) and Bangladesh (in June 2002), private provident funds in both countries had invested almost entirely in these instruments, which paid extremely high yields, well above market rates (table 4.2). Since these restrictions went into place, trustees in Bangladesh, reluctant to assume risks or to engage professional asset managers, have allocated most new investments for provident funds to term deposits with banks, though government bills and bonds are also eligible investments.

TABLE 4.2
Yields on defense savings certificates in Pakistan

Date of issue	Annual yield to maturity (%)
Through Nov. 23, 1993	15.60
Nov. 24, 1993-Nov. 11, 1996	16.00
Nov. 12, 1996-May 13, 1999	18.04
May 14, 1999-July 1, 2000	15.97
July 2, 2000 onward	14.01

Source: Morshed 2004

After the prohibition on investments in the national savings scheme went into place in Pakistan, retirement savings plans turned to fixed income instruments of two public sector entities, WAPDA and the National Development Finance Corporation, which enjoyed an explicit or implicit government guarantee. While no detailed data are available, it is understood that in recent years there has been greater interest in investing in corporate debt and equity, prompted especially by the strong performance of the stock market and the liberalization of investment regimes, such as that for the Employees Old Age Benefits Institution.

As noted in chapter 3, Sri Lanka's occupational funds have also tended to pursue conservative portfolios, in part because of the lack of professional managers. India is an exception, with a larger share of plans outsourcing asset management.

While investment guidelines have restricted portfolio diversification too much, they have failed to cover one of the most critical risks in employer-sponsored plans-self-lending. Except for India and Sri Lanka, no countries in South Asia restrict investments in assets of the plan sponsor or related parties other than through the general fiduciary requirements of the trustees acts. To control the potential risk of self-lending, most OECD countries restrict such investments to 5 or 10 percent of total fund assets.

Serious regulatory and supervisory gaps

Historically there has been no effective regulation or supervision of voluntary occupational plans in South Asia (box 4.1). The lack of supervision is at variance with global trends toward more active regulation and supervision in lower-income countries. The primary oversight for voluntary occupational schemes has traditionally come from the government bodies responsible for income tax and for registering trusts. But the registrar of trusts is invariably a passive entity. And while the tax

authorities confirm that deductions are eligible, they have no interest in ensuring that appropriate contributions are made, reasonable returns earned, and assets properly safeguarded. No agency ensures that defined benefit plans meet adequate funding ratios. And India and Sri Lanka are the only countries that legally mandate external actuarial valuations. Pakistan subjects publicly traded companies to higher disclosure requirements than other companies on their occupational plans (in accordance with International Accounting Standard 19), but this is a notable exception to the regional pattern.

BOX 4.1

Outdated regulatory framework for occupational pension schemes: the case of Bangladesh

Bangladesh has a regulatory framework for occupational pension schemes that is typical for South Asia. To begin with, new voluntary occupational plans face inadequate entry requirements. The regulation of pension schemes relies largely on the Trust Act, dating to 1895, and the Income Tax Act, specifying tax exemptions for these plans. A company establishing a retirement savings plan faces minimal requirements other than registering the plan with the National Board of Revenue, the tax authority under the Ministry of Finance. The law stipulates a broad trustee framework, but almost no supporting regulations are in place. It requires a minimum of three trustees to oversee a trust, but suggests no minimum qualifications. It defines trustees' accountability to members only broadly, and its requirements for disclosure leave much to be desired. For example, the law does not require defined benefit plans to obtain external actuarial valuations. Instead, it leaves it to the trustees to ensure full funding.

Although the law sets no requirements for the selection of trustees, they are generally chosen by both employers and employees. The trustees are typically full-time employees of the sponsoring company. Unlike mutual funds, occupational pension schemes are subject to no requirement to appoint an independent custodian. Other than broad fiduciary requirements under the Trust Act, there are no explicit controls or prohibitions on self-lending, and companies often borrow from the plans. With few exceptions, plans are managed in-house, which has discouraged diversification into instruments other than bank deposits or government securities.

State-sponsored voluntary programs: savings plans or retirement programs?

Besides mandatory plans, the governments of Nepal and India have traditionally sponsored voluntary retirement income programs available to the general public. Many resemble medium- to long-term savings plans rather than retirement income plans, and coverage has generally been limited.

The government of Nepal has sponsored voluntary retirement plans though the Citizen Investment Trust (CIT), established in 1990. Membership is limited to the formal sector, so the CIT plans largely duplicate the Employees Provident Fund.[5] The CIT's primary product, the Employees Savings Growth Scheme, was introduced as a mandatory savings program (with a 5 percent contribution rate) for all public and private sector employees (table 4.3). After being successfully contested in court only three months into its operation, however, the scheme was converted into a voluntary program. Workers can contribute 5-10 percent of their monthly salary for five years, after which they can withdraw funds.

TABLE 4.3

Assets and returns of Citizen Investment Trust by fiscal year, 2001/02 - 2003/04

(US$ thousands, except where otherwise specified)

Plan	2001/02	2002/03	2003/04
Employees Savings Growth Scheme	7,711.0	13,169.1	23,051.4
Unit scheme	3,743.0	7,006.6	11,317.6
Gratuity and defined benefit plan	845.3	1,089.1	7,973.0
Investor account	1,081.8	1,736.6	3,445.9
Total	13,381.1	23,001.3	45,787.8
Average weighted return (%)	8.2	7.4	6.4

Source: Citizen Investment Trust

Over the years the CIT has developed new products that lengthen the savings period, with the aim of ultimately moving to a more genuine voluntary retirement savings plan. Since 2001, for example, the CIT has offered a scheme in which participants can withdraw funds at retirement or after reaching age 58. Early withdrawals are permitted only for workers dismissed because of redundancy. Existing participants in other CIT schemes have been allowed to transfer to this plan. The CIT also offers pension and gratuity schemes in which the sponsoring company assumes the risk of meeting the defined liability. More than 50 companies have signed up. The CIT has grown rapidly,

becoming the largest institutional investor in Nepal after the Employees Provident Fund. Rates of return on its portfolio have fallen slightly behind those of the Employees Provident Fund, which has benefited from preferential access to government bonds. In addition, the CIT has invested more conservatively.

The government of India has sponsored several initiatives to widen participation in retirement savings schemes. The Public Provident Fund, introduced in 1968, provides some tax incentives but is closer to a long-term savings program than a retirement plan.[6] The program has used the post office network to expand outreach, but membership remains limited. Despite double-digit growth in membership during the past decade, less than 1 percent of the labor force participates. Many of the program's features qualify it as a long-term savings plan rather than a retirement plan: Accounts are meant to close after 15 years, though repeated 5-year extensions can be obtained. In addition, half the accumulated balance can be withdrawn after 4 years. The scheme is not funded, but its liabilities are reflected in the government's accounts. Historically, members' accounts earned a notional interest similar to that in the Employees Provident Fund, but the two interest rates were delinked in 2000. The Public Provident Fund, with a smaller membership and political representation, has been providing a lower yield-paying 8 percent annually since March 2003, compared with 9.5 percent for the Employees Provident Fund.

Aware of the limitations of the Public Provident Fund as a retirement program, the government plans to expand the new defined contribution scheme for new federal civil servants to the public on a voluntary basis (see chapter 2). The scheme will include two pillars. One will allow flexible early withdrawals in recognition of the credit constraints still faced by many segments of the population, while the other will provide tax deductions but no (or possibly restricted) early withdrawals. While the details are still being developed, the scheme will establish a minimum contribution level to ensure that it is cost-effective. It will use the large branch network of India's postal system to permit wider outreach.

As noted, the objectives and targeted population of these public initiatives differ markedly from those of the public quasi-contributory programs that include a large fiscal subsidy and are aimed at low-income groups-most notably those introduced in Sri Lanka in the 1980s and 1990s (see Eriyagama and Rannan-Eliya 2003 for a discussion of these programs).[7] These quasi-contributory, quasi-income support programs should be compared with other safety net programs for the elderly poor, a subject beyond the scope of this study.

Facilitating the expansion of voluntary retirement income programs

This report recommends against establishing new mandatory pension arrangements in South Asia today, because they are likely to have an unfavorable impact on the development of formal labor markets and to meet with high evasion, as in other low-income countries. But there are important reasons for supporting the development of voluntary retirement savings products. Continued urbanization and globalization will inevitably lead to the dissolution of traditional family structures and other informal arrangements for retirement support, while existing formal arrangements still have very limited coverage. For most households with the capacity to save, lack of suitable plans has limited long-term savings opportunities to land and housing. And in some countries, such as Bangladesh, it has encouraged the issuance of national savings bonds with above-market interest rates, a policy that has been costly for the state and has led to inequitable transfers to higher-income households. Thus fostering the growth of additional voluntary retirement savings plans is important. What kind of voluntary plans are most suitable will depend in part on local conditions.

Employer-sponsored retirement plans could clearly play a greater role, but this would require overhauling the regulatory framework (based in most countries on an outdated trustee framework) and establishing a proper supervisory structure. The government of Pakistan has initiated interesting reforms in this direction, presenting to Parliament a draft law to promote voluntary pension plans under modern regulatory and supervisory practices. Pakistan's Securities and Exchange Commission, which will be responsible for supervising these plans, recently issued initial pension regulations under its existing authorities. Also vital will be promoting the development of new financial products. (For further discussion of these and other regulatory and supervisory issues, see chapter 5.)

Development of industrial or sectoral pension plan arrangements, such as through organizations for the self-employed and small and medium-size businesses in the formal sector, also should be encouraged. These plans have been successful in many countries, including Australia, Denmark, and the Netherlands. An interesting case in South Asia is Sri Lanka's Mercantile Plan, sponsored by several chambers of commerce and representing a large number of small and medium-size enterprises. India has similar plans. Where no such arrangements exist, group plans will be broadly limited to employees of large enterprises, because small and medium-size enterprises in the formal sector will find it too costly to set up their own plans. Such occupational or group plans could also serve the self-employed, whose choice would otherwise be limited to retail or personal plans, shown by international experience to be far more costly. Consider the case of Australia, where the administrative costs of individual plans reduce yields by 0.96-1.81 percentage points, compared with only 0.37-0.77 percentage points for industry or group plans (table 4.4).

TABLE 4.4

Burden of administrative charges in group and individual pension plans in Australia, 1999

	Industry funds	Individual plans
Annual flat-rate charge (A$)	48	42-71
Charge on contributions (%)	-	Up to 4.5
Charge on assets (%)		
Administration	0.3-0.7	Up to 0.95
Asset management	-[a]	0.4-1.1
Reduction in yield (percentage point)	0.37-0.77	0.96-1.81

Note: Estimates assume a 9 percent contribution rate, a real return of 5 percent a year, and earnings growth of 1 percent a year.

\- Not available.

a. Industry funds are not required to disclose asset management fees (usually paid to a subcontractor), but anecdotal evidence suggests that 0.4-0.5 percent is typical.

Source: Bateman, Kingston, and Piggott 2001.

A well-functioning national platform of mandatory defined contribution arrangements for private sector workers or civil servants could also be used to support voluntary pension plans. A unique case in South Asia is India's civil service reform, which will extend the platform of institutional arrangements for new civil servants of the central government to the rest of the population on a voluntary basis. Such voluntary plans may not attract a large share of the labor force in the short run, but membership is likely to grow over time as the share of agricultural labor declines, the formal sector expands, and the average education level in the working-age population rises. In Sri Lanka the platform of mandatory pension arrangements for private sector employees could potentially be extended to the self-employed on a voluntary basis, though this step would need to be preceded by deep administrative, governance, and fund management reforms. And across South Asia tax policies for pension plans need to be revised to address inconsistencies and distortions.

Rationalizing the tax treatment of voluntary retirement income schemes

Most countries in South Asia have introduced some elements of the OECD countries' tax practices relating to retirement schemes, but many inconsistencies and inequities have emerged in the process. Contributions to pension schemes in South Asia are generally an exempt and deductible expense for

employers and employees up to certain limits (table 4.5). In India this could add up to as much as 39 percent of salary, since exemptions are granted on mandatory contributions (24 percent of salary) as well as on voluntary contributions to employer-sponsored retirement savings plans (up to 15 percent). Income earned on accumulated funds is tax exempt except in Sri Lanka, and lump sums paid upon retirement are generally tax exempt except in Nepal and Sri Lanka. Taxes apply to early withdrawals and benefit distributions only above quite high thresholds (Nrs 500,000 in Nepal and SL Rs 3,500,000 in Sri Lanka) and thus for all practical purposes affect a relatively small number of participants. Such tax policies reinforce incentives for early withdrawal, since individuals accumulating high balances are penalized with a tax.

The tax treatment of retirement savings schemes is often inconsistent, raising equity issues and potentially influencing contributors' choices. In India, for example, employers' contributions to mandatory plans are eligible for a tax rebate and are treated as tax-free income for employees. Interest earned and the accumulated balance paid by provident funds at retirement is also tax exempt. By contrast, monthly payments under occupational pension programs are taxed as regular income. Basically, the first regime exempts contributions, fund income, and retirement payments from tax (commonly referred as EEE, or triple exemption), while the second exempts contributions and fund income but taxes pension payments (commonly referred as EET). The first regime raises some public finance and equity questions, since all income should be taxed at least once. In addition, the inconsistencies between the two tax regimes could encourage workers to select lump-sum withdrawal programs even though pensions could be preferable under a more neutral fiscal treatment because of the protection they provide against longevity risk.

Moreover, the tax provisions for pension schemes are often inadequately coordinated with the overall tax system. In Sri Lanka, for example, retirement savings schemes are all subject to tax on their investments, either directly or through a withholding tax, at the rate of 10 percent. Contributors to mandatory and voluntary retirement savings schemes therefore indirectly pay an income tax that they would avoid if they made similar investments in their own name.

TABLE 4.5
Basic features of tax system for voluntary retirement income schemes in selected South Asian countries

	Nepal	Pakistan	Sri Lanka
Basic tax rates for individual income	Up to Nrs 85,000 exempt Nrs 85,000-155,000 at 15% Above Nrs 155,000 at 25%	Up to PRs 100,000 exempt PRs 100,000-150,000 at 7.5% PRs 150,000-300,000 at 12.5% PRs 300,000-400,000 at 20% PRs 400,000-700,000 at 25% Above PRs 700,000 at 35%	Up to SL Rs 300,000 exempt SL Rs 300,000-540,000 at 10% SL Rs 540,000-780,000 at 20% Above SL Rs 780,000 at 30%
Tax deductibility of contributions	Contributions to approved retirement fund up to Nrs 300,000 or a third of assessable income	Contributions to provident funds or defined benefit plans up to 10% of taxable income, subject to a ceiling of PRs 200,000	Contributions to provident funds or defined benefit plans up to 12% of salary, subject to a ceiling of SL Rs 75,000 or 10% of statutory income, whichever is lower
Tax on lump-sum disbursements at retirement	"Gain" from lump-sum payment by an approved retirement fund taxed at 6% as final withholding tax (gain calculated by deducting higher of 50% of payment or Nrs 500,000 from the total lump-sum payment)	All provident fund payments exempt. Gratuity or pension commutation paid under an approved scheme exempt up to PRs 200,000. Under any other scheme, 50% exempt up to PRs 75,000	First SL Rs 3,500,000 exempt Next SL Rs 500,000 at 5% Next SL Rs 500,000 at 10% Balance at 15%
Tax on pensions and other old-age income	Any individual or couple with pension income can have 25% of the normal exemption limit as an additional basic exemption	Up to PRs 300,000 a year exempt; government pensions exempt	Government pensions exempt; other income taxable
Tax on investments	Income from an approved retirement fund exempt	Provident fund income exempt	Provident fund income taxed at 10%

Low individual tax rates relative to corporate rates also affect incentives relating to retirement saving. In Sri Lanka, for example, the first SL Rs 300,000 of income is tax exempt, with taxation rising to 30 percent only above SL Rs 780,000 a year. Corporate tax rates are often higher (in Sri Lanka, 30 percent for listed companies, 40 percent for unlisted companies, and 50 percent for banks), creating substantial incentives for owners and managers to shelter income through retirement savings schemes.

All this points to a need to eliminate inequities and rationalize the tax treatment of retirement savings products. Inconsistencies in tax exemptions have produced an environment in which individual preferences for certain products are often driven by tax considerations, leading to losses in public revenues as well as personal utility. The double taxation of fund income and pensions (ETT) in some retirement schemes, such as in Sri Lanka, needs to be addressed-either by taxing contributions while exempting investment income and benefits (TEE) or by exempting contributions and investment income while taxing benefits (EET). The EET method is used more frequently, especially in OECD countries, to encourage retirement saving. Among 35 OECD and non-OECD countries reviewed, Whitehouse (1999) found that 23 followed an EET pattern with some minor deviations.

But unlike in OECD countries, in South Asia the EET regime is likely to have only a modest impact on the coverage and growth of retirement income schemes because of the low tax coverage ratios. Moreover, since the EET system may not be fiscally neutral to the extent that a pensioner may pay income tax at a lower marginal rate than when working, policymakers will need to examine the tradeoffs between net fiscal revenue losses under an EET regime and the potentially higher growth in retirement savings. The EET regime may still be justifiable from a policy perspective if the expansion in coverage of retirement income systems reduced old-age poverty and thus lessened the need for fiscal support through the safety net for the elderly poor.

Summary and recommendations

Fostering the development of more efficient voluntary pension schemes is important to give households with the capacity to save access to a wider range of retirement savings instruments-beyond housing, land, and other traditional assets. Institutional arrangements to support such plans could vary across countries in South Asia. Occupational schemes with a long tradition in the region could play a greater role under a strengthened regulatory and supervisory framework, though their expansion is likely to be gradual, paced by broader developments in the formal labor market and beyond. Other institutional arrangements also could be explored, such as India's planned expansion of defined contribution arrangements for civil servants to the rest of the population on a voluntary basis. Also important is to revise tax policies for pension plans to avoid inequities and distortions. These include double taxation in some countries and no taxation in others. Deciding on the preferred tax regime for voluntary retirement income schemes will require balancing the tradeoffs of different approaches.

Notes

1. See Eriyagama and Rannan-Eliya (2003) for a discussion of the Sri Lankan programs.
2. The maximum monthly benefit is PRs 3,000, or about US$50.
3. The 1968 Commercial Act requires employers with more than 50 workers to offer a provident fund or gratuity scheme to their employees. The minimum gratuity payable is 30 days of salary for each year of service. For provident funds no minimum is defined, though contributions by employers cannot exceed those by employees.
4. Survey of retirement benefit plans carried out by Sidat Hyder Morshed Associates in 2001.
5. The CIT is listed on and partly owned by the Nepal stock exchange but is majority owned by the government, through direct and indirect holdings.
6. Employees and employers can contribute up to 15 percent of salary and receive some tax advantage.
7. In the Sri Lankan Farmers' Program, for example, preliminary estimates indicate that a farmer joining at age 54 would benefit from an implicit interest rate exceeding 40 percent.

CHAPTER 5

Building Stronger Foundations for Retirement Savings Schemes

The foundations for sound development of funded pension schemes in South Asia have been weak. As earlier chapters highlighted, until recently the region has had no effective regulation or supervision of pension schemes-whether mandatory or voluntary, public or private-other than regulations relating to investment products. Only exempt occupational schemes in India and Sri Lanka have been subject to some oversight. South Asia's experience differs from international practice, which suggests that the state bears greater responsibility for safeguarding the interests of workers saving for their old age, especially when pension contributions are compulsory. Moreover, tight investment regulations have adversely affected the returns of pension funds, precluded the development of positive synergies between pension funds and local capital markets, and prevented the diversification into foreign assets that was desirable given nascent domestic markets. But signs of reform are emerging in the region as some countries, particularly India and Pakistan, take the first steps toward developing a more market-based regulatory and supervisory approach for pension funds.

Building an environment more conducive to the sound development of funded plans is becoming increasingly important as several countries in the region consider shifting from noncontributory pension plans to funded plans for civil servants and as assets accumulated under mandatory schemes for private sector workers continue to expand. And there is a growing need to ensure that households with the capacity to save for old age have access to a wider pool of retirement savings products. This chapter provides guidance for South Asian countries in establishing a more suitable and comprehensive regulatory and supervisory framework for pension funds, supporting greater diversification of pension portfolios, and promoting synergies between pension plans and capital markets. It also explores new challenges posed by the expansion of defined contribution plans and the accompanying need to create new market instruments for the retirement phase.

Introducing a modern regulatory and supervisory framework

After years of neglect, the regulatory and supervisory approach to pension funds in the region is showing its first signs of change. Underlying the regulation and supervision of pension funds is a basic philosophy holding that these funds are subject to market, credit, and operational risk-and that they are better treated as contractual investments representing a significant share of the accumulated wealth of participants rather than as simply one more part of the multifaceted relationship between employer and employee. Participants in pension funds will depend on these investments for income security during retirement. And they tend to have lower financial literacy than other investors.

In India the need to address regulatory gaps has become more pressing as the central and some state governments move toward shifting new civil servants to funded plans. In Pakistan the government is trying to address regulatory and supervisory gaps as part of a broader effort to foster the development of voluntary retirement savings plans, recognizing that effective regulation and

supervision are necessary to promote public confidence. As first steps the Pakistani government has issued a few preliminary regulations for pension funds under existing authorities of the Securities and Exchange Commission and has presented to Parliament a comprehensive draft law aimed at broadening the agency's regulatory and supervisory powers over voluntary pension plans, both occupational and retail. The draft law does not, however, cover the Employees Old Age Benefits Institution.

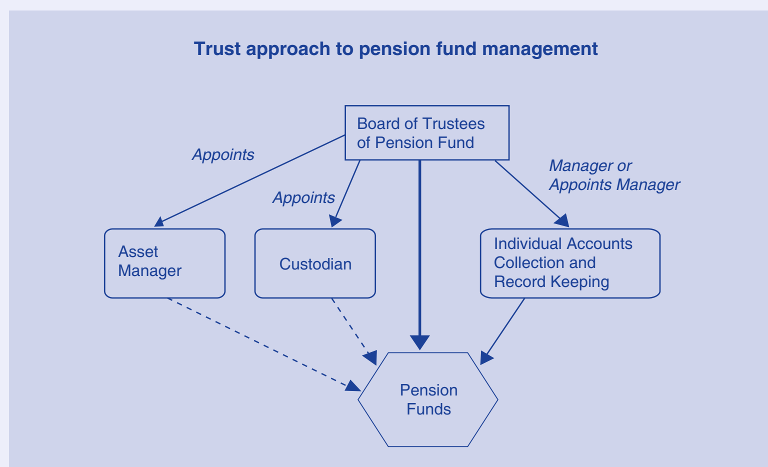
But all countries in the region face a need to review their pension regulation and determine what institution will oversee different aspects of pension regulation and supervision. A set of questions has been developed to help countries assess their regulatory and supervisory framework and, for those implementing reforms, to evaluate whether those reforms are moving toward best practices (box 5.1). Among these issues three are particularly critical: the need for more flexibility in investment regulations, the institutional structure of the regulatory and supervisory authority, and the need to supervise public funds.

BOX 5.1

Key regulatory and supervisory issues for pension funds

- What will be the minimum entry requirements and legal structure for pension fund managers? Are there strict governance rules that clearly define the responsibilities and accountability of those involved in managing pension funds? International practice ranges from establishing pension fund managers as specialized joint-stock companies differentiated from the sponsor (Latin America) to using a trust approach (Australia, United Kingdom, United States).

  The practice in South Asia should be adapted to local conditions. Some countries could perhaps rely on the existing trust approach while requiring higher fiduciary standards and "fit and proper" criteria for trustees of pension funds. Policymakers would need to consider, for example, whether the board of trustees should be a professional board, especially for mandatory plans. In contrast with existing practices, it is recommended that trustees be required to select professional asset managers satisfying minimum criteria. A standard of conduct should be prepared for those responsible for managing the funds.



- Are assets held and accounted for by an independent custodian? Independent custody is already required for unit trusts in many South Asian countries but not for pension funds. This requirement should be extended to pension funds, and minimum eligibility criteria developed for pension fund custodians. And consistent with emerging best practice in pension fund regulation, custodians should be made accountable for monitoring fund managers' compliance with investment guidelines.
- Are there clear and uniform requirements for disclosing the financial status and performance of investment funds? What asset valuation approach will be required? The regulatory framework should grant the supervisory agency the authority to prescribe what information investment funds will periodically report to members and to the agency, as is done for other collective investment vehicles in South Asia. Standardizing the presentation of information by funds is essential to enable the regulator and the public to compare their performance. Asset valuation should follow a marked-to-market approach to the extent possible, but the supervisory agency may need to devise market proxies because of insufficient liquidity in many local markets.
- Are independent third parties required to verify the accuracy of financial data? Are defined benefit plans subject to independent actuarial valuations? Independent valuation of funded plans is already required in the region, at least for privately managed schemes. In addition, supervisory authorities should have the power to define minimum guidelines for external audits and to approve the selection of auditors. Similar provisions should apply for actuarial valuations of defined benefit schemes. In addition, actuaries should be obliged to report any concerns to the supervisor.
- What fees and expenses will be permissible?

(continued)

BOX 5.1
Key regulatory and supervisory issues for pension funds (continued)

- Are there rules governing the marketing of pension funds to potential members, to ensure that the marketing is transparent and aboveboard? Are potential vendors subject to licensing and minimum qualifications?
- Are the rights of members adequately defined? Will they be able to obtain account information on request? Does the legislation enable members to seek redress of any grievances in the courts?
- Will the supervisory agency have a governance structure that fosters sound, independent technical judgment? Will it have sufficient financing to retain well-qualified staff?
- Is the supervisory agency's scope of authority clearly defined? Will the agency have sufficient authority to request information and conduct investigations of pension funds and those involved in their management? Does the legislative framework give the agency strong authority to enforce compliance? Will the agency be able to exchange relevant information with other supervisory bodies to ensure adequate supervision of all those involved in managing funds?
- Will the supervisory agency play an active role in educating consumers?
- Are publicly sponsored pension funds subject to the same regulatory and supervisory criteria as privately managed funds?

Moving toward more flexible investment regulations

As earlier chapters pointed out, more flexible investment regimes are needed to allow both publicly sponsored and privately managed pension funds to strengthen their portfolios by diversifying away from their concentration in state debt (including, for public funds, nontradable securities). Like South Asian countries, other emerging market economies have instituted quantitative limits on particular types of investments, but they have generally allowed pension fund managers greater discretion in allocating assets, resulting in more diversified and efficient portfolios (see table 3.4 in chapter 3). South Asia's investment regulations have penalized pension fund members. Greater diversification into private securities is a big need. Private securities are in fairly limited supply in South Asia, but represented even less in pension portfolios. Ironically, U.S. retirement plans can invest in dynamic, fast-growing Indian companies, but Indian pension funds cannot. The prohibition on investments in foreign securities, with limited exceptions such as in Bhutan, further undermines portfolio strength.

Given the common law tradition in South Asia, most countries could combine a "prudent investor plus" approach, establishing prudential standards of diligence, with some quantitative limits. The quantitative limits should be less restrictive than currently, permitting greater allocations into private securities, including a modest allocation into equities that could be allowed to expand as markets develop. While subject to greater short-term volatility, equity could provide higher returns over the long term.

A gradual lifting of restrictions on foreign investments is also desirable. In India, for example, a pension fund seems unlikely to be able to achieve an optimal portfolio by investing solely in domestic assets-since India's stock market accounts for only around 0.5 percent of world market capitalization (compared with 47 percent for U.S. stock markets) and equity accounts for only one asset class. The case for international diversification is even stronger for smaller countries with more limited and concentrated capital markets and those with weaker banking systems. Recognizing the limits of the domestic market, the government of Bhutan is allowing the National Pension and Provident Fund to invest a substantial share of its portfolio overseas. Indeed, at the end of 2002 foreign assets accounted for more than 40 percent of the portfolio. Recently Pakistan has also started to consider changes that will permit some investment in foreign securities.

Moving toward more efficient portfolios will require other critical changes. One is a commitment to further development of the financial sector to allow pension funds access to a wider range of financial instruments (see the section in this chapter on improving financial market conditions). Another is for pension funds, including occupational plans, to involve professional asset

managers. Outsourcing to licensed fund managers should be seriously considered. For publicly managed funds, gradual changes in the governance structure and a progressive move toward decentralized fund management will be essential, as discussed in chapter 3.

Deciding on the institutional structure for pension regulation and supervision

In determining the institutional structure for pension supervision, South Asian policymakers will face a range of options, from a fully integrated structure overseeing the entire financial sector to a specialized agency supervising only pension funds. International practice varies markedly (table 5.1). The primary argument for an integrated agency is that it helps ensure a consistent regulatory approach across comparable financial products. Consolidating regulation can also facilitate supervision, since the pension system is likely to involve not only pension funds but also other regulated financial intermediaries. Another argument, particularly important in South Asia, is that an integrated approach makes more efficient use of scarce regulatory resources and thus lowers costs. But many Latin American countries have favored specialized agencies, concerned that under an integrated approach the specialized pension companies they created to manage mandatory pension funds would not receive adequate attention.

The few countries in South Asia that have taken steps toward improving their supervisory framework for pension funds are considering different institutional approaches, depending on local conditions. Pakistan has chosen a partially integrated approach, grouping pension funds with insurance companies, securities markets, and nonbank financial institutions under the Securities and Exchange Commission. (That agency will be responsible for supervising voluntary pension funds but not the Employees Old Age Benefits Institution.) The aim is to facilitate coordination of supervision across different financial agents and avoid the emergence of too many (weak) supervisory entities. By contrast, India seems to have opted for establishing an independent body, the Pension Fund Regulatory and Development Authority.[1] Initially the agency will supervise the defined contribution arrangements for new civil servants, but it will not have regulatory or supervisory authority over publicly managed pension plans. The choice of a specialized agency is based in part on the premise that the extension of the new civil service scheme to the rest of the population on a voluntary basis will greatly increase the role of retirement savings schemes, creating a need for a dedicated agency.

TABLE 5.1
Institutional approaches to pension supervision in selected countries

Integrated agencies for banks, securities markets, insurance companies, and pension funds		Partially integrated agencies for insurance and pension funds		Specialized agencies for pension funds	
Australia	Germany	Belgium	Poland	Argentina	Mexico
Austria	Hungary	Czech Republic	Portugal	Brazil	Romania
Bulgaria[a]	Iceland	Finland	Spain	Chile	Slovak Republic
Canada	Korea, Rep. of	Lithuania[b]	Turkey	El Salvador	Sweden
Colombia[c]	Latvia	Luxembourg		Ireland	Switzerland
Denmark	Norway	Netherlands		Italy	United Kingdom
Estonia		New Zealand		Japan	United States

a. Excludes banks
b. Pension funds are supervised by the Insurance Commission or Securities Commission, depending on their sponsor
c. Excludes capital markets
Source: OECD 2004; World Bank staff

In Sri Lanka several governments have given much consideration to the development of a supervisory framework for private pension funds since 1996, when the issuance of new licenses for exempt occupational pension schemes was prohibited. More recently the government seems inclined to avoid establishing a new supervisory entity and is instead considering forming a specialized unit within the Ministry of Labor. Exploring alternative approaches would be desirable, however, since such a unit might have difficulty attracting well-qualified staff and adequate funding. One option worth considering is to integrate the supervision of pension funds with that of other collective investment vehicles under the Securities and Exchange Commission while reinforcing that agency's governance structure. The Ministry of Labor could oversee the collection of mandatory contributions for private pension funds, however, as it is already doing for the Employees Provident Fund and Employees Trust Fund.

Other countries in the region also need to take steps to modernize the regulation and supervision of pension plans. In doing so, they should ensure that the institution selected is independent, appropriately staffed and financed, and endowed with the necessary enforcement capacity (see box 5.1). While different institutional arrangements are feasible, an integrated or partially integrated approach may be best for most countries because of the scarcity of regulatory resources, particularly skilled staff. In some countries another compelling argument for such an approach is that funded schemes will play a comparatively modest role in the medium term. Pension fund supervision in Bangladesh and Nepal, for example, could be integrated into their existing Securities and Exchange Commission. In most countries this approach would also require reinforcing the staffing, authority, and financing of this agency.

Extending supervision to public pension funds

Recent initiatives to reform pension regulation and supervision in India and Pakistan have focused primarily on privately managed plans, neglecting the large publicly sponsored plans. Yet the basic philosophy underlying supervision of pension plans applies equally to public and private funds. Supervising publicly managed pension funds poses a special challenge for Bhutan, India, Nepal, Pakistan, and Sri Lanka-but a surmountable one. Most of these countries have already made much progress in bringing other public financial institutions (banks, insurance companies, development finance institutions) under the same supervisory net as their private counterparts. Developing a new regulatory and supervisory framework for the pension system provides an opportunity to extend market-based regulation to public pension funds. These institutions will probably need a transition period to adapt to higher regulatory standards, however. The first steps in regulatory and supervisory reform could focus on promoting greater disclosure and transparency.

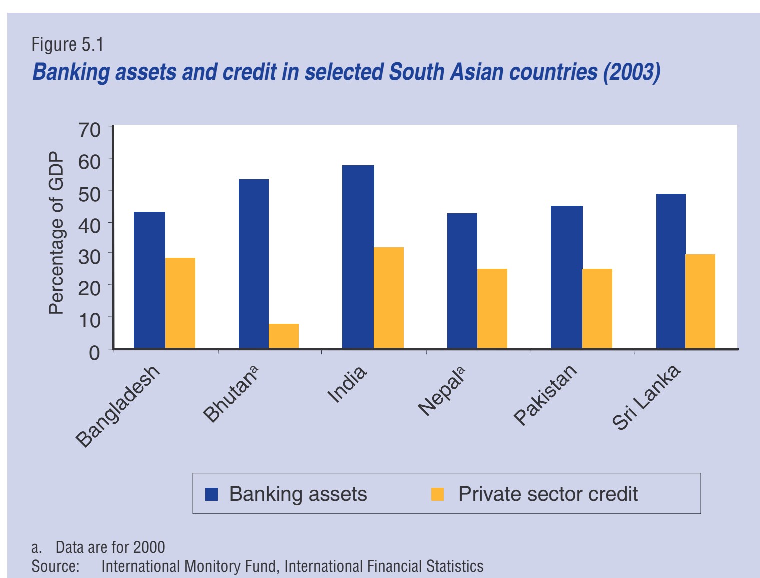
Other developing countries have already taken bold steps to extend supervision to public pension funds. In Costa Rica the pension supervisory agency enjoys strong independence and financing, which has helped create a robust institution isolated from political influence and with sufficient legal and moral authority to oversee the public pension fund (Caja Costarricense del Seguro Social). In Kenya the Retirement Benefits Act of 1997 established a new supervisory agency, the Retirement Benefits Authority, to oversee both public and private pension funds. The new agency is taking steps to bring the National Social Security Fund into compliance with the act.

Improving financial market conditions for funded pension schemes

A commitment to fostering robust pension schemes in South Asia implies a parallel commitment to furthering the development of the financial sector-to enable funds to invest in a wider range of safe

financial instruments. While the region's financial sector has advanced during the past decade, significant challenges remain. Banks continue to dominate the financial landscape, and there is a need to improve their performance (figure 5.1 and table 5.2). And most capital markets are in their infancy.

Figure 5.1
Banking assets and credit in selected South Asian countries (2003)



a. Data are for 2000
Source: International Monitory Fund, International Financial Statistics

Building a sounder banking system is important for pension reform in South Asia. The banking system will need to provide solid custodial services, requiring substantial financial resources, sophisticated computer systems, and efficient record keeping. Custodial services in South Asia are barely developed outside of India, which has a few sophisticated custodial service providers, including well-known international firms. Banks also can play an important role as providers of new long-term financial instruments for retirement savings plans, especially given the nascent stage of local capital markets. Indeed, many emerging market economies have seen positive synergies develop between banks and pension funds, leading to growth in housing credit and lengthened credit maturities for small and medium-size enterprises.

Despite encouraging banking reforms in several South Asian countries, core indicators on banking solvency, efficiency, and asset quality remain below international standards (see annex 7). In addition, prudential norms on capital adequacy and asset classification are more lenient than international best practices, which call for more cautious interpretation of solvency and asset quality

TABLE 5.2
Banking system indicators for selected South Asian countries and comparators, 2003 (percent)

Country	Regulatory capital to risk-weighted assets	Nonperforming loans to total loans	Provision to nonperforming loans	Return on assets	Return on equity
South Asia					
Bangladesh	8.40	22.37	18.35	1.62	33.46
India	12.6	8.8	-	1.0	13.1
Nepal	-10.55	26.61	88.59	-0.005	-0.14
Pakistan	11.1	13.7	64.06	1.2	20.5
Sri Lanka	9.94	13.04	54.38	1.31	20.35
Other					
Japan	10.4	7.2	34.9	-0.6	-19.4
Korea, Rep. of	10.5	2.6	109.4[a]	0.1	2.7
Singapore	17.9	3.2	107.8	0.9	8.3
United States	12.8	1.2	145.8	1.4	15.3

- Not available
a. Data are for 2002
Source: World Bank 2005e

ratios.[2] State banks continue to dominate the system in many countries, including Bangladesh, Bhutan, India, and Sri Lanka, despite a decline in their market share during the past decade. Their performance lags that of their private counterparts.

Thus efforts to strengthen banking regulation and supervision need to continue, with prudential norms brought into line with international best practices. Healthy competition should be further encouraged by facilitating greater private sector participation. In Pakistan the government has taken bold steps in this direction by embarking on an ambitious divestiture of state ownership of nationalized commercial banks.[3]

By comparison with the banking system, the insurance sector in South Asia, especially the life insurance sector, is very small. This presents a challenge for the provision of disability insurance and even more for the development of annuities products (see the section in this chapter on developing annuities markets).

Capital markets in South Asia are generally narrow and shallow. India's equity market is the only one showing much breadth, with more than 5,600 companies listed. Indeed, India's market has probably become one of the most vibrant in the developing world (Shah and Thomas 2003).[4] Equity market capitalization reached nearly 50 percent of GDP in 2004, up from 16.6 percent in 1991, and turnover ratios have exceeded 100 percent in recent years, up from 57 percent in 1991 (table 5.3). The market has benefited from India's growing economy and from significant regulatory, supervisory, and institutional reforms since 1992.[5] Trading in financial derivatives began in 2000 following amendments to the securities law (Thomas and Shah 2003).[6] And the structure of the equity market is changing. A growing number of institutional investors are participating, including foreign institutional investors and mutual funds. Pension funds could play a bigger role in the market as the pension system is reformed. By contrast, India's corporate bond market remains small, having reached only 0.3 percent of GDP by the end of 2003 (table 5.4).

TABLE 5.3

Equity market indicators for selected South Asian countries, 2004

Country	Equity market capitalization		
	Total (US$ billions)	As % of GDP	Turnover ratio (value of shares traded as % of capitalization)
Bangladesh	4.4	8.0	15.6
India	306.0	49.0	117.4
Nepal	0.6	8.8	5.2
Pakistan	25.3	26.1	52
Sri Lanka	2.7	14.9	28.1

Note: Market capitalization data for Bangladesh are for June 30, 2004; India, March 31, 2004; Nepal, July 15, 2004; Pakistan, September 30, 2004; and Sri Lanka, December 31, 2004.

Source: Securities and Exchange Commissions of Bangladesh, Pakistan, and Sri Lanka; Securities and Exchange Board of India; Securities Board of Nepal; World Bank staff estimates.

In Pakistan's equity market, the region's second largest, the trading volume has soared in the past few years, but much of that increase reflects the market's speculative nature. In the rest of the region markets are minimal or even nonexistent, as in Afghanistan. Throughout the region weak corporate governance practices pose a risk to investors, slowing market growth (see World Bank 2004c). In Sri Lanka, where capital markets too are small relative to GDP, the Employees Provident Fund has been discouraged from acquiring private securities by its governance structure and by investment restrictions-despite the large volume of assets it has accumulated. But its dominance relative to other investors probably would have caused serious market distortions and prevented price discovery, as has occurred in the public debt market. This is another important reason that national provident funds need to move gradually toward more decentralized fund management (see chapter 3).

TABLE 5.4
Bond market indicators for India and selected comparators, 2003

	Total bond market		Corporate bond market	
Country	**US$ billions**	**As % of GDP**	**US$ billions**	**As % of GDP**
Brazil	299.9	59.0	2.7	0.5
India	196.8	32.7	1.9	0.3
Korea, Rep. of	445.5	73.7	167.6	27.7
Malaysia	98.7	95.2	44.9	43.3
Singapore	58.3	63.1	5.3	5.7

Source: Bank for International Settlements; Securities and Exchange Board of India.

The long-term success of funded pension schemes will require greater expansion of capital markets. Policymakers can undertake important initiatives to develop an environment more conducive to market growth. These include further development of public debt markets (especially in Bangladesh, Bhutan, Nepal, and the Maldives) that will create a yield curb for other private issues. Also crucial is strengthening the regulation and supervision of securities markets, to promote greater efficiency and transparency and improve investor protection. Having learned from early mistakes, India has adopted far-reaching reforms to reinforce the authorities and capacity of the Securities and Exchange Board of India and upgrade regulations for securities markets. Pakistan has made great strides since establishing its Securities and Exchange Commission in 1999, but needs to reinforce the agency's supervisory capacity and further enhance market regulations. Sri Lanka's Securities and Exchange Commission confronts similar challenges. In other countries in the region regulations are far weaker, and the supervisory authority-if there is one-has very limited capacity. In Bangladesh lack of market transparency has become an acute problem.

A more robust market infrastructure will also be necessary, with brokerage services, experienced fund managers, and efficient and reliable clearing and settlement systems. In India, Pakistan, and Sri Lanka clearing and settlement systems are relatively efficient given their stage of development, though they could be further upgraded (table 5.5). Elsewhere substantial improvements are needed. Despite limited issues, rating agencies have a relatively large presence in the region, including in small markets such as Bangladesh.

TABLE 5.5
Development status of capital markets in selected South Asian countries

Country	Public debt market	Corporate debt market	Equity market	Custodial services	Brokerage services	Clearing and settlements
Bangladesh	Low	Low	Low	Low	Low	Low
India	Medium	Low/medium	Medium/high	Medium	Medium	Medium/high
Maldives	Low	Low	Low	Low	Low	Low
Nepal	Low	Low	Low	Low	Low	Low
Pakistan	Low/medium	Low	Low/medium	Low/medium	Low/medium	Low/medium
Sri Lanka	Low/medium	Low	Low/medium	Low/medium	Low/medium	Low/medium

Source: World Bank staff estimates

Coordinated pension and financial sector reforms could bring gains to both sectors, with international evidence pointing to positive synergies between pension funds and capital market development (box 5.2). But the varying stages of financial sector development across South Asia suggest a need for different pension reform strategies. In countries with less developed capital markets or weaker banking systems (such as Afghanistan, Bangladesh, Nepal, and the Maldives), the environment will be less conducive to a successful shift from noncontributory pension schemes to a

funded pillar for civil servants. These countries could instead rely heavily-or even fully-on international fund managers and offshore investments.

To succeed, all these reforms will demand a stable macroeconomic environment. Several countries in the region continue to face fiscal vulnerabilities despite progress in recent years (see table 1.2 in chapter 1). Large fiscal deficits will crowd out private sector issues and could compromise the health of the banking system.

BOX 5.2

International evidence on positive synergies between pension funds and capital market development

A growing literature asserts that pension reforms that involve funding can benefit the economy through their positive effects on financial market development. In a study of 14 OECD and 4 non-OECD countries, Catalan, Impavido, and Musalem (2001) show a positive relationship between contractual savings and capital market development, with the first primarily promoting the second. These results did not hold for Malaysia and Singapore, however, where public pension funds manage most contractual savings. Reviewing the financial impact of pension reform in Latin America, Yermo (2002) finds that pension fund investments have contributed to the growth of corporate debt and equity markets in the region. In Bolivia, Colombia, and Mexico pension funds are important investors in corporate bonds. In many Latin American countries they have also aided the banking system, helping reduce term transformation risk and lengthening the maturity structure of bank loans (Impavido, Musalem, and Tressel 2001). In Chile pension funds have played a vital part in the growth of the mortgage market by investing in real estate and mortgage bonds. Indeed, pension funds own more than half the mortgage bond market.

The challenge of developing annuities markets

As defined contribution plans play a growing role in South Asia, through the expansion in coverage of national provident funds or the switch from pay-as-you-go to defined contribution schemes for civil servants, developing the institutional capacity to convert lump sums into retirement income streams-or annuities-becomes an increasingly important policy issue. Today in South Asia, members of national provident funds are unprotected from longevity risk. They sometimes choose to consume their lump-sum retirement payment or invest it in their children, raising uncertainties about their income stream during old age.

For young defined contribution systems,[7] it could be argued that developing annuities is a secondary consideration, since few people will be retiring in the foreseeable future. But annuities markets have not formed naturally or easily in most countries, for a number of reasons, underscoring the need to plan well ahead. Pricing and funding annuities products are complex: contracts may span 35 years or more and require reliable mortality data, robust institutional and regulatory frameworks, and developed capital markets (Rocha and others forthcoming; Valdes-Prieto 1998). On the demand side, some workers approaching retirement may be reluctant to turn their savings into a fixed income stream because they are in poor health and thus see little or no value in such contracts, because they would like to leave a bequest upon death, or because they prefer greater flexibility in managing their retirement savings.

The Chilean annuities market stands out for several reasons. It developed rapidly, over a period of about 20 years. The demand for annuities is relatively high, though their purchase is not mandatory.[8] Annuitants have received good value for their money, with money's worth ratios around 1.04-1.08 on indexed annuities in recent years (Rocha and others forthcoming). These ratios are high by international standards; in many other countries the range for money's worth ratios is 0.9-1 for nominal annuities and 0.8-0.95 for indexed annuities. Rocha and others (forthcoming) suggest that an adjustment in the Chilean ratios is likely in the short to medium term but that they are likely to remain favorable by international standards. Chile's annuities market also has benefited from a competitive insurance market and from access to a large, diverse pool of price-indexed financial assets (including public, mortgage, corporate, and infrastructure bonds) that has permitted insurance companies to hedge inflation risk.

TABLE 5.6
Key insurance market indicators for selected Asian countries, 2003

	Insurance density (premiums per capita, in US$)		Insurance penetration (premiums as % of GDP)	
Country	Total	Life insurance	Total	Life insurance
South Asia				
Bangladesh	2.1	1.4	0.6	0.4
India	16.4	12.9	2.9	2.3
Pakistan	2.9	1.1	0.6	0.2
Sri Lanka	12.5	5.3	1.3	0.6
Other Asia				
China	36.2	25.1	3.3	2.3
Indonesia	14.5	6.4	1.5	0.7
Japan	3,771	3,003	10.8	8.6
Korea, Rep. of	1,243	874	9.6	6.7
Philippines	14.6	8.6	1.5	0.9
Singapore	1,621	1,300	7.6	6.1
Vietnam	6.7	4.1	1.5	0.9

Source: Axco

In most South Asian countries, however, the conditions for forming annuities markets are unlikely to exist for some time. The life insurance sector is small even when compared with those in peer countries (table 5.6). India is an exception, with higher penetration rates. In most countries in the region-including Bangladesh, India, Pakistan, and Sri Lanka-the past nationalization of insurance companies and skewed income distribution have contributed to the low penetration. Most South Asian countries started to liberalize the sector in the late 1990s while also moving toward more market-based regulation and supervision.[9] The responsibility for insurance supervision, traditionally the domain of the ministries of commerce, has been shifted in most countries to an independent institution (as in India) or integrated with the Securities and Exchange Commission (as in Pakistan). Still, insurance supervision remains in its infancy, and public companies still dominate the sector in most countries except Nepal and Sri Lanka. In India 13 private life insurers and 9 private general life insurers have entered the market since its liberalization in 2002, but public sector companies still hold 90 percent of the premium market. In Afghanistan and Bhutan the public insurance company remains the sole local insurer.

Throughout the region annuities account for only a small part of an already small life insurance business. Only India has a relatively large annuity business, with new annuity premiums having reached 8.6 percent of all life insurance premiums underwritten in 2003, up from 1.31 percent in 2000. But it is too early to assess whether the pricing of these policies is sound. James and Sane (2003), offering a preliminary assessment of annuity products in India, point to the rapid and dramatic changes in money's worth ratios. The Life Insurance Company of India, the primary provider, had offered unrealistically generous payouts with very high money's worth ratios, far exceeding one through 2001. In 2002 it cut payouts dramatically, reducing the estimated money's worth ratios to 0.9, possibly in response to declines in interest rates, changes in mortality rates, and past actuarial losses.

Beyond a sound life insurance industry, other vital ingredients for the development of annuities markets also are missing. Well-developed mortality tables, key to sound pricing and funding of policies, are unavailable. Long-term fixed income instruments are scarce, increasing the reinvestment risk and the risk of a serious mismatch between assets and liabilities. Qualified actuaries are also in short supply.

Despite the considerable challenges of annuities markets, a number of policy initiatives could be implemented to facilitate their long-term development in South Asia. These include further liberalizing the insurance sector to promote greater competition and continuing to move toward a

more market-based regulatory and supervisory regime. Most countries also will need to considerably strengthen the capacity of the insurance supervisory agency. The supervisory agency should work closely with the industry to form a group of well-qualified actuaries and develop sound mortality tables to support more appropriate pricing of products, to the benefit of both consumers and suppliers. Mortality tables should include estimates of potential improvements in life expectancy. India is already taking steps in this direction, and the Life Insurance Council and Actuarial Society of India recently signed a memorandum of understanding to set up a Mortality and Morbidity Information Bureau. Updated tables should be available in late 2006 or early 2007.

In the absence of long-term fixed income instruments, the insurance industry could mitigate reinvestment risks by providing variable annuities where the purchaser's income would not be guaranteed but instead tied to the performance of the underlying assets. Those purchasing annuities would be allowed to select among various annuity accounts linked to different portfolio investments. At the time of the purchase the premium would be converted into units based on life expectancy and contract features (such as whether the annuity is single or joint). The value of the units would vary with the net investment returns on the underlying securities. Variable annuities are part of a growing range of annuity products being offered by insurance companies around the world. In India insurance companies have started to provide several linked or variable life insurance products where the return depends on the market performance of the underlying securities. There are concerns that these products are not properly valued, however, since the rules do not require debt instruments to be "marked to market." Many of these products are linked to pools of debt instruments.

Some large occupational pension schemes in industrial countries (such as TIAA-CREF) have gone a step further by sharing the longevity risk with the annuitant.[10] The value of the annuity is adjusted over time with changes in longevity projections. These adjustable annuities have been provided only by noncommercial organizations such as occupational schemes, however. All these retirement products require a robust regulatory framework to ensure that risk sharing rules are transparent and do not lend themselves to discretionary practices that could penalize annuitants.

Until more competitive markets for annuity products develop in South Asia, it would be preferable to avoid mandating their purchase, instead allowing retirees to acquire them voluntarily. But to the extent that there is a need to prevent a premature exhaustion of retirement funds, mandatory defined contribution schemes should at least require programmed phased withdrawals. These could be linked to life expectancy and allow for a variety of investment styles. In Chile, for example, phased withdrawal payments are recalculated at the end of each year based on the retiree's residual balance and the drawdown formula, which is based on life expectancy. Retirees can decide to withdraw less than the formula prescribes but not more and can switch to an annuity at any time during retirement. Since 2002 those with phased withdrawals have been able to choose among three investment funds differentiated by the percentage of equity they can hold (40, 20, and 0 percent; see Rocha and others forthcoming).

For mandatory defined contribution programs, governments should not restrict the provision of phased withdrawals to national provident funds and should encourage a competitive phased-withdrawal market, inviting private financial intermediaries to participate. Regulation and supervision will be necessary to oversee the financial strength and market conduct of financial intermediaries active in the sector.

Summary and recommendations

Building an environment more conducive to the sound expansion of funded pension plans is becoming increasingly important in South Asia. Among other things, that will require modernizing the regulatory framework for pension plans and developing robust supervisory capacity. India and Pakistan are already taking important steps in this direction. India is creating a new agency to regulate and supervise its new pension scheme, and Pakistan is making its Securities and Exchange Commission responsible for regulating and supervising voluntary pension plans. In the future both countries will need to extend the authorities of the supervisory entity to other pension plans-including publicly administered funded plans, exposed to the same market, credit, and operational risk as private plans.

Other countries in the region too will need to review their pension regulation and determine the institutional structure for pension regulation and supervision. The paucity of regulatory resources argues for integrating this function with an existing supervisory institution, an approach that may also require reinforcing the independence, authorities, and financing of that entity.

Revision of investment regulations for both public and private funds is long overdue. New regulations should grant fund managers greater flexibility and allow higher investments in private securities and foreign assets. A commitment to successful pension reform implies a parallel commitment to development of the financial sector-to enable funds to invest in a wider range of safe financial products. Moreover, coordinated reforms of the pension and financial sectors can yield gains for both. Where financial systems are very small or weak, however, pension systems will need to rely heavily-or even fully-on foreign investment.

While it would be premature to require retirees to purchase annuities in South Asia, policymakers can take steps to foster the development of these important but complex retirement products over the long term. In the medium term greater use of phased withdrawals (based on life expectancy) should be encouraged.

Notes

1. An interim agency has been set up, but the draft bill formally creating the Pension Fund Regulatory and Development Authority and defining the scope of its authorities is still under discussion in Parliament.
2. In addition, the classification of nonperforming loans is more lenient than in international practice, which contributes to a reduction of provisioning requirements, increasing the possibility of losses and worsening the vulnerability of the system.
3. Around 80 percent of banking assets in Pakistan are now controlled by private banks, compared with 34 percent in 1999 and just 8 percent in 1990.
4. India has 23 stock exchanges, but most trading is concentrated in the two largest, the National Stock Exchange and the Bombay Stock Exchange.
5. The most significant regulatory, supervisory, and institutional reforms relating to capital markets include the establishment of the Securities and Exchange Board of India; the issuance of new regulations governing various market participants, insider trading, takeover bids, and disclosure requirements; the establishment of the National Stock Exchange in 1994 with electronic trading to permit greater price transparency; the dematerialization of shares; and the removal of a prohibition on foreign institutional investors in 1992. These profound changes were motivated in part by a stock market scam in 1992.
6. The Securities and Exchange Board of India was given responsibility for supervising the markets in these financial derivatives (including index futures, index options, stock futures, and stock options).
7. Most civil service pension systems transformed into defined contribution schemes in recent years cover only new entrants to the workforce.

8. Data for 2004 show that 80 percent of early retirees in Chile were receiving an annuity. Demand for annuities from workers retiring at the normal retirement age is lower, at 35 percent (Rocha and others forthcoming).

9. Bangladesh is considering a draft law to introduce a more risk-based regulatory and supervisory approach.

10. TIAA-CREF Trust Company is one of the largest retirement funded schemes in the world, with more than 3.2 million participants from universities, research centers, and the health sector. At the end of 2003 it was managing US$300 billion in assets. Among the first institutions to have introduced variable annuities, it now offers nine variable annuity accounts. All its annuity products (including the fixed income annuity with no investment risk) incorporate a mechanism for sharing longevity risk. The fixed income annuity is priced so that it can pay a minimum annuity income for life and provide a reserve buffer in case longevity increases faster than initially projected. If longevity increases more slowly than projected, the board of trustees can declare annuity amounts in excess of those guaranteed.

CHAPTER 6

Conclusion

Retirement income systems for formal sector workers in South Asia have reached only a small share of the population while involving a disproportionately large share of economic resources. Moreover, for the most part these plans have performed poorly-both for their participants and for the economy. As civil service retirement programs reach maturity, the growth of pension spending poses a serious threat to fiscal stability in many countries. Yet design flaws have often prevented these schemes from achieving their primary aim of helping civil servants smooth consumption over their lifetimes. Mandatory pension schemes for the private sector also appear to have fallen short as instruments for enhancing the welfare of their members, with retirees often forced to depend on other sources of income. In addition, mandatory schemes' high contribution rates and feeble performance discourage participation and the formalization of the economy. Where voluntary pension schemes have been the only programs available to private sector workers, their performance too has been lackluster.

Concern about the problems facing civil service pension schemes in the region is mounting, and several countries are considering or already undertaking reforms. But the performance of retirement income schemes available to the rest of the formal sector has received far less attention. The policy framework for most of these programs has barely changed since they were created, in some cases nearly half a century ago. Moreover, these schemes involve even more complex political economy issues than the civil service schemes, because governments have often used their funded (or partially funded) structures to address fiscal gaps.

Why undertake reform now? Because now is a critical time to consider more broadly the problems affecting retirement income schemes for the formal sector. Some defined benefit programs have not yet matured. As time passes, future pension promises will become more deeply entrenched, making reform even more challenging. And as funded plans continue to grow, there is a risk of further misallocation of savings. Perhaps more important, there are encouraging signs of economic growth in the region and thus good possibilities for expanding the coverage of these programs. But even as a growing number of younger workers join the formal labor market and thus formal retirement schemes, urbanization will weaken traditional informal arrangements for the elderly, including intrafamily transfers. Strengthening retirement income schemes for the formal sector will help the region better prepare for the ageing process that will occur over the next half century.

Reforming pension schemes for the formal sector

This report has sought to provide a framework for improving the performance of pension schemes for the formal sector. While details vary across schemes, many issues and themes are common to several countries in South Asia.

Combining modest mandatory pillars with expansion of voluntary retirement schemes

Mandatory schemes (especially provident funds) need to make retirement income objectives and target replacement rates more explicit. But high replacement rates are best avoided because of the tradeoffs between current and future consumption. High replacement rates require high contribution rates, which could result in current welfare losses. Even in the formal sector younger workers may be better served by having greater flexibility in managing their savings and life events. Workers could complement the mandatory benefit with voluntary arrangements. In countries without mandatory pension plans, creating such plans seems premature at this stage in their economic development.

This strategy calls for wider availability of efficient voluntary retirement income systems. Multiple approaches should be encouraged, including personal plans and occupational pension schemes. Occupational schemes have a long tradition in the region, though their role and performance could be greatly improved under a more robust regulatory and supervisory framework. India's new platform of pension arrangements with centralized administration and decentralized asset management is a novel and interesting approach, though it could be difficult to replicate in countries with a weaker governance structure. Tax regimes need to be rationalized to avoid distortions (such as favoring lump-sum withdrawals over annuities, as in India) and double taxation (as in Sri Lanka). In contrast with OECD countries, in South Asian countries tax exemptions would probably do little to expand voluntary retirement schemes because of the region's narrow tax bases.

Reforming compensation as well as pension schemes for the civil service

Reform of civil service pension schemes in South Asia will need to take into account the overall compensation package. Offering generous pensions to all civil servants to address the wage compression problems affecting a few in the senior ranks appears to be too costly. Reform also needs to ease the mobility of labor between the public and private sectors. This could be done by introducing design features in the civil service pension scheme that would facilitate the portability of benefits or by harmonizing schemes for public and private sector workers. Some countries could consider a common scheme offering a modest replacement rate along with the possibility of a supplement for all civil servants or senior ones. Many countries around the world have taken this approach (Palacios and Whitehouse 2005). Besides supporting labor mobility, the unification of schemes can avoid duplicating institutional arrangements. In India, for example, future reforms to the pension scheme for private sector workers should explore the benefits of sharing institutional arrangements with the newly created scheme for new entrants to the civil service.

Exploring multiple design options for mandatory and civil service schemes

International experience points to multiple options in designing pension systems for formal sector workers. Many countries are moving toward greater funding, driven primarily by concerns about long-term financial sustainability. Most of these countries have established defined contribution structures (privately managed) rather than defined benefit schemes-because defined benefit schemes retain an open-ended liability for the sponsor (which, for mandatory schemes for the civil service or the private sector, is the government). The recent pension reforms affecting new entrants to the civil service in India and Sri Lanka best illustrate these differences. India's defined contribution scheme for civil servants will be fully funded, since members assume the investment and longevity risk, while Sri Lanka's scheme will start to show a deficit in four to five decades.

Moreover, if funds are not invested in a diversified portfolio, there will be little difference between a noncontributory defined benefit scheme and a contributory defined benefit scheme fully invested in government obligations. To diversify risks, some countries have established a two-pillar structure (mostly an unfunded defined benefit and a funded defined contribution component), with the relative importance of each pillar and the level of funding varying across systems.

Countries in South Asia exploring reforms of large pension schemes-such as those for civil servants-should consider whether the local environment is appropriate for funding reforms. Funding reforms are demanding in terms of initial conditions-requiring well-developed financial markets, experienced fund managers, and supportive institutional arrangements, such as supervision of funded schemes and record keeping. One way to mitigate the challenges of a less favorable domestic environment is to limit the proportion of the overall system that is funded. For example, a funded scheme could cover only younger workers or new entrants, or form a modest part of a larger two-pillar structure. Small countries and those with a weak domestic environment introducing a funded component will generally need to rely extensively or fully on offshore investments and the expertise of international investment managers.

Countries with no viable solutions for funding can instead consider parametric reforms. These could include changes to accrual rates, earnings bases, indexation methods, vesting periods, and eligibility criteria. Besides enhancing financial sustainability, parametric reforms would be useful throughout the region to eliminate features leading to arbitrariness in the treatment of participants and facilitate the portability of benefits between the public and private sectors. In addition, all countries in the region need to promote better accounting and disclosure of pension liabilities.

Fostering competitive fund management

New funded schemes in South Asia should avoid centralized asset management and permit competition. Large, centralized fund management structures have not had a positive history in South Asia and have eased the way to using pension fund resources for fiscal support. Nor would direct government participation in capital markets through investments of centralized pension funds be advisable, because of the risk that investments would be used to achieve other political objectives and because of the economic distortions likely to result. India's new defined contribution scheme, which will offer portfolio choice and competitive fund management, represents an important step forward and a marked departure from traditional practices.

Existing national provident funds in India, Nepal, and Sri Lanka will also need to improve governance and move toward more efficient decentralized fund management structures with portfolio choice. Because of the difficult local conditions, changes can be expected to occur only gradually. The situation in Sri Lanka is probably the most challenging because the national provident funds are so large relative to domestic financial markets. Fund management could be gradually decentralized through a combination of options: outsourcing asset management, opting out a share of accumulated assets, and fostering choice and competition through occupational pension funds.

In India and Pakistan mandatory defined benefit plans, also are likely to accumulate sizable reserves over the medium term. Improving their governance and asset management will be vital to strengthen their financial viability. In the short term governments could focus on increasing disclosure. In the medium term they should deepen governance reforms and explore progressive outsourcing of asset management.

Strengthening administration

Efficient administration will be critical to support pension reform, especially in funded schemes. All four mandatory retirement savings schemes in South Asia face serious administrative problems, including duplication of accounts. While it is encouraging that some institutions are already initiating small changes to enhance record keeping, more needs to be done in registration and collection of contributions; record keeping of accounts and provision of information to members; and payment of benefits. In all these areas there is great scope for redesigning processes and investing more in information technology to increase efficiency.

Building robust foundations for retirement savings schemes

The success of all these strategies will hinge on developing an environment more favorable to the robust growth of funded pension schemes, including a modern regulatory framework, strong supervisory capacity, and a more flexible investment regime. After years of neglect of pension regulation and supervision, some encouraging changes are under way in India-with its plans to establish an independent body, the Pension Fund Regulatory and Development Authority, to oversee the new pension scheme-and in Pakistan-with the Securities and Exchange Commission's issuance of initial regulations for pension funds and the preparation of a draft law strengthening the agency's capacity to regulate and oversee voluntary pension schemes. In the future both these institutions will need expanded authorities to oversee other pension plans, including publicly administered plans. And given initial conditions, public pension funds will probably need a transition period to adjust to a sounder regulatory framework. But beginning now, small steps can be taken by encouraging greater disclosure.

Other countries in the region also will need to review pension regulation and identify the most suitable institutional structure for pension regulation and supervision. Because of limited resources, integrating this function with an existing supervisory institution may be the best option in most circumstances.

More flexible investment regimes are needed to foster healthy portfolio diversification by both public and private pension funds. Current restrictions have penalized members, with private securities underrepresented in pension portfolios across South Asia. But greater flexibility will not yield benefits unless the fiscal situation improves throughout the region. Weak fiscal environments increase the volatility of financial markets and the vulnerability of financial institutions. Given the region's nascent capital markets, a gradual lifting of restrictions on foreign investment also will be desirable, to open opportunities for diversification. And healthy growth of funded pension schemes will require a strong parallel commitment to financial sector development.

What are the expected gains from reform?

Reforming pension schemes for the formal sector could yield important benefits for the economy as a whole. The civil service pension schemes in most South Asian countries appear to have large unreported liabilities relative to GDP and to the supporting tax base. In Sri Lanka this liability is as much as 60 percent of GDP. As mandatory defined benefit plans in India and Pakistan mature, they too will face challenges to their financial sustainability. Without reform, these schemes could claim a large share of resources to assist a small share of the population in the future. Reform could prevent the crowding out of critical investments in human development and infrastructure-and free resources to extend safety net programs to the elderly poor.

In addition, restructuring pension schemes for civil servants (or in some cases unifying them with those for private sector workers) could remove constraints to the portability of benefits from the public to the private sector. Most civil service schemes tie the pension benefit to the final wage, penalizing workers who try to exit the civil service before reaching the retirement age. And most schemes are not designed to allow portability of benefits. Removal of these constraints, along with other amendments to civil service compensation and exit rules, could change incentives and encourage greater labor mobility between the public and private sectors.

Moving toward funded pension schemes opens opportunities for strong synergies to arise between these schemes and local financial markets. In some countries, such as India and Sri Lanka, pension funds could become a major force in the development of a vibrant secondary mortgage market and other forms of term finance for the banking system. Banks would in turn be able to extend longer-term credit to small and medium-size enterprises, expanding their investment and growth opportunities. Pension funds could also become important investors in corporate bonds and eventually in equity. Not all countries in South Asia will benefit equally from these potential synergies, which require certain initial conditions and a minimum market size. Small countries with highly concentrated financial markets and countries where governance practices are poor, private firms are reluctant to disclose their accounts or dilute ownership, and most large firms are publicly owned will have less opportunity to benefit.

Reform should also bring important gains for individuals. In the past the feeble performance of mandatory pension schemes led members to perceive these as a "quasi tax" rather than as a source of retirement income. More efficient management of pension schemes should improve benefits and provide a more secure and reliable source of income for retirement. And expansion of voluntary retirement income systems will create new opportunities to save for old age, complementing more traditional arrangements.

Developing solid pension arrangements for the formal sector will be the starting point for expanding coverage. Experience elsewhere shows that as structural changes in the economy continue and the formal labor market gradually expands, pension schemes will slowly be able to embrace a larger share of the population. In the medium term, however, existing schemes in South Asia will be unable to cover most of the active population. Additional public interventions will be necessary to mitigate poverty during old age. This subject is of prime importance and merits special investigation complementing this report.

ANNEX 1

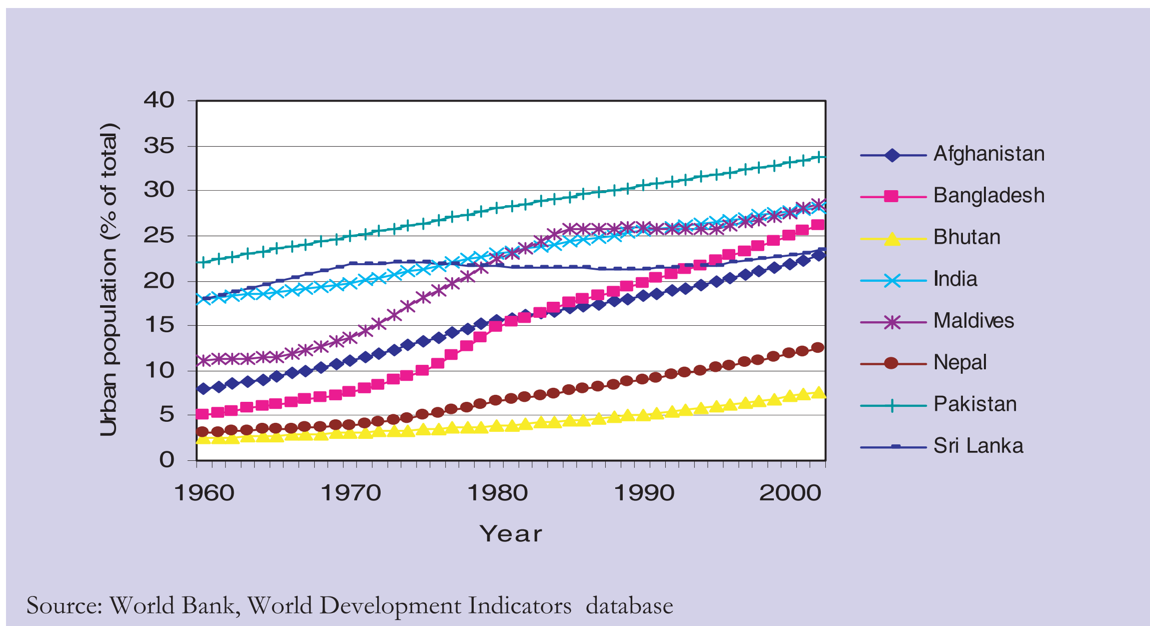
Table A1.1 Demographic and Urbanization Trends in South Asia

Country	*Total fertility rate*			*Life expectancy at birth*		
	1960	2000	2045	1960	2000	2045
Afghanistan	6.9	6.8	2.7	34.6	43.0	53.6
Bangladesh	7.0	3.1	2.1	39.8	61.2	71.8
Bhutan	--	5.4	2.3	--	62.2	71.9
India	6.6	3.1	2.1	44.3	62.9	71.1
Maldives	7.0	4.2	2.1	43.9	68.3	74.6
Nepal	5.8	4.3	2.2	38.5	58.9	70.4
Pakistan	6.9	4.7	2.2	43.9	63.0	72.4
Sri Lanka	5.3	2.1	2.1	60.1	73.0	79.6

– Not available

Source: For 1960 and 2000, World Bank, World Development Indicators database; for 2045, World Bank projections.

Figure A1.1 Urbanization in South Asia, 1960-2002



Source: World Bank, World Development Indicators database

ANNEX 2

Table A2.1 Major Formal Sector Pension Schemes in South Asia

AFGHANISTAN

Scheme	Legal coverage	Effective coverage	Financing contribution rates	Benefits design	Retirement age	Investment policy	Institutional structure
National pension scheme	Workers of the public and private sector organizations with 20 or more employees	Public sector workers in the areas controlled by the government[1]	Formally: employee- 3% of salary, plus 25% of salary in the first month of employment, and 50% of the incremental portion on every salary increase. Employer - 8% of payroll. Effectively – financed from the general budget	Defined-benefit. Final year salary multiplied by 40% plus 2% for each year of service in excess of 10, capped at 100%; or a lump sum if length of service is less than 10 years. No formal indexation rules.	65	Not applicable	Administered by the Pensions Department, a semi-autonomous body of the Ministry of Labor and Social Policy
Public banks pension scheme	Employees of the public banks	About 4,000 (2003)	Employee- 3% salary, plus 25% of salary in the first month of employment, and 50% of the incremental portion on every salary increase. Employer – 8% of payroll. No ceiling.	Same as above	65	Not applicable	Administered by the Pensions unit of the Central Bank

Notes: (1) The best available estimate of the number of public sector employees in Afghanistan for 2003 is 375.9 thousand (including some 4 thousand employees of the public banks). In principle, they are all covered by the pension schemes.

BANGLADESH

Scheme	Legal coverage	Effective coverage	Financing contribution rates	Benefits design	Retire-ment age	Investment policy	Institutional structure
Government Pension Scheme (GPS)	Civil servants, the military		Financed from the general budget	Defined-benefit. Varies from 32% of final salary for 10 years of service to 80% for 25 years of service. No formal indexation rules. Could be commuted for a lump sum at retirement.	57	Not applicable	Administered by the Office of Controller General of Accounts
General Provident Fund (GPF)	Voluntary for civil servants and employees of semi-government organizations		Employee - 2-10% of the salary, depending on the salary level.	Defined-contribution. Lump sum at retirement	57	All assets are invested in the government savings bonds (nominal interest rate 12.4-14.0% in 2000 - 2002)	Administered by the Office of Controller General of Accounts
Contributory Provident Fund (CPF)	Temporary and short-term employees of the government and semi-government organizations		Employee – 8.33% of the salary Employer – 8.33% of the payroll. No ceiling.	Defined-contribution. Lump sum at retirement	57	All assets are invested in the government savings bonds (nominal interest rate 12.4-14.0% in 2000 - 2002)	Administered by the Office of Controller General of Accounts

BHUTAN

Scheme	Legal coverage	Effective coverage	Financing contribution rates	Benefits design	Retire-ment age	Investment policy	Institutional structure
National Pension and Provident Fund	Civil servants and employees of specified financial institutions	18,300 (2003)	Employee – 5% of basic salary Employer – 5% of basic payroll. No ceiling	Defined-benefit. For employees with 10 or more years of service – 2% of the last year salary per year of service (to be reduced to 1.76% by 2026). Indexed by average wage growth. Minimum pension – 30% of average wage of the insured workers.	56		Autonomous organization governed by the National Pension Board
			Employee – 3-5% of basic salary Employer – 3-5% of basic payroll. No ceiling.	Defined-contributions. Lump sum benefit at retirement.			

INDIA

Scheme	Legal coverage	Effective coverage	Financing contribution rates	Benefits design	Retirement age	Investment policy	Institutional structure
Civil service Pension Scheme	Civil servants at state and federal level who joined the government before 2004[1]	16.9 million (2001)	Financed from the general budget at federal and state levels	Defined-benefit. 1.51% of the average basic salary over the last 10 months before retirement for each year of service. No formal indexation rules. Up to 40% of total benefits could be commuted as a lump sum at retirement.	60	Not applicable	Administered by the Ministry of Finance
New Civil Service Pension Scheme	Civil servants at state and federal level who joined the government in 2004[1]		Employee – 10% of the basic salary Government – 10% of the basic salary. No ceiling	Defined-contributions. Lump sum at retirement.	60	To be determined	Overseen by the PFRDA with a centralized record keeping outsourced to private sector
Government Provident Fund	Civil servants at state and federal level		Employee – 6-8.33% of the basic salary. No ceiling.	Defined-contributions. Lump sum at retirement.	60	Not applicable	Administered by the Ministry of Finance

INDIA (continued)

Scheme	Legal coverage	Effective coverage	Financing contribution rates	Benefits design	Retire-ment age	Investment policy	Institutional structure
Employees' Provident Fund (1952)	Employees in firms with more than 20 employees[2]	35.7 million (2003)	Employer: 3.67% Employee: 12% Covered wage: basic salary plus dearness allowance up to basic salary of Rs. 6500	Defined-contributions. Lump sum at retirement.	55	Regulations limit investments in private corporate bonds to 10% of new flows; investments in equity are not allowed. Thus far, no investments in private instruments have been made.	Administered by the Employees Provident Fund Organization and its Central Board of Trustees
Employees' Pension Scheme (1995)	Same as above with some exemptions		Employer: 8.33% Covered wage as above	Defined-benefit. 1/70 of the last salary for each year of service, plus 1/35 of the final year salary for employees with 20 or more years of service and/or retiring at the age 58 or later. No formal indexation rules.	55	Same as above	Same as above
Employees' Deposit Linked Insurance (1976)	Same as above	Same as EPF	Employer: 0.5% Government contribution: 1.16%. Covered wage as above	If a worker dies before retirement, the survivor receives a lump sum equal to the average balance in the EPF account for the year preceding death, up to Rs. 25,000 plus 25%of the excess up to a maximum of Rs 60,000	55	Same as above	Same as above
Public Provident Fund (1968)	Voluntary	2.76 million (2000)	Voluntary	Defined-contributions. Lump sum at retirement	Not defined	Same as above	Administered by the Ministry of Finance

Notes: (1) It includes the military and employees of quasi-governmental organizations (e.g. railways, telecom, etc.)
(2) An estimated 3.75 million employees companies running their own pension plans are exempted

MALDIVES

Scheme	Legal coverage	Effective coverage	Financing contribution rates	Benefits design	Retirement age	Investment policy	Institutional structure
Civil service pension scheme	Civil servants	28,000 (2004)	Financed from the general budget	Defined-benefit. 50% of the last salary for every 20 years of service, disregarding the age. Retirement is not required for receiving pension. No formal indexation rules.	Not defined	Not applicable	Administered by the Ministry for Women's Affairs and Social Security (?)
Provident Fund	Voluntary for public and private sector employees	9,639 (2004)	Employee – 5% of the salary Employer – 5% of the payroll. No ceiling	Defined-contributions. Lump sum at retirement	Not defined	The assets are invested in e bank deposits	Administered by the Ministry of Finance

NEPAL

Scheme	Legal coverage	Effective coverage	Financing contribution rates	Benefits design	Retire-ment age	Investment policy	Institutional structure
Civil Service Pension Scheme	Civil servants, the military, police, teachers, public banks and enterprises	About 300,000 (2004)	Financed from the general budget	For employees with 20 or more years of service, 2% of final salary for each year of service; no formal indexation rules; for employees with 5 or more years of service – commuted gratuity, 0.5-1.5 monthly salary	58-63	Not applicable	Administered by the Ministry of finance
Employees Provident Fund (1934)	Civil servants, the military, police, teachers, private firms with more than 10 workers.	360,000 (2004)[1]	Employer – 10% of the payroll, Employee – 10% of basic salary plus increments No ceiling.	Defined-contributions (lump sum at retirement).	Not defined	Government securities – 30%, commercial banks – 50%, corporate bonds/loans - 25%, housing/real estate – 25%; equity -25%; and credit to contributors – 60%	Autonomous organization governed by the Board

Notes.

(1) Of which 78,000 from private sector

PAKISTAN

Scheme	Legal coverage	Effective coverage	Financing contribution rates	Benefits design	Retire-ment age	Investment policy	Institutional structure
Government Pension Scheme (1986)	Federal government employees who entered the service in 1986 or later, or have chosen to transfer to this scheme		Financed from the general budget	Defined-benefit. For people with length of service 10 years or more, 2.33% of the last salary for each year of service. 40% of the benefits could be taken as a commuted gratuity.	60	Not applicable	Administered by the federal and provincial Ministries of Finance
Government Provident Fund	Federal government employees who entered the service before 1986 and did not switch to GPS		Employee – 10% of basic salary. Employer – 10% of the payroll. No ceiling.	Defined-contribution	60	Not applicable	Administered by the federal and provincial Ministries of Finance
Government Gratuity Scheme			Financed from the general budget	Defined-benefit. One monthly salary for each year of service			
Employees Old Age Benefits Institution (1976)	Mandatory for employees in firms with more than 10 workers; voluntary for smaller firms	1,935,984 (2003)	Employer: 5% of basic salary with a ceiling of Rs 3,000 Employee: Rs. 20 per month	Defined-benefit. 2% of the last salary for each year of insurable employment. Minimum pension: Rs 700 per month	60	Elaborated rules on permissible investments, incl. limits on shares of assets invested in the different types of instruments	Semi-autonomous institution reporting to the Ministry of Labor, Manpower, and overseas Pakistanis

SRI LANKA

Scheme	Legal coverage	Effective coverage	Financing contribution rates	Benefits design	Retirement age	Investment policy	Institutional structure
Public Sector Pension Scheme	Permanent public sector employees who joined the public sector before 2003	507,000 (2003)	Financed from the general budget	Defined-benefit. For length of service of 30 years, 85-90% of the last salary, depending on its level; with 2% less for each year short of 30 (20 years minimum). No formal indexation rules. Option of commuted gratuity equal to two annual pensions, with 10% deduction in pension for the first 10 years.[1]	55 minimum 60 mandatory	Not applicable	Administered by the Pensions Department, Ministry of Public Administration
Contributory Pension Fund (2003)	Permanent public sector employees who joined the public sector in or after 2003	1000 (2004)	Government – 12% of the payroll Employee – 8% of the salary. No ceiling	Defined-benefit. For length of service of 32 years, 70% of the last salary; with 2% less/more for each year short/above of 32 (20 years minimum). No formal indexation rules. Option of commuted gratuity equal to two annual pensions, with 10% deduction in pension.[1]	55 minimum 60 mandatory	Currently about 95% of the assets are invested in government bonds.	Administered by the Central Bank

SRI LANKA (continued)

Scheme	Legal coverage	Effective coverage	Financing contribution rates	Benefits design	Retire-ment age	Investment policy	Institutional structure
Employee's Provident Fund (1958)	Mandatory for the employees of private sector firms with 20 or more workers[2]	2.0 million active accounts (2003)	Employer - 12% of payroll Employee - 8% of salary No ceiling	Defined-contributions. Lump sum at retirement	55 male/ 50 female	Nearly 98% of the assets are invested in public debt instruments; portfolio managed mainly with a buy and hold strategy	Governed by Department of Labor, administered by the Central Bank
Employee's Trust Fund (1981)	Mandatory for the employees of private sector firms with 20 or more workers[2]	1.8 million active accounts (2003)	Employer - 3% of payroll No ceiling	Defined-contributions. Lump sum at retirement	60	About 85% of the assets are invested in government bonds and bills.	Administered by the Ministry of Finance
Farmers (1986)	Voluntary for farmers	674,000 (2003)	Fixed payments according to age	Defined-contributions. Annuity	60	Assets are invested in public debt instruments	Administered by the ministry of Agriculture
Fishermen (1990)	Voluntary for fishermen	48,000 (2003)	Fixed payments according to age	Defined-contributions. Annuity	60	Assets are invested in public debt instruments	Administered by the ministry of Agriculture
Self-employed (1996)	Voluntary for self-employed	23,000 (2003)	Fixed payments according to age	Defined-contributions. Annuity	60	Assets are invested in public debt instruments	Administered by the Ministry of Social Services

Notes.
(1) Special provisions apply to certain categories of the insured (judges, judicial clerks, etc.)
(2) Estimated 239,000 employees of the companies running their own approved private provident funds (APPFs) are exempted from participation in the EPF and ETF

Annex 3

Table A3.1 State-Level Pension Spending as a Share of Gross State Domestic Product in India, 1980-2000 (percent)

States	1980-81	1990-91	1993-94	1994-95	1995-96	1996-97	1997-98	1998-99	1999-00	2000-01
Andhra Pradesh	0.5	1.0	0.9	0.6	0.6	0.9	0.9	0.9	0.9	
Arunachal	0.0	0.9	0.5	0.6	0.6	0.7	0.7	0.8	1.1	
Assam	0.3	0.5	0.6	0.6	0.7	0.8	0.8	0.8	0.9	1.0
Bihar	0.1	0.7	1.1	1.1	0.9	1.1	1.6	1.8	1.8	2.2
Goa	0.0	0.7	0.4	0.4	0.4	0.4	0.4	0.4	0.5	
Gujarat	0.3	0.8	0.5	0.4	0.4	0.5	0.5	0.7	0.8	
Haryana	0.2	0.6	0.4	0.4	0.4	0.4	0.4	0.6	0.5	
Himachal Pradesh	0.5	1.6	1.2	1.0	1.1	1.1	1.1	1.2	1.4	
Jammu & Kashmir	0.5	1.1	0.8	0.7	0.6	0.6	0.6	0.9	1.3	
Karnataka	0.7	1.2	0.8	0.7	0.7	0.7	0.7	0.8	0.9	
Kerala	0.7	2.0	1.4	1.1	1.1	1.3	1.4	1.3	1.4	
Madhya Pradesh	0.2	0.5	0.6	0.6	0.7	0.7	0.9	1.0	1.2	
Maharashtra	0.2	0.5	0.3	0.3	0.3	0.3	0.3	0.4	0.4	
Manipur	0.5	1.3	2.2	1.3	1.3	1.3	1.4	1.6	1.8	
Meghalaya	0.5	0.7	0.5	0.5	0.6	0.6	0.6	0.7	0.7	
Mizoram	0.0	1.2	0.6	0.6	0.7	0.8	0.9	1.2		
Nagaland	0.0	1.0	0.8	0.5	1.6	1.4	1.4	1.4		
Orissa	0.3	0.8	0.6	0.5	0.7	0.6	0.7	0.8	1.0	
Punjab	0.2	0.8	0.5	0.5	0.5	0.5	0.6	0.6	0.7	
Rajasthan	0.5	0.7	0.6	0.5	0.5	0.5	0.6	0.7	0.9	1.2
Sikkim	0.0	0.5	0.6	0.5	0.6	0.5	0.6	0.7	0.7	1.7
Tamil Nadu	0.4	1.1	0.8	0.7	0.7	0.7	0.7	0.9	1.0	1.3
Tripura	0.3	1.5	1.2	1.1	1.2	1.0	1.0	1.1	1.3	
Uttar Pradesh	0.2	0.4	0.4	0.5	0.4	0.4	0.5	0.6	0.7	
West Bengal	0.2	0.5	0.5	0.4	0.5	0.4	0.4	0.5	0.6	
Average	0.3	0.9	0.8	0.7	0.7	0.7	0.8	0.9	1.0	

ANNEX 4
Impact of Commutation Factor on Replacement Rate

Pension lump sums

Three of the South Asian civil-service pension systems analysed above require or allow part of the annuity component of the pension to be taken instead as a lump sum. These are Bangladesh and Pakistan along with the pre-reform system in India. In addition, the pre-reform system in Sri Lanka pays a lump sum on top of the annuity component of the pension. The tables show how pension lump sums affect the results for Bangladesh and Pakistan

Bangladesh

Assumes 50 per cent commutation; commutation factor for full-career worker retiring at 60 is 16.67

	Individual earnings, multiple of average					
	0.5	*0.75*	*1*	*1.5*	*2*	*2.5*
Gross replacement rate (% of individual gross earnings)	83.4	83.4	83.4	83.4	83.4	83.4
Replacement rate with lump sum (% of individual gross earnings)	43.4	43.4	43.4	43.4	43.4	43.4
Gross lump sum (multiple of average gross earnings)	3.3	5.0	6.7	10.0	13.3	16.7
Gross pension wealth (multiple of average gross earnings)	6.4	9.7	12.9	19.3	25.8	32.2
Pension wealth with lump sum (multiple of average gross earnings)	6.7	10.0	13.4	20.1	26.7	33.5
Net replacement rate (% of individual net earnings)	92.6	92.6	92.6	93.3	93.1	93.4
Replacement rate with lump sum (% of individual net earnings)	48.2	48.2	48.2	48.9	50.0	51.0
Net lump sum (multiple of average net earnings)	3.7	5.6	7.4	11.1	14.8	18.5
Net pension wealth (multiple of average net earnings)	7.2	10.7	14.3	21.3	27.8	34.1
Pension wealth with lump sum (multiple of average net earnings)	7.4	11.2	14.9	22.3	29.7	37.1

Pakistan

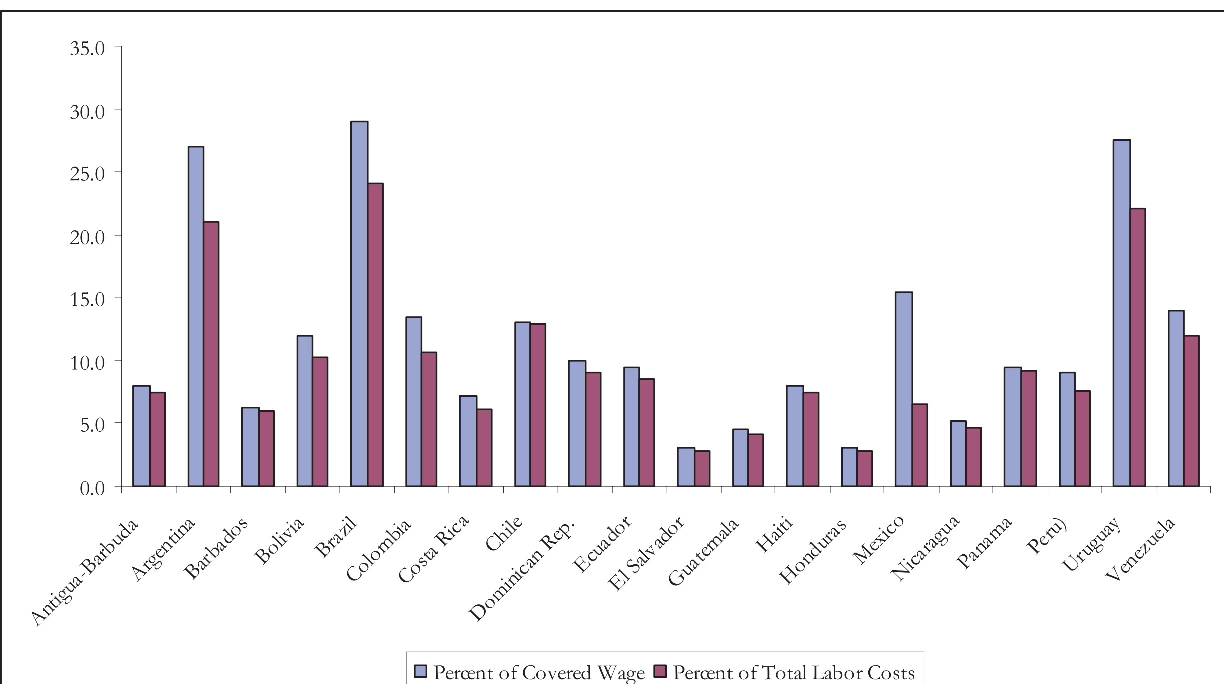
Assumes 40 per cent commutation; commutation factor for full-career worker retiring at 58 is 13.434

	Individual earnings, multiple of average					
	0.5	*0.75*	*1*	*1.5*	*2*	*2.5*
Gross replacement rate (% of individual gross earnings)	69.8	69.8	69.8	69.8	69.8	69.8
Replacement rate with lump sum (% of individual gross earnings)	41.9	41.9	41.9	41.9	41.9	41.9
Gross lump sum (multiple of average gross earnings)	1.9	2.8	3.7	5.6	7.5	9.4
Gross pension wealth (multiple of average gross earnings)	5.3	8.0	10.6	15.9	21.2	26.5
Pension wealth with lump sum (multiple of average gross earnings)	5.1	7.6	10.1	15.1	20.2	25.3
Net replacement rate (% of individual net earnings)	69.8	69.8	69.8	69.8	70.2	71.2
Replacement rate with lump sum (% of individual net earnings)	41.9	41.9	41.9	41.9	42.1	42.7
Net lump sum (multiple of average net earnings)	1.9	2.8	3.7	5.6	7.5	9.4
Net pension wealth (multiple of average net earnings)	5.3	8.0	10.6	15.9	21.2	26.5

ANNEX 5

Figure A5.1 Comparison of Payroll Charges Levied on Mandatory Pension and Retirement Savings Programs

Latin America & the Caribbean



Source: World Bank.

ANNEX 6

Table A6.1 India Investment Guidelines of the Insurance and Regulatory Development Authority

Instrument	Portfolio limits
Government securities	Not less than 20%
Government securities and/or other approved securities	Not less than 40%
Balance to be invested in: Equity Debentures Loans Other permitted instruments by Regulations/Act	Maximum 60%

Source: Insurance and Regulatory Development Authority.

ANNEX 7

Banking Indicators for South Asia and Peer Group

Table A7.1 Selected Banking Indicators for South Asia

Asset Quality	Bangladesh *			India*			Nepal *			Pakistan*			Sri Lanka*		
	Public Banks	Private Banks	Foreign Banks	Public Banks	Private Banks	Foreign Banks	Public Banks	Private Banks	Foreign Banks	Public Banks	Private Banks	Foreign Banks	Public Banks	Private Banks	Foreign Banks
Ratio of gross NPL to total assets	15.96	9.38	1.05	4.21	3.54	2.43	35.76	4.21	3.48	10.10	5.90	1.60	7.98	7.96	3.11
Ratio of NPL net of provisions to total assets	13.84	5.83	-	1.94	1.89	0.79	4.80	1.88	2.03	3.90	2.20	0.40	1.99	5.56	1.63
Ratio of gross NPL to total loans	32.89	15.69	2.34	9.36	7.66	5.22	65.94	6.39	7.50	25.00	13.10	3.30	15.88	13.26	5.91
NPL net of provisions to total loans	28.51	9.75	-	4.54	4.09	1.76	8.85	2.86	4.38	9.20	4.50	0.70	3.95	9.27	3.10
Profitability& Competitiveness															
Ratio of profits to period-average assets (ROA)	0.08	0.94	2.58	1.01	1.20	1.59	(5.91)	1.76	2.65	1.60	2.60	2.90	0.69	1.19	3.78
Ratio of profits to period-average equity (ROE)	3.30	17.25	27.07	19.99	16.21	15.25	(329.17)	16.74	97.36	27.50	47.10	29.20	31.14	15.49	29.52
Spread between Reference Lending & Deposit Rates															
(a)Lending rate (Prime customer rate range)	11-15	10-19	7-18.5	9.00-12.25	6.75-17.75	6.75-17.50	7.00-15.00	10.00-14.50	8.00-14.50	Up to 21.75	Up to 31.25	Up to 36.00	9.00-12.50	7.90-12.00	8.00-12.00
(b)Deposit Rate (12 months fixed deposit rate range)	6.50	6.75-12.00	6.75-8.50	4.00-6.00	3.00-7.75	3.00-7.75	4.75-6.00	4.50-7.00	3.50 - 7.00	1.46	1.54	1.25	6.25-6.50	6.25-7.25	5.00-7.50
Interest Spread (weighted average)	5.00	4.20	3.90	5.63	5.75	6.75	1.97	3.60	3.92	4.60	4.40	1.80	3.65	4.32	4.59
	* June 2003			* March 2003			* July 2003			* Sept 2003			* Dec 2003		

Table A7.2 Cross Country Comparison of Banks
South Asia Region vis-à-vis Peer Group and Selected International Ratios, 2003
(percent)

Country	Regulatory Capital to Risk-Weighted Assets	Non-Performing Loans to Total Loans	Provision to NPL	Return On Assets	Return On Equity
South Asian Countries					
Bangladesh	8.40	22.37	18.35	1.62	33.46
India	12.6	8.8	-	1.0	13.1
Nepal	(10.55)	26.61	88.59	(0.005)	(0.14)
Pakistan	11.1	13.7	64.06	1.2	20.5
Sri Lanka	9.94	13.04	54.38	1.31	20.35
Peer Group Economies					
Australia	10.0	0.4	40.8	1.1	17.3
Hong Kong	15.4	3.9	-	0.8	13.5
New Zealand	11.4	0.32*	77.4	1.3	24.2
Singapore	17.9	3.2	107.8	0.9	8.3
Japan	10.4	7.2	34.9	(0.6)	(19.4)
Korea	10.5	2.6	109.4 **	0.1	2.7
Malaysia	13.7	13.9	38.9	1.4	17.1
Thailand	14.0	12.8	72.8	0.8	8.6
Other Countries					
US	12.8	1.2	145.8	1.4	15.3
UK	12.5	2.2	72.3 **	1.1	19.0
Canada	13.3	1.2	43.5	0.7	14.7

Note: * - 2001 data, ** - 2002 data
Sources: Data submitted by South Asian countries, IMF Global Financial Stability Report, September 2004

ANNEX 8

Table A8.1 Selected Economic Indicators for South Asia

Bangladesh: Selected Economic Indicators

Date prepared: Mar 24 2005

	2001-02	2002-03	2003-04 Est.	2004-05 Proj.	2004 Jul-Sep	2004 Oct-Dec
National Income Accounts (% change)						
Real GDPmp	4.4	5.3	5.5	5.2	..	..
Real GDPfc	4.4	5.3	5.5	5.2	..	..
Agriculture	0.0	3.1	2.7	3.0	..	..
Industry	6.5	7.3	7.7	6.0	..	..
Manfacturing	5.5	6.7	7.4	5.5	..	..
Services	5.4	5.4	5.7	5.4	..	..
GDP deflator	2.7	4.4	5.5	6.0	..	..
CPI Inflation	2.8	4.4	5.8	7.5	4.4	4.24
GDP at market prices (US$ billion)	47.3	51.7	56.1	61.9	..	..
Financial Accounts						
Money Supply (Money+Quasi Money) (% change)	13.1	15.6	13.7	14.2	13.5	16.3
Domestic Credit (% change)	11.9	12.2	13.4	14.2	13.4	15.8
to Government	13.4	-5.8	17.7	14.4	9.9	11.8
to Private Sector	13.9	12.6	13.2	13.8	14.9	18.4
Lending rate eop (%)	16.0	16.0	15.0	..	..	..
External Accounts						
Exports of goods (% change in current US$)	-7.6	9.5	15.8	6.4	21.7	18.2*
Imports of goods (% change in current US$)	-8.7	13.0	13.7	14.6	23.8	6.5*
Current account balance (% of GDP)	0.5	0.1	0.0	-1.8	..	..
Foreign Direct Investment (US$ million)	65	376	385	399	..	..
Foreign Exchange Reserves (excl. gold) (US$ million)	1547	2431	2661	3171	3029	3172
Exchange rate End of Period (Rs./US$)	57.4	57.9	58.8	60.2	59.5	60.7
Exchange rate Period Average (Rs./US$)	57.9	57.9	60.3	61.1	60.0	60.0
Fiscal Accounts (% of GDP)						
Revenue Receipts	10.2	10.3	10.2	10.7	..	..
Total Expenditure	14.9	13.7	13.4	15.3	..	..
Fiscal Deficit	4.7	3.4	3.2	4.6	..	..
Deficit Financing						
Domestic	2.5	1.2	2.1	2.0	..	..
Foreign	2.1	2.1	1.1	2.6	..	..
Total Debt	53.2	51.0	48.3	47.9	..	..
Domestic debt	18.8	18.2	17.6	18.4	..	..
Foreign	34.4	32.8	30.7	29.5	..	..

*Oct-Nov.

Sources: IMF, International Financial Statistics and World Bank and IMF Staff Estimates.

Bhutan: Selected Economic Indicators

	2001/02	2002/03	2003/04 Est.	2004/05 Proj.	2004 Jan-Mar	2004 Apr-Jun
National Income Accounts (% change)						
Real GDPmp	7.8	7.0	5.9	5.1	..	..
Agriculture	4.1	2.4	2.4	3.2	..	..
Industry	13.8	11.4	6.2	3.9	..	..
Manfacturing	5.4	3.8	6.6	5.5	..	..
Services	4.7	5.7	9.1	8.1	..	..
GDP deflator	4.9	4.1	4.4	6.5	..	..
CPI Inflation	2.7	1.8	3.5	3.7	1.2	1.2
GDP at market prices (US$ million)	491.2	550.0	641.4	725.3	..	..
Financial Accounts						
Money Supply (Money+Quasi Money) (% change)	7.9	27.9	1.0	..	14.0	4.0
Domestic Credit (% change)	154.7	99.0	17.6	..	-7.9	12.5
to Government	..	..	..	..	..	..
to Private Sector	38.5	30.1	35.0	..	34.1	30.1
External Accounts						
Exports of goods (% change in current US$)	4.1	8.9	39.7	6.9	..	..
Imports of goods (% change in current US$)	9.8	1.7	29.5	56.1	..	..
Current account balance (% of GDP)	-11.4	-12.8	-8.4	-24.6	..	..
Foreign Direct Investment (US$ million)	2.1	2.5	3.5	4.3	..	..
Foreign Exchange Reserves (excl. gold) (US$ million)	323	355	367	..	412	380
Exchange rate End of Period (Rs./US$)	48.9	46.5	46.0	45.0	43.5	46.0
Exchange rate Period Average (Rs./US$)	48.2	47.9	45.4	46.0	45.3	44.9
Fiscal Accounts (% of GDP)						
Revenue Receipts (incl. grants)	37.3	26.7	36.5	35.5	..	..
Total Expenditure	41.7	37.4	41.2	47.5	..	..
Fiscal Deficit	4.4	10.7	4.7	12.1	..	..
Deficit Financing						
Domestic	-1.5	4.9	2.5	8.7	..	..
Foreign	5.9	5.8	2.2	3.4	..	..
Total Debt	52.7	64.5	71.4	92.9		
Domestic debt	2.1	2.8	1.7	10.2	..	..
Foreign	50.6	61.6	69.7	82.7	..	..

Sources: IMF, International Financial Statistics and World Bank and IMF Staff Estimates.

India: Selected Economic Indicators

Date prepared: Jan 03 2005

	2001-02	2002-03	2003-04 Est.	2004-05 Proj.	2004 Apr-Jun	Jul-Sep	Oct-Dec
National Income Accounts (% change)							
Real GDPmp	5.1	4.6	8.6	6.9	..	..	..
Real GDPfc	5.8	4.0	8.5	6.9	7.4	6.6	..
Agriculture	6.8	-5.2	9.6	1.1	3.4	-0.8	..
Industry	3.3	6.4	7.0	7.8	6.9	8.1	..
Manfacturing	3.6	6.2	6.9	8.9	8.0	9.3	..
Services	6.6	7.1	8.9	8.9	9.5	8.2	..
GDP deflator	3.1	3.5	3.2	5.4	4.6	7.4	..
CPI Inflation	4.3	4.0	3.9	5.4	2.7	4.2	..
GDP at market prices (US$ billion)	478.3	510.2	606.7	672.4	..	..	..
Financial Accounts							
Money Supply (Money+Quasi Money) (% change)	11.5	12.5	21.8	..	15.7	13.7	..
Domestic Credit (% change)	12.3	17.3	9.5	..	10.7	11.5	..
to Government	14.1	14.5	7.8	..	4.8	1.7	..
to Private Sector	11.5	20.7	11.4	..	16.3	19.7	..
Lending rate eop (%)	12.0	11.5	11.0	..	11.0	11.0	10.9
External Accounts							
Exports of goods (% change in current US$)	-1.6	20.3	20.4	25.1	22.2	22.8	..
Imports of goods (% change in current US$)	-2.8	14.5	24.4	37.6	24.8	33.4	..
Current account balance (% of GDP)	0.7	1.2	1.8	0.0	..	..	..
Foreign Direct Investment (US$ million)	4741	3217	3420	5308	..	..	..
Foreign Exchange Reserves (excl. gold) (US$ million)	51670	72566	108764	125900	115454	115388	126593
Exchange rate End of Period (Rs./US$)	47.7	48.4	46.0	46.0	46.0	46.2	43.6
Exchange rate Period Average (Rs./US$)	48.8	47.5	43.4	47.0	44.9	46.2	45.0
Fiscal Accounts - General Government (% of GDP)							
Revenue Receipts	17.5	18.3	18.8	19.5	..	..	..
Total Expenditure	27.7	27.9	28.7	28.9	..	..	..
Fiscal Deficit	10.1	9.6	9.9	9.4	..	..	..
Deficit Financing					..	..	..
Domestic	9.8	10.7	9.7	9.2	..	..	..
Foreign	0.3	-1.1	0.2	0.2	..	..	..
Total Debt	77.6	81.8	81.8	82.9	..	..	..
Domestic debt	67.9	73.3	75.1	76.9	..	..	..
Foreign	9.7	8.5	6.7	6.0	..	..	..

Sources: IMF, International Financial Statistics and World Bank and IMF Staff Estimates.

Maldives: Selected Economic Indicators

	2001	2002	2003	2004	2004 Jul-Sep	2004 Oct-Dec
National Income Accounts (% change)						
Real GDPfc	3.5	6.5	8.4	8.8	..	..
Agriculture	5.0	17.0	1.6	2.6	..	..
Industry	8.0	9.9	7.4	9.8	..	..
Manfacturing	5.4	15.5	2.0	1.7	..	..
Services	2.4	4.7	9.6	9.7	..	..
GDP deflator	0.8	1.0	2.3	0.0	..	
CPI Inflation	0.7	0.9	-2.9	6.4	4.8	12.3
GDP at market prices (US$ million)	627	641	691	753	..	..
Financial Accounts						
Money Supply (Money+Quasi Money) (% change)	9.0	19.3	14.6	32.6	24.9	32.6
Domestic Credit (% change)	19.4	11.7	-5.8	31.7	17.5	31.7
to Government	8.4	5.1	-19.6	-45.2	-41.7	-45.2
to Private Sector	29.9	15.3	6.8	57.6	40.3	57.6
External Accounts						
Exports of goods (% change in current US$)	1.3	20.2	14.8	13.7	21.6	..
Imports of goods (% change in current US$)	1.3	-0.5	20.2	30.7	47.1	..
Current account balance (% of GDP)	-9.4	-5.6	-4.6	-11.8	..	..
Foreign Direct Investment (US$ million)	11.7	12.5	13.5	..	..	..
Foreign Exchange Reserves (excl. gold) (US$ million)	93.1	133.1	159.5	203.6	185.8	203.6
Exchange rate End of Period (Rs./US$)	12.8	12.8	12.8	12.8	12.8	12.8
Exchange rate Period Average (Rs./US$)	12.24	12.8	12.8	12.8	12.8	12.8
Fiscal Accounts - General Government (% of GDP)						
Revenue Receipts	30.0	31.4	33.2	34.3	..	..
Total Expenditure	37.7	38.0	38.2	38.0	..	..
Fiscal Deficit	7.7	6.6	5.0	3.7	..	..
Deficit Financing					..	..
Domestic	2.8	0.4	-1.5	-1.4	..	..
Foreign	4.9	6.2	6.5	5.1	..	..
Total Debt	43.5	47.0	46.9	45.8	..	..
Domestic debt	19.6	20.1	17.2	14.4	..	..
Foreign	23.9	26.9	29.7	31.4	..	..

Sources: IMF, International Financial Statistics and World Bank and IMF Staff Estimates.

Nepal: Selected Economic Indicators

Date prepared: Mar 25 2005

	2001-02	2002-03	2003-04 Est.	2004-05 Proj.	2004 Apr-Jun	Jul-Sep	Oct-Dec
National Income Accounts (% change)							
Real GDPmp	-0.6	3.1	3.5	4.0	..	..	..
Real GDPfc	-0.3	2.7	3.4	4.0	..	..	..
Agriculture	2.2	2.5	3.7	3.7	..	..	..
Industry	-2.8	2.3	1.6	2.7	..	..	..
Manfacturing	-10.0	2.0	2.0	2.5	..	..	..
Services	-1.4	3.3	4.2	5.1	..	..	..
GDP deflator	3.4	4.5	4.5	5.5	..	..	..
CPI Inflation	2.9	4.7	4.0	4.4	1.6	2.2	..
GDP at market prices (US$ billion)	3.4	4.5	4.5	5.5	..	..	..
Financial Accounts							
Money Supply (Money+Quasi Money) (% change)	4.4	9.8	13.5	13.3	11.0	17.2	..
Domestic Credit (% change)	9.2	12.0	8.7	11.5	..	..	..
to Government	24.7	4.9	-5.0	4.5	..	..	..
to Private Sector	3.9	14.9	13.9	13.8	..	..	..
Lending rate eop (%)	6.8	7.17	9.0	9	9.0	9.0	..
External Accounts							
Exports of goods (% change in current US$)	-18.4	5.6	12.9	6.9	13.6	8.4	..
Imports of goods (% change in current US$)	-15.3	7.4	15.4	15.5	7.0	2.8	..
Current account balance (% of GDP)	1.9	0.3	0.1	-2.2	..	..	..
Foreign Direct Investment (US$ million)	-4	12	7	26	..	..	..
Foreign Exchange Reserves (excl. gold) (US$ million)	1371	1462	1767	1884	1449	1411	..
Exchange rate End of Period (Rs./US$)	78.0	751.1	74.1	76.3	73.5	74.8	71.8
Exchange rate Period Average (Rs./US$)	75.9	77.8	73.3	73.0	72.7	74.7	73.6
Fiscal Accounts (% of GDP)							
Revenue Receipts	11.5	12.3	12.3	12.7	..	..	..
Total Expenditure	17.2	16.0	16.2	18.0	..	..	..
Fiscal Deficit	5.7	3.7	3.9	5.3	..	..	..
Deficit Financing							
Domestic	2.9	0.9	-0.2	0.7	..	..	..
Foreign	2.8	2.8	4.1	4.6	..	..	..
Total Debt	69.7	66.5	62.8	59.7	..	..	..
Domestic debt	17.5	17.4	15.9	15.1	..	..	..
Foreign	52.2	49.1	46.9	44.6	..	..	..

Sources: IMF, International Financial Statistics and World Bank and IMF Staff Estimates.

Pakistan: Selected Economic Indicators

Date prepared: Mar 24 2005

	2001-02	2002-03	2003-04 Est.	2004-05 Proj.	2004 Apr-Jun	Jul-Sep	Oct-Dec
National Income Accounts (% change)							
Real GDPmp	3.2	5.1	6.0	7.0	..	..	..
Real GDPfc	3.1	5.1	6.4	7.0	..	..	..
Agriculture	0.1	4.1	2.6	6.3	..	..	..
Industry	2.6	5.8	13.1	9.6	..	..	..
Manfacturing	4.5	6.9	13.4	11.0	..	..	..
Services	4.8	5.3	5.2	6.0	..	..	..
GDP deflator	2.4	4.2	6.8	7.9	..	..	..
CPI Inflation	2.5	3.1	4.6	9.0	7.2	9.2	8.5
GDP at market prices (US$ billion)	71.9	82.6	94.9	104.9	..	..	..
Financial Accounts							
Money Supply (Money+Quasi Money) (% change)	15.4	18.3	19.6	17.0	19.6	18.6	20.4
Domestic Credit (% change)	2.0	-0.4	17.5	15.5	23.5	23.7	27.7
to Government	1.5	-1.4	2.8	3.1	10.3	6.0	22.2
to Private Sector	2.5	9.1	14.3	14.3	29.8	33.2	34.0
Discount rate eop (%)	9.0	7.5	7.5	..	7.5	7.5	7.5
External Accounts							
Exports of goods (% change in current US$)	2.3	19.1	13.8	10.0	11.8	12.1	17.4
Imports of goods (% change in current US$)	-7.5	20.2	20.1	22.1	59.5	36.8	56.8
Current account balance (% of GDP)	0.1	3.8	1.4	-1.7	..	..	..
Foreign Direct Investment (US$ million)	368	612	752	716	..	..	..
Foreign Exchange Reserves (excl. gold) (US$ million)	4,330	9,521	10,546	10,003	11,192	10,762	9,799
Exchange rate End of Period (Rs./US$)	59.9	57.7	57.5	60.0	58.1	59.2	59.1
Exchange rate Period Average (Rs./US$)	61.3	58.4	57.4	59.0	57.7	58.6	59.4
Fiscal Accounts (% of GDP)							
Revenue Receipts	14.2	15.0	14.5	13.6	..	..	..
Total Expenditure	19.7	18.8	16.9	16.8	..	..	..
Fiscal Deficit	5.5	3.8	2.4	3.2	..	..	..
Deficit Financing							
Domestic	2.3	1.8	2.5	1.3	..	..	..
Foreign	3.2	2.0	-0.1	1.9	..	..	..
Total Debt	80.2	74.3	68.7	63.0	..	..	..
Domestic debt	40.4	39.3	36.8	33.8	..	..	..
Foreign	39.8	35.0	31.9	29.2	..	..	..

Sources: IMF, International Financial Statistics and World Bank and IMF Staff Estimates.

Sri Lanka: Selected Economic Indicators

Date prepared: Mar 24 2005

	2001	2002	2003 Est.	2004 Est.	2005 Proj.	2004 Apr-Jun	Jul-Sep	Oct-Dec
National Income Accounts (% change)								
Real GDPmp	-1.5	3.9	5.9	5.2	5.3	..	..	..
Real GDPfc	-1.5	4.0	5.9	6.0	..	..	..	..
Agriculture	-3.4	2.5	1.5	2.4	..	..	..	..
Industry	-2.1	1.0	5.5	6.0	..	..	..	..
Manfacturing	-4.2	2.1	4.4	6.0	..	..	..	..
Services	-0.5	6.1	7.7	7.4	..	..	..	..
GDP deflator	13.7	8.2	5.0	6.0	..	..	..	..
CPI Inflation	14.2	9.6	6.3	7.6	12.0	5.8	10.3	..
GDP at market prices (US$ billion)	15.7	16.5	18.5	20.7	..	..	..	..
Financial Accounts								
Money Supply (Money+Quasi Money) (% change)	13.6	13.4	15.3	19.5	15.0	16.0	18.1	19.5
Domestic Credit (% change)	18.4	7.5	7.6	23.4	15.7	14.1	19.6	23.4
to Government	11.7	-1.1	-8.7	18	5.3	5.6	28.1	18.0
to Private Sector	6.7	8.7	16.9	26.1	18.3	20.4	21.0	26.1
Lending rate eop (%)	14.5	12.4	9.0	..	..	9.2	9.7	..
External Accounts								
Exports of goods (% change in current US$)	-12.8	-2.5	9.2	12.7	6.5	7.5	15.3	..
Imports of goods (% change in current US$)	-18.4	2.2	9.3	19.2	14.6	-11.4	13.2	..
Current account balance (% of GDP)	-1.5	-1.6	-0.4	-3.2	-5.3	..	..	..
Foreign Direct Investment (US$ million)	82	230	201	178	276	..	..	..
Foreign Exchange Reserves (excl. gold) (US$ million)	1180	1595	2147	1825	1977	2043	1906	..
Exchange rate End of Period (Rs./US$)	93.2	96.7	96.7	98.7	..	102.3	103.7	104.6
Exchange rate Period Average (Rs./US$)	89.4	95.7	96.5	96.5	..	99.2	103.2	104.4
Fiscal Accounts (% of GDP)								
Revenue Receipts	16.6	16.5	15.4	15.8	17.4	..	..	..
Total Expenditure	27.5	25.4	23.6	23.9	27.0	..	..	..
Fiscal Deficit	10.9	8.9	8.2	8.1	9.6	..	..	..
Deficit Financing								..
Domestic	9.9	8.8	5.8	6.6	6.1	..	..	..
Foreign	1.0	0.1	2.4	1.5	3.5	..	..	..
Total Debt	103.2	105.5	105.9	108.1	103.1		..	..
Domestic debt	58.0	59.9	57.9	57.9	54.3	..	..	..
Foreign	45.2	45.6	48.0	50.2	48.8	..	..	..

Sources: IMF, International Financial Statistics and World Bank and IMF Staff Estimates.

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