CORE GUIDANCE



Preparing PERs



for Human



Development



Preface

These tools for analyzing public expenditures in HD sectors are part of a larger process to improve the treatment of human development issues in PRSCs, PERs, development policy lending and other cross-sectoral or macroeonomic analyses. The specific goal of these interlinked PER guidance notes is to support and spark the imagination of people tasked with analyzing expenditures in HD sectors—to help them learn from better than average examples and to make it easier to use the many resources already available.

The revision of the PER guidance was initiated by Maureen Lewis when she was Interim Chief Economist HD. Gunilla Pettersson undertook the update of the PER guidance. Many thanks to the following people for providing insight into the PER process and useful comments on how to improve the existing guidance: Cristian Aedo, Christian Bodewig, Jim Brumby, Pablo Gottret, Margaret Grosh, Robin Horn, Harry Patrinos, Christine Lao Pena, Stephane Legros, Maureen Lewis, Mattias Lundberg, Cem Mete, Montserrat Pallares-Miralles, Suhas Parandekar, Emilio Porta, Pia Schneider, Lars Sondergaard, Emil Tesliuc, and Erwin Tiongson.

The original PER guidance was launched in 2004 and led by Maureen Lewis, managed by Sue Berryman and carried out by Dina Abu-Ghaida and Sue Berryman (education), Dov Chernichovsky and Mattias Lundberg (health) and Margaret Grosh (social protection).

User's Guide









Checklists

The guidance note given here is not to be taken as a minimum list where the authors must tick every sub-box. Every PER must be selective in what it covers, with the selection of topics based on many factors—what is needed to underpin the country dialogue, what is already known and packaged elsewhere, what is manageable to do given constraints on time, data and funding, etc. This guidance note is meant to remind the analyst of the main features that might normally be included in the health chapter of a PER. Omissions will often be made, but with some justification in mind. In addition to agreeing in the concept note on the planned coverage of topics, it may be useful to convey to the reader of the full report the reasons for omissions of major themes. Similarly the depth of treatment and number of programs covered in depth will need to be considered, agreed and explained.

Note also that the guidance note is organized as a checklist rather than an outline or table of contents. While a report might be organized along these lines, there are many other outlines that could be effective. One option might be to work around the core PER questions of: Where does the money come from? Where does the money go? What does it buy? How could spending be improved? Another outline might be to present first the situation with all basic analyses, followed in a second section by a discussion of issues and in a third section by options for reform.

Notes

In many places in the checklist the symbol **Note** appears. The text of all the notes follows the checklist itself. Some are short texts that explain further what is meant in the checklist. Often the notes contain references to methodological material or to sources from which international comparators may be drawn.

Examples

In many places in the checklist the symbol **Example** appears. The text of the examples follows the text of the notes. The examples are excerpts of a page, table or series of pages meant to show at least one interesting case of application of the themes contained in the checklist.

In addition to using the varied examples that form some sort of composite "model" PER chapter, it may be useful to the task team to look at a few actual

PERs, though of course no single report is exemplary in all ways.

Bibliography

Short references are given in the individual notes and examples. Full references are contained in the unified bibliography. For the majority of documents contained in the bibliography, materials are available via the World Bank website or the internet.



Core Guidance and Checklist for All HD Sectors

The objective of this core guidance is to highlight issues common to PERs, regardless of the sector. The issues concern mainly preparation and anticipation, shared considerations and such cross-sectoral questions as the overall budget envelope and tradeoffs between social and other sectors. The first section addresses the preparation of a PER; the second, the scope for the analysis.

Part 1. Preparation

1. Scope of the PER

A public expenditure review is concerned with public-based (not always government) revenues and expenditures as expressions of public policy and public involvement in the economy. Social sectors—education, health and social protection—are prime instruments of such policy and involvement. Each of the sectors is wide-reaching, comprising both "private" and "public." Rarely can all issues be covered with available resources. Indeed, a great many kinds of analyses can be taken on in a PER, but obviously these need to be aligned with the data availability and budget, not to mention the focus of the larger task in which sectoral PERs are commonly undertaken. Consequently, the following are important.

- Decide the issues or topics to address. The selection of topics should be carefully considered and prioritized. The HD sector-specific PER checklists can be helpful. Regardless of issues and topics, the PER should focus on the efficiency and equity of public expenditures.
- Make sure that your specific scope fits the purposes of the overall PER. The team leader for the PER should, but does not always, clarify the objectives, which should be highlighted in the concept note, prior to the launch of the PER exercise. If needed, define the focus for your responsibility, and clear it with the team leader. This can be an iterative process involving the government as well. Collaboration with stakeholders will enhance the effectiveness of the PER, but it will add to the cost and time required to complete the task.
- State your focus clearly, why you decided on it and what has been

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(regrettably) excluded. Broad, unfocused PERs will be less effective than sharply focused ones. There can be several reasons for including some topics and excluding others. Key among them:

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- Policy priorities.
- o The budget.
- o Timeframe.
- Data availability, budget and time constraints.
- Have a local consultant collect relevant data and information before your visit as it can be invaluable.



2. Task Budgets and Time Frame

At the end of the day, the budget available for PER preparation and its time frame will be decisive in specifying the scope and setting priorities. Having a clear view of those constraints and managing them ahead of time is crucial. It is important therefore to deal with the following.

- Check that the time and budget allocated to you for the HD PER are in line
 with the terms of reference. There are times when much more is expected
 than can be accommodated given the constraints. Be aware of the resources
 needed for:
 - Missions to collect data and information that you need.
 - Missions to discuss results and disseminate them more broadly (such as running a workshop for stakeholders).
 - o Follow-up policy discussions.
- See how you can augment your resources through:
 - Other related reports. Past PERs can be particularly useful.
 - Trust Funds and other extra-Bank resources. (Be careful here with the quality of consultants).

3. Sources of Data and Information

Data are critical for your analysis and discussion. Be clear ahead of time about your data sources and availability because they can constrain the scope of your report and its quality. It helps to start by reviewing the following data sources and options. The team leader and the Bank's Resident Mission can identify and contract one or more local consultants to collect the data before your mission.

- Government and official:
 - Government budget documents (central government consolidated accounts; line ministry—e.g., MoH—budgets; state or provincial budgets

if separate from consolidated government accounts; medium term expenditure framework documents).

- Note 2. Common errors in calculating total public expenditures
 - Census data and reports. Country-specific estimates and projections can be checked with population experts in HDNHE.
 - Sector-specific complementary administrative data, such as poverty maps, school-mapping databases or "report cards" on the health or education system.
- World Bank, IMF and other international agencies:
 - Data (such as World Development Indicators for comparators).
 - Documents (country economic memoranda; PRSP/PRGF documents;
 HIPIC assessments; beneficiary assessments; poverty assessments;
 qualitative studies such as *Voices of the Poor*, earlier PERs).
 - Research:
 - For World Bank research and publications: go to http://econ.world bank.org/.
 - · For external publications: type JOLIS, scroll down and choose EconLit under "popular databases," search by topic, author or title.
 - Expenditure and budget guidance expertise (thematic groups such as PREM's decentralization group and public sector governance team; office of HDNVP's chief economist; PER team members dealing with crosssectoral issues that affect the HD sectors, such as the government's budget formation and execution practices or public administration).
 - International sources (reports by donors, reports of international agencies such as OECD, UNICEF and UNDP, particularly the annual Human Development Report; reports from NGOs; papers by academics).
- Surveys: Country-specific survey data include the following common and highly developed sources:
 - Living standards measurement surveys (LSMS): http://www.worldbank.org/lsms/
 - Public expenditure tracking surveys (PETS): http://go.worldbank.org/HSQUS4IS20
 - Quantitative service delivery surveys (QSDS): http://go.worldbank.org/HSQUS4IS20
 - Demographic and health surveys (DHS): http://www.measuredhs.com/
 - Multiple indicator cluster surveys (MICS):

http://www.unicef.org/statistics/index_24302.html/

- Labor market surveys, anticorruption surveys.
- New Data: When key data are missing:
 - If time and budget permit, organize new data collection (possibly in collaboration with other donors).
 - o If time and budget do not permit new data collection:
 - Consider assembling a panel of experts or a focus group to give you a sense of the shape and magnitude of the issue.
 - · Mention the gaps but work around them.
 - · Identify studies that are a high priority for the future.

Part 2. Analysis

4. Rationale for Public Intervention in Your Sector

Public intervention in economic and social endeavors cannot be taken for granted. Such intervention needs careful justification and scrutiny, one of the basic challenges of the PER. You have to make sure that the following issues constantly guide you. They must be a subtext of your report.

- Fundamental arguments for public intervention are equity and efficiency concerns. The efficiency concerns emerge from market failures and imperfections that are commonly associated with information asymmetries, externalities and economies of scale.
- The public role can be in regulation, information, financing or even provision of services. Although government always has regulatory and information dissemination roles, and almost always is involved in financing social services, it does not have to provide those services to assure equitable access and quality. It may be even more efficient and equitable to finance the sector by selectively subsidizing the consumption of some commodities and services among some segment(s) of the population.
- The fundamental arguments against public intervention are governments' failures to meet the goals of public intervention, assure sustainable financing and, worst, crowd out potentially efficient and equitable private investment and activity.
- The key challenge is to find ways to prevent government failure due to rentseeking, elite capture and other abuses—in instances where government should intervene.

5. Comparators

Empirical evidence about indicators (age-specific mortality, ratio of school attendance at any age) and financial flows for the country is probably the most essential input for the PER because it provides the foundation for analysis and discussion. At the same time many indicators, especially flows (such as various measures of spending on health), do not carry an intrinsic absolute value for passing judgment. We do not know, for example, what "adequate" levels of spending on health, education or social protection would be. For these reasons we need to provide some context, particularly when gauging a country's performance.

- Statistical comparisons with other countries in the same region, income level
 or ethnic mix; countries to which the country aspires (such as the OECD)
 Such comparisons may help set some "reasonable" quantitative targets for
 policymakers and even provide an incentive to reach them.
- Note 3. Problems arising from country comparisons
- Trend data for comparisons over time—essential for gauging how quickly the country may be reaching its target.
- These comparisons are not substitutes for analysis—they are descriptive, leading to a statement of the problem. But they provide neither a diagnosis nor an explanation. The comparisons may show that a country performs significantly worse (or better) than "expected," or that improvements are slow in coming, and thereby provoke deeper exploration into the causes of the observed experience.

6. Performance

Ultimately we wish to know how well the sector is spending public money, in terms of both efficiency and equity. It is important to identify the sources of poor sector performance and outcomes versus spending, and to explore reasons for observed inefficiencies and inequities. Addressing them can be important contributions to policy and program reforms or to suggesting ways to improve performance. *The World Development Report 2004: Making Services Work for Poor People* identifies selected causes that are worth looking at, such as whether beneficiaries have information on government performance and the power to use that information to pressure for change.

- As outlined above, comparative analyses can be especially useful in this regard.
- Average and marginal incidence of sectoral investments are critical for studying equity as well as (average) efficiency issues.
- Note 4. Problems with calculating incidence from primary household surveys

Incidence on the basis of geography, income or other factors can illuminate how spending is affecting the population and therefore where public spending is potentially having an impact. Within each of the sectoral sections this issue is addressed, but its importance is such that it should be a basis for all PERs. See Dominique van de Walle's Incidence Analysis of Public Spending and Social Programs publications and http://go.worldbank.org/W0UI98DFS0.

7. Sources of Finance

Sources of finance are the key element of the PER. They can be multiple, especially in poor nations where donor contributions can constitute a major source of public-like or extrabudgetary finance for the social sectors. Moreover, even local resources can come from different levels of government. And some may constitute not direct public funds but earmarked contributions, such as social health insurance, that can be heavily regulated by the state. Consequently, the following are important.

- All sources of public and off-budget finance that support the activity in the sector you are responsible for. Donors and NGOs are common sources of off-budget resources.
- Subnational data from state or province and local levels, which provide increasingly significant sources of revenues and expenditures. Although often difficult to obtain, these need to be captured to the extent possible because they have both financial and policy implications. Sometimes resources are transferred from the central government; other times they are locally raised revenues.
- Potential problems with regard to sustainability of sources of finance. Even simple projections of the fiscal sustainability of current service delivery and planned reforms are helpful if they factor in macroeconomic and demographic projections and other fairly predictable factors that will affect costs and public revenues.

8. Financial Management and Spending Patterns

The impact of any funds depends on how much of what is collected or budgeted reaches the intended beneficiaries, and how well the funds that reach their target are spent. Two issues are involved: "diversion" of funds along the way and the real resources that the funds buy at the target (Savedoff 2008). Another related but crucial element concerns the "public-private mix" at the point of service delivery. Specifically, the following deserve careful and delicate attention since they can involve different forms of corruption.

- Arrears can create serious discrepancies between budgets and actual spending or executed budget within a particular time frame. Arrears can lead to shortages in real resources and ineffective spending.
- Public Expenditure Tracking Surveys (PETS) can help detect gaps and their sources between intended budgets and those actually reaching their targets (see http://go.worldbank.org/HSQUS4IS20).

- Ineffective use of funds may result in shortages of critical resources (e.g., drugs, books) and absenteeism of civil servants from their workstations or doctors from their clinics (e.g. Chaudhury and Hammer 2003).
- These shortages may be coupled with under-the-table pay as a condition to realization of public entitlement.

9. Tradeoffs Within and Across Sectors

Highlighting tradeoffs in the context of efficiency and equity is a key rationale for PERs. Within sectors, reallocation or a new focus on certain activities to improve equity, efficiency or impact can be helpful in the policy debate and in guiding reforms. Even more challenging, both politically and for policy, is the potential reallocation across sectors. Here the Bank's role may be crucial because it can serve as a honest broker between different parts of government. To complete the task, the following are rather critical.

- Clear views and priorities about sectoral objectives and the potential within and across sectors.
- Formation of a consensus about the desired changes even among mission members.

10. Relevant Conclusions and Recommendations

At the end of the day, we wish to have a policy impact. At the outset, such impact depends on several principles, as follows.

- Make explicit the link between conclusions and recommendations and the analysis. Avoid:
 - Conclusions and recommendations that do not follow from the analysis.
 - Analysis that does not lead to any conclusions or recommendations.

Note that there is tension between laying out the analytical grounds for recommendations and trimming the total report to a few pages for a PER that covers multiple sectors. Sometimes it can be resolved if the PER has a main report and a second volume with the technical background papers.

- Make the conclusions and recommendations appropriately specific, not bland and general. Can they be made operational and actionable for the government?
- Ranking recommendations is critical. A laundry list of valid issues is a list too long to act on. For policymakers, identify a limited number of key issues—three to five per sector—where getting some traction is most

critical. "Nesting" your recommendations in hierarchies can be helpful. The main recommendation (such as improve equity of social assistance) can be aimed at policymakers, with the technical specifics aimed at technocrats (such as change the balance between programs A and B, improve program C by taking actions 1, 2 and 3). Phasing—short, medium and long-term—is another way to "chunk" recommendations into digestible form.

Place recommendations in a feasible and plausible social, political and administrative context. Bank PERs have a tendency to preach the good and the moral without an appreciation of the realistic and the feasible. What can policymakers realistically do? What political costs and implementation barriers would be required with specific recommendations?



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Note 1. Consultant qualifications

Qualifications for a local consultant include:

- Comfort with data and a "nose" for important data inconsistencies. A
 local consultant can be ideal for arranging field visits, but having a "feel"
 for data is critical.
- Experience with the country's budgets and expenditure data.
 Governments are idiosyncratic in terms of how they report revenues and expenditures. They change their reporting categories over time. If the consultant is not aware of these changes, trend data can be wildly misinterpreted.
- Credibility with government counterparts who control the data that you
 need. Data on how the sector is financed are often sensitive.
 Government counterparts know that expenditure data can be used to
 reveal allocative and technical inefficiencies and corruption. It is
 important that key counterparts trust the local consultant so that he/she
 can get access to the data.
- A reputation for getting the job done on time.

Note 2. Common errors in calculating total public expenditures

Regardless of the HD sector, the total amount of financing (public and private) going into the sector has to be established. In calculating total public expenditures, there are common errors. It is important to ensure that data on public expenditures include:

- Local as well as central government budgets—that is, the consolidated budget.
- Budgets for all ministries with expenditures on the sector's function.
 Expenditures for social protection tend to be fragmented among several ministries, and expenditures for health and education can also show up in budgets for ministries other than the health and education ministries.
 For example, if the PER includes vocational and technical training, a ministry of labor or social welfare often has a piece of the expenditure action. Off-budget as well as budgeted expenditures. Off-budget expenditures can be a big share of total public expenditures. The health sector may have an off-budget health insurance fund or Global Funds—the social protection sector, off-budget pension and unemployment insurance funds. In the education sector donor grants and loans are the most likely source of off-budget expenditures.
- Executed budgets or, if the budget is still being implemented, the latest planned budget. Although countries differ in the relationships between

their planned and executed budgets for an HD sector, there can be big differences between the two.

Note 3. Problems arising from country comparisons

Comparisons with other countries need to be judiciously selected and used. For example, in the Bank it is common practice to compare the percent of GDP or total public expenditures devoted to the social sector with that devoted by countries "comparable" in some way—regional neighbors, or similar per capita GDPs, for example. There are two problems. One is that regional neighbors may share the same difficulties as the country in question. For example, countries of the former Soviet Union had the same inefficient input norms. The second problem is that countries differ in several factors that significantly affect total expenditures in the sector, such as variations in:

- Number and nature of service beneficiaries—such as the number of families that need social assistance, the share of the population that is older and in greater need of medical services for noncommunicable diseases or the number and enrollment rates of school age children whose education has to be financed.
- Prices for key inputs, such as doctors or teachers.
- Residential patterns that determine opportunities for economies of scale—all else equal, it costs more to provide health care or education in countries with large numbers of small and isolated settlements (such as Kazakhstan).
- · Policies on public versus private financing.

Even if countries A and B are somewhat noncomparable, if country A wants to emulate country B or is in competition with country B, it can be very effective to compare them to spur reform in country A. Politicians trying to reform a health or education system use such comparisons all the time to build a consensus that the country has to change.

Note 4. Problems with calculating incidence from primary household surveys

The calculation of incidence from primary household survey data is a moderately complicated task, with several methodological choices to be made. Minimum practice is to report average incidence by population quintiles or deciles based on a post-transfer welfare variable. Best practice involves marginal and possibly dynamic incidence analysis to complement the static average. More sophisticated counterfactual calculations for welfare, in the absence of the service or transfer, are also coming into play and are especially important for

social protection since these programs transfer money and thus directly affect the ranking of households. Demery (2003) provides a good basic explanation of some of the issues and concepts in incidence analysis and van de Walle (2003) a more advanced treatment of some of the methodological approaches.

The first step in incidence analysis is to construct a welfare measure. See Deaton and Zaidi (2002) for a detailed explanation of the issues involved in how to do this. The programs used to calculate consumption aggregates for two LSMS surveys, available at www.worldbank.org/lsms under tools for using household survey data, help demonstrate how to implement some of the ideas.

A decision must be made on how to rank households and what to assume about the impact on household welfare of the sectoral expenditure being analyzed. In the Bank's PER and sectoral analyses of health and education, the value of the health and education services received is usually not imputed or added to the measure of welfare used in ranking households. Such imputations are difficult and controversial. Moreover, there is a conceptual basis for keeping the welfare variable fully monetary and regarding the availability of services as separate dimensions of welfare. This is particularly important for social protection since the programs provide money income or close substitutes for it.

Most analysis of safety net programs, where transfers are usually both small and have low coverage, uses a post-transfer welfare variable directly from the survey. This implicitly assumes that the impact of receiving the transfer on welfare is zero. Much Bank work on pensions constructs a counterfactual welfare measure by subtracting the value of the transfer. This implicitly assumes that the full transfer is additional. It clearly is more conceptually correct to model what welfare would be in the absence of the transfer, since households presumably do change their work, savings or transfer behavior in response to government programs. However, the techniques for modeling a counter-factual are not fully standard and accepted practice yet. Van de Walle (2003) reviews the issue well. Three good cases to look at where such modeling was done are:

- van de Walle's 2002 assessment of Vietnam's safety nets.
- Tesliuc's assessment of the social protection interventions in the Kyrgyz Republic in chapter 8 of the Poverty Assessment (pertinent text is quoted in the social protection chapter).
- van de Walle, Ravallion and Gautam's 1994 assessment of Hungary's safety net.

Next, deciles or quintiles should be constructed. It is usually preferable, especially in the HD sectors, to construct them so that they contain the same

number of individuals, not households. Results can differ significantly, however, so if the work is to be compared to previous analyses it is important to use the same methods as in the previous analyses. The impact can be seen in table 1.

Table 1. Incidence of Lima's public health care utilization under alternative quintile definitions

	Poorest 1	2	3	4	Richest 5
Per capita household income					
Population quintiles	11	22	25	23	19
Household quintiles	29	18	25	15	13
Household quintiles					
Total household income	22	19	23	20	16
Per capita household income	29	18	25	15	13
Source: Grosh (1994).					

Most incidence work done stops at describing the incidence actually observed in a program, the average incidence. But those who are served or not served if the program is expanded or contracted may not be the same as those served on average. Thus the marginal incidence may be different from the average incidence. For example, networks for power and water often first serve the wealthier parts of a city and their average incidence may not look very propoor. But if they have already achieved fairly wide coverage and expanded it to the unserved poor, many of the newly served will be poor and the marginal incidence much more pro-poor than the average. Again, van de Walle (2003) provides a basic reference and primer on how to compute marginal incidence with single cross-section, repeated cross-section or panel data sets.

"Dynamic incidence" describes a case where deciles are based not on a household's current welfare but on how it has changed over time. It can be used to describe whether a program reaches those who have been most affected by an economic shock. An application is contained in the Kyrgyz Poverty Assessment, chapter 8, shown in the social protection chapter.

Once the calculations are made for a specific program, it is useful to compare them with benchmarks—either other programs in the same country that might be alternate uses of funds, or other programs around the world that give some idea of what common or "good" practice might be.

For benchmarking social assistance, Coady, Grosh and Hoddinott (2004) have the most comprehensive compilation of incidence of targeted transfers: 122 programs from 48 countries. For another very useful resource see Grosh, del Ninno, Tesliuc and Ouerghi (2008).

References and Resources

Chaudhury, Nazmul and Jeffrey Hammer. 2003. "Ghost Doctors: Absenteeism in Bangladeshi Health Centers." World Bank Policy Research Working Paper 3065, Washington, DC: World Bank.

Chu, Ke-Young and Richard Hemming (Eds.). 1992. *Public Expenditure Handbook*. Washington, DC: International Monetary Fund.

Coady, David, Margaret Grosh and John Hoddinott. 2004. <u>Targeting of Transfers in Developing Countries: Review of Experience and Lessons.</u> Washington, DC: World Bank.

Deaton, Angus and Salman Zaidi. 2002. "<u>Guidelines for Constructing Consumption Aggregates for Welfare Analysis</u>." Living Standards Measurement Study Working Paper 135. Washington, DC: World Bank, Washington.

Demery, Lionel. 2003. "Analyzing the Incidence of Public Spending." In F. Bourguignon and L. Pereira da Silva, eds., *Evaluating the Poverty and Distributional Impact of Economic Policies (Techniques and Tools).* Washington, DC: World Bank.

Grosh, Margaret, Carlo del Ninno, Emil Tesliuc, and Azedine Ouerghi. 2008. *For Protection and Promotion. The Design and Implementation of Effective Safety Nets.* Washington, DC: World Bank.

Grosh, Margaret. 1994. <u>Administering Targeted Social Programs in Latin America:</u> <u>From Platitudes to Practice</u>. Washington, DC: World Bank.

Savedoff, William, D. 2008. "Public Expenditure Tracing Surveys: Planning, Implementation and Uses", Mimeo, Washington, DC: Social Insight and World Bank.

Tesliuc, Emil. 2003. "Social Risk Management." Draft. Washington, DC: World Bank

van de Walle, Dominique. 2002. <u>The Static and Dynamic Incidence of Vietnam's Public Safety Net</u>. World Bank Policy Research Working Paper 2791. Washington, DC: World Bank.

van de Walle, Dominique. 2003. "<u>Behavioral Incidence Analysis of Public Spending and Social Programs</u>." In F. Bourguignon and L. Pereira da Silva, (Eds.), *Evaluating the Poverty and Distributional Impact of Economic Policies (Techniques and Tools)*. Washington, DC: World Bank.

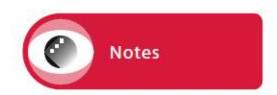
World Bank. 2003. *WDR 2004: Making Services Work for Poor People.* Oxford University Press and the World Bank.

Preparing PERs for Human Development

Specific Guidance for EDUCATION



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Development



Preface

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Checklists

It is important that this Education Guidance checklist be used in conjunction with the Core Guidance checklist. The latter checklist addresses cross-cutting issues, such as data sources and the selection and judicious interpretation of comparative data.

The guidance note given here is not to be taken as a minimum list where the authors must tick every sub-box. Every public expenditure review (PER) must be selective in what it covers, with the selection of topics based on many factors—what is needed to underpin the country dialogue, what is already known, what is feasible given constraints on time, data, funding, etc. This guidance note is meant to remind the analyst of the main features that might normally be included in the education chapter of a PER. It will often be decided to omit certain topics, but these decisions need to be made with some justification in mind. In addition to agreeing in the concept note on the planned coverage of topics, it may be useful to convey to the reader of the full report the reasons for excluding major themes.

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Notes

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Examples

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References and Resources

Examples of good PERs, useful websites, references and resources are contained in the unified bibliography at the end of the guidance. For the majority of documents contained in the bibliography, materials are available on the World Bank website or the internet.



After defining the boundaries of the education sector on which the PER will focus and assembling some contextual information, the following topics should be considered for inclusion in the PER. *The PER should judiciously use and interpret comparative data.*



TOPICS TO CONSIDER IN AN EDUCATION PER

- 1. How much is spent on education—and how much does government spend?
- 2. How does government finance?
- 3. What does government finance?
- 4. Does public spending protect equity?
- 5. Are public resources being used efficiently and effectively?
- 6. How much is enough? Is public spending adequate and sustainable?

1. Defining the Education Sector

The first task is to decide how you want to define the sector. The rough scale below shows increasingly inclusive definitions. Obviously, you can select a subset of domains—for example, just tertiary education and all publicly financed R&D (research and development), or just VET (vocational education and training). *The important point is to recognize that explicit choices have to be made and that whatever choice you make has pervasive implications for the work.* For example, if you decide that you want to look at VET, immediately you know that you must check for potentially significant private financing by employers and families and public financing sources in ministries other than education.

Narrowest				Broadest
Specific level of education (such as tertiary)	All education but no VET	All education plus VET if offered in secondary or post- secondary schools	All education plus all VET wherever offered	All formal and informal education plus publicly financed research and development

2. Context

- It can be useful to diagram the structure of the country's education system to understand how it is organized. Determine:
 - Levels of education by grade—some countries define primary education as grades 1–4, others as grades 1–6 or 1–8. Structure can affect the efficient use of inputs such as buildings or teachers.
 - Typical ages for each grade and level.
 - Flows between levels and types of education to show "pathways" that are open and closed to students. Allowable pathways usually have implications for equity, efficiency and learning outcomes. For example, students may not be allowed to enter university from an upper secondary vocational education program.
- A country's demographic structure and trends significantly affect costs and efficiency. Population data by single-year age groups—preferably for male, female and total between 0 and 29 years of age for the last five years and as projected for the next decade—will be useful.



3. How Much Is Spent and How Much Does Government Spend

■ How much is spent on education from all sources—public, private and donor and NGO expenditures? (Donor funding may be funneled through government or be off budget.)



- How much is spent on education from public sources? Be sure to:
 - Work with the consolidated budget (central government and local government budgets).
 - Check the budgets of all ministries that might have education expenditures for all types and levels of education addressed by the PER.

- o Check for off-budget expenditures.
- Work only with executed budgets for past fiscal years (because planned is not executed).
- Use real expenditures if you want to track annual percentage changes in the public funds flowing into the sector.



What are total public expenditures on education as a percent of GDP? Of total public expenditures?



■ Do public expenditures for education come out of general revenues or earmarked taxes?



■ How much is spent on education from private sources? What percentage of total expenditures are private expenditures?



What percentage of enrolled students by level of education are enrolled in private schools? What are private enrollment trends? What is state policy on private provision—e.g., does the state regulate access in any way, does it require private students to take the same examinations as public students? How bureaucratically easy or difficult is it for private providers to go into business? Does the state have policies to ease the access of current or potential private providers to capital?

Note 9

How dependent is government on donors to finance the sector—i.e., donor expenditures are what percentage of the country's total expenditures on education? Of recurrent expenditures? Of capital expenditures? What are the trends in these shares? What share of donor support is general budget support to the sector versus projectspecific support?



What is the executed public budget for education as a percentage of the planned public budget for education? Big gaps interfere with the sector's ability to plan meaningfully and take actions that entail future financial commitments, such as the procurement of goods and services.



Are there budget arrears in the sector? If so, in what expenditure categories? Do trend data show that the stock of arrears is going up or down?

4. How Does Government Finance?

- What are the intergovernmental financing arrangements for the sector?
- How is the public executed budget for education divided between the central and local governments?

Example 13

- If financing is split between the central and subnational levels, which levels of government pay for what? Local government may fund certain levels of education, such as preschool and basic education but not upper secondary education. They may fund certain inputs such as school maintenance but not capital expenditures.
- Are those who make decisions about local budgets for education either locally elected or accountable to those locally elected? Or are they appointed by and accountable to central government? In the latter case, decisionmaking has not been decentralized.
- If local governments have a financing role, do they have significant revenue-raising authority? In other words, is there true fiscal decentralization?

Note 11 Example 16

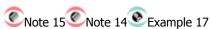
- Do local governments raise revenues, or are all taxes collected by the central government? If local governments collect revenues on behalf of the central government, are they allowed to retain any of them?
- Are there subventions or grants from the central government to local governments for financing education? If so:
 - Are these subventions earmarked for education—i.e., do they have to be spent on education? Or are they unconditional—i.e., local government

can spend its grant as it wishes and, in theory, can decide to use none of it on education?

- Do they come in a single tranche with one reporting requirement or in multiple tranches, possibly with multiple reporting requirements?
- o How are the subventions calculated?
- o Is there evidence of vertical imbalances?



 Is there evidence of horizontal fiscal imbalances? If so, do they emerge from locally variable fiscal resources or locally variable fiscal effort?



Do schools have their own budgets? Do they have any decisionmaking authority over how their budgets are spent? Are schools allowed to keep school-generated revenues—such as fees or revenues from entrepreneurial activities or the sale of products in vocational schools or the rental of school space? These questions assess how well accountability for and authority over resources are aligned.

5. What Does Government Finance?

Functional allocations

How are public expenditures for education allocated among levels of education—such as preschool or tertiary education? In other words, how much of the total goes to each level of education? How is donor financing allocated among educational levels?



What are the unit costs by level of education as a percentage of per capita GDP? Use cross-country data to identify anomalous ratios in per capita costs between levels of education.



Economic allocations

How are public expenditures for education allocated among the different inputs to service delivery by level of education? Again, look for anomalies e.g., is the wage bill crowding out the nonwage recurrent budget? How is donor financing allocated among inputs? Given government-financed allocations, could donor financing be used in a more balanced way?



On average, how much is available for routine maintenance per school? How adequate is this amount, compared with engineering estimates of the costs of routine maintenance for the average school? Given the government's textbook policy, how adequate is the amount spent per child on textbooks?

6. Do Public Policy and Public Spending Protect Equity?

How do school enrollment rates, completion rates and learning achievements vary by subgroup? Look for variations by gender, family income, residential location (region and urban versus rural locations) and ethnic or religious group. Learning outcomes can be unequal without indicating inequitable opportunities. But if outcomes are unequal, there is a question to answer.



A fundamental responsibility of the state is ensuring equity and handling redistribution. Public policy, including educational finance policy, can maximize or minimize subgroup differences in educational access and achievement. What role does the state play in mitigating or exacerbating differences in educational opportunities?

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Note 26 Example 23 Example 27 Example 28
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How progressive or regressive is the state's financing of education? By level of education? By province and within provinces? Answering these questions requires a benefits incidence analysis.

As an indicator of financial burden, what average percentage of consumption do families in different consumption quintiles cover in formal and informal payments for education? The demand response in countries that have abolished fees at the primary level (e.g., Malawi, Tanzania, Kenya, Uganda, Cameroon) is strong evidence that tuition fees curtail demand. However, as Kattan and Burnett (2004) point out, in addition to tuition fees, households frequently face a wide range of user fees for publicly provided primary education, including textbook fees or costs and rental payments, compulsory uniforms, parent-teacher association (PTA) dues, and various special fees such as exam fees and community contributions to district education boards. In many countries, private tutoring adds to the household costs of primary

education.



- Does the government need to establish financial incentives to increase families' demand for education? These may take the form of:
 - Cash transfers, conditional on families' keeping their children in school, as in Bangladesh, Mexico or Brazil.
 - A voucher program.
 - o A scholarship or student loan system.



- What are the government's criteria for education transfers or subsidies, such as scholarships and free textbooks? Is there targeting to certain income, gender or ethnic and religious groups? When educational merit is the basis, the subsidy or transfer will tend to favor wealthier families.
- Does the government subsidize private schools? What are the rules governing these subsidies? For example, what percent of the estimated per student cost for public schools does a subsidized private school receive? Can a private school receiving public subsidies also charge fees? Depending on how they are designed, public subsidies may implicitly subsidize the wealthy's preference for private education.

Note 27 Example 29

Are there corrupt practices that affect access, grades or graduation—e.g., bribes to university faculties to secure entry into a particular faculties, or parental "gifts" such as new computers to a school to gain entry to a prestigious secondary school? If so, how widespread are they? Has the state taken any actions to stop these practices? Does the state regulate the dubious practice of private lessons by the student's teachers or by teachers within the student's school? Bribes, gifts and private lessons penalize the poor.

Example 15 Example 30

What public policies govern progression through the educational system? If tertiary enrollments are rationed, examinations during the pre-tertiary years are often used to "weed" students out of the system. Pathways into tertiary education are highly restricted. Students may have had to complete the academic program at the upper secondary level, and access to this program may be highly restricted. These Revised May 2009

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policies favor wealthier families.

■ What actions other than financing does the government take to increase parental demand for education? If parents fear for their daughters' safety during travel to school, what does the government do? For families speaking a minority language, does the government offer instruction in that language? See Birdsall and others (2004) for public policies that can increase demand for education.

7. Are Public Resources Being Used Efficiently and Effectively?

- The ability of government, providers and beneficiaries to judge whether inputs are used efficiently and effectively depends on having information on the performance of the system that is publicly available, recent, reliable and relevant.
 - o Does government measure educational inputs, processes and outcomes?
 - Does government ever evaluate the success of initiatives relative to their goals (e.g., effects of a new curriculum on student learning outcomes or of providing school transport on families' demand for education)?
 - Does government ever try to estimate the cost-effectiveness of alternative policies (e.g., changing class size)?

Allocative efficiency: Is money being spent on the right things?

Can education goals be furthered more effectively by investing the marginal dollar in other sectors?



■ Should public spending be reallocated among levels of education? What are the employment and unemployment rates and wage returns to different levels of education?



Technical efficiency: Is money being spent efficiently given allocative decisions?

Are there variations in unit costs between subnational units or schools? Between public and private schools? Such data will not show why there are cost differences, but will establish that "there is a question to answer."



 Personnel policies and data show what the country is buying in the way of staff qualifications, at what price, and whether it is using staff efficiently.

 What is the basis for personnel decisions about teachers and school managers: merit, seniority or politics?



What are the ratios of teachers, students and non-teaching staff? How do these ratios compare with comparator countries and other benchmarks, such as in the Education For All Fast Track Initiative (EFA FTI) indicative framework?

- What is the distribution of teachers among levels of qualification? What percentage meet basic government standards?
- How are teachers used? What are their teaching loads relative to those in comparator countries? In which grades do the schools use a single teacher for the class? In which grades do they use teachers specialized by subject? Do specialized teachers teach only one subject or two or more closely related subjects?
- Holding annual hours of work constant, what does the average teacher cost per year relative to the average wage for a public sector technocrat?
 Relative to GDP per capita? Relative to wages for those with qualifications similar to those for teachers?

Note 33

■ What are the cost implications of the curriculum? A large number of subjects for each grade costs more in terms of textbooks and makes it hard to realize economies of scale for specialized teachers. It also seems to affect what is learned. A large number of subjects encourages a mechanical pedagogy (e.g., memorization) because an over-crowded curriculum makes project-focused and in-depth investigation of topics virtually impossible.

Example 35

- How efficiently is capital used?
 - What criteria are used to decide when to build a new school and where to build it? (Look for the use of school mapping databases for making these decisions.)
 - Are there construction standards? In countries with cold winters, do these standards conserve energy? Has the government done any analysis of tradeoffs (maintenance costs, earthquake protection) between alternative standards?

- What is the average unit cost of building a classroom? Do unit costs vary significantly across the country? How does the average cost compare with average unit costs in other countries?
- What is the average maintenance budget for a school, and how does it compare with engineering estimates of the costs of routine maintenance for the average school?
- Are transparent and proper procurement procedures used to contract for new construction, major repairs and textbooks? Is there any evidence about corruption in procurement and data for estimating its magnitude?

©Note 34

- What is the average student/classroom ratio by level of education for rural and urban schools?
- What is the distribution of student/school ratios? For example, what percentage of schools have student/school ratios that are between 50 and 99 students per school? Between 100 and 199?
- o What percentage of schools run double shifts? Triple shifts?
- What do the trends in the school-age population imply about the inputs required now and in future? If the population is trending down, do trend data on the teaching force and facility use indicate that the government is downsizing inputs into the system—for example, reducing the number of teachers, closing schools or classrooms? What do the demographic projections imply for the challenges ahead for the government?

Example 34

■ If the government plans to introduce a cost-saving policy or a policy that adds significantly to costs, such as introducing computer-assisted instruction or decreasing class size, can you estimate the policy's marginal effect on outcomes relative to costs? (See chapters 4 and 9 in Mingat, Tan, and Sosale (2003) for examples of how to calculate the cost-effectiveness of a policy.)

Internal efficiency: What are the social and private costs of repetition and dropout rates?

■ What are the repetition rates at different levels? What are the dropout rates?



■ What are the social and private costs of the repetition and dropout rates at different levels of the education system? (See chapter 9, p.

224 in Mingat, Tan, and Sosale (2003) for examples of how to calculate these costs.)

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External efficiency: Do schools focus on the skills and knowledge needed by employers?

- This question can be evaluated by triangulating several sources of data and analyses:
 - Tracer studies of graduates.
 - Analysis of relationships between years and type of education completed and labor force participation, employment and unemployment rates.
 - o Analysis of rates of return to different amounts and types of education.
 - Qualitative interviews with business associations and employers in broadly different industries.



Are there measures of system performance?

■ International evidence shows a low correlation between public spending on education and educational outcomes. Look for information on the performance of the system.



- What are unit costs as a percentage of GDP per capita for different levels of education for public and private schools and relative to comparators?
- o Is the money spent actually reaching the point of service delivery?
- Are providers actually providing services? Do teachers show up at school?

Example 42

• What are students' outcomes in public and private schools—their enrollment rates, completion rates, learning outcomes, transition rates between levels of education and post-graduation employment and wages?



 In a graph of unit costs as a percentage of GDP per capita relative to performance on regional or international learning assessments (see Note 20), how productive is the system relative to regional neighbors or other comparators? Revised May 2009 16

8. Bottom Line: How Much Is Enough? Is Public Spending Adequate and Sustainable?

How much is enough?

- In the short term? This is a judgment call, informed by analyses of the previous topics. What is now being spent? Can resources be used more efficiently? Are the resources available reaching the point of service delivery? Are there arrears in the sector? Is there evidence of not enough money to fund basic inputs—such as school maintenance or learning materials that complement teachers?
- In the medium and longer term? Starting with how much is needed now, what happens to costs given:
 - The government's sectoral goals that affect costs—e.g., implementing PRSP goals to expand educational access for the poor, participating or planning to participate in EFA FTI, extending the length of compulsory education, introducing cost recovery for tertiary education, improving educational quality by hiring better educated teachers, expanding VET, retrofitting facilities to protect against earthquakes.
 - o Demographic projections for the school age population?



What can be afforded?

■ If at all possible, do some simple modeling to assess the joint implications of projected costs and revenues and thus the realism of the government's plans for the sector. Be sure to work closely with the country economist or the macroeconomist on the PER team. The existence of a reasonable medium-term expenditure framework makes this task easier.



■ Factor in:

- The costs of the government's medium-term plans for the sector (see last section).
- Expected changes in intersectoral allocations as a result of government's relative priorities among the sectors.
- o Arrears in the sector.
- o The projected macroeconomic framework.



9. Recommendations





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Note 1. Using and interpreting comparative data

One of the most important contributions of a PER is to estimate "how much is enough." When are expenditures "too much," "too little," or "about right"? There are three sources of benchmarks to guide these judgments:

- Empirical literature that relates policies in the sector to the outcomes desired, such as enrollment rates, completion rates and learning achievements.
- Comparisons with other countries in some way "like" the country in question.
- Country-specific standards.

Empirical literature. Empirical studies, especially those that relate inputs to outcomes, are useful guides. For example, the Program for International Student Assessment (PISA), conducted by the OECD, found that a student/teacher ratio of 25:1 was optimal in terms of learning outcomes for 15-year-olds. This result implies that most countries have inefficient student/teacher ratios—too low (e.g., most OECD and ECA countries) or too high (e.g., most countries in Africa). However, such studies have two problems. There is often no critical mass of studies that can be used to check for consistent findings about relationships between particular inputs and outcomes of interest. Second, there is the "unmeasured variable problem." Country-specific factors that may or may not be represented in completed studies can alter the relationships between inputs and outcomes.

Comparisons with other countries. Comparisons with other countries have other problems. For example, in the Bank it is very common to compare the percentage of GDP or total public expenditures devoted to the social sector to that devoted by countries "comparable" in some way—because they are regional neighbors or in terms of per capita GDP, for example. There are two problems. One is that regional neighbors may share the same difficulties as the country in question. For example, countries of the former Soviet Union had the same inefficient input norms. The second problem is that countries differ in several factors that significantly affect total expenditures in the sector, such as variations in:

- Number and nature of service beneficiaries—e.g., the number of families
 that need social assistance, the share of the population that is older and
 in greater need of medical services for non-communicable diseases or
 the number and enrollment rates of school age children whose education
 has to be financed.
- o Prices for key inputs, such as doctors or teachers.
- o Residential patterns that determine opportunities for economies of

scale—all else being equal, it costs more to provide health care or education in countries with large numbers of small and isolated settlements (e.g., Kazakhstan).

Policies on public versus private financing.

Country-specific standards. The final and ultimately preferable option for judging how much is enough is to develop benchmarks for the country itself. This means triangulating the fiscal implications of the country's goals for the sector, its demographic patterns, the evidence on the equity and the allocative and technical efficiency of expenditures, and measures of sectoral outcomes.

Especially in fiscally decentralized systems, comparisons of recurrent expenditure patterns among local governments can be used to establish efficiency benchmarks. More factors that affect technical efficiency are held constant within a country than between countries. Thus, the PER, *Brazil Municipal Education Resources, Incentives and Results,* used Data Envelopment Analysis (DEA) to estimate the efficiency frontier and efficiency scores for municipalities below the frontier, controlling for the municipalities' per capita income and population size. This technique lets the task team identify municipalities able to extract much better outcomes for the same level of inputs than other municipalities—i.e., identify efficiency possibilities.

A useful reference for DEA is Sutherland, Price, Journard, and Nicq (2007) "Performance Indicators for Public Spending Efficiency in Primary and Secondary Education" and the website http://www.deazone.com. Another method for estimating public expenditure efficiency is stochastic frontier analysis, which can be done in stata. For a good reference see Kumbhakar and Knox Lovell (2000) Stochastic Frontier Analysis. Two caveats: first, this type of efficiency analysis is generally more appropriate in middle-income countries than low-income countries given data requirements, and second, it should not be a mechanical process, rather careful consideration of how the education system works is needed to obtain meaningful results (Example 2).

Note 2. Estimating school-age populations

Determine the date of the last population census for the country and the views of the Bank's country office and country team of its quality. Be alert to the fact that war, migration into or out of the country, and changes in total fertility rates can significantly—and quickly—alter total population and its age structure. (Example 3) *Always* check with the population experts in HDNHE (Human Development Network—Health) on population estimates and projections for the country, using HDNHE's estimates when other data sources are flawed. If

census data are available only by five-year age groups, ask HDNHE for accepted practice in estimating the population for single age groups. For additional data checks the U.S. Census Bureau International Database at http://www.census.gov/ipc/www/idb and the UN Population Database at http://esa.un.org/unpp provide population data in five-year intervals.

Note 3. Finding "hidden" or off-budget expenditures

To estimate total public expenditures for education double-check these issues:

- Are you working with the consolidated budget? All expenditures may come out of the centralized budget. However, if the country has delegated functions to subnational units, the budget required to discharge these functions may show up in local budgets. If the sector has decentralized financing, expenditures will show up in both central and local budgets that the government may or may not consolidate into a single budget (Example 13 and Example 17).
- Have you checked the budgets of all ministries that might have education expenditures? Deciding which expenditures should be included requires prior decisions about the scope of the PER. These decisions should alert you to having to cast a broader or narrower net. Most expenditures for most education services will show up in the ministry of education budget. However, especially if the PER includes all vocational and technical training, some may sit in budgets for other ministries, such as the ministry of labor, a ministry of culture, the ministry that handles social assistance (e.g. budget for adult literacy programs), or a ministry for youth and sports. The ministry of health may fund advanced professional training for doctors.
- Be on the alert for off-budget as well as budgeted expenditures. In the education sector, donor grants and loans are the most likely source of off-budget expenditures. If they are off-budget, the World Bank's Resident Mission should have information on these sources. They may be minor—or huge. For example, donor grants are off-budget in Armenia. In 2001 the grants for education were 17 percent of final education expenditures, 2 percent of total public expenditures and 0.5 percent of GDP.
- Work with executed budgets, or if the budget is still being implemented, the latest planned budget. Countries differ in the relationship between their planned and their executed budgets for the sector, with some running significant differences between the two (
- Example 4).
- If you need highly current information on the government's fiscal behaviors in the education sector, check with the IMF or Resident Mission for information

- on "mid-year corrections" in planned budgets.
- o If you want to show the annual percentage change in the amount of money flowing into the sector, be sure to convert nominal into real expenditures, using the IMF's deflators for each year in the series. Under conditions of high inflation, the difference between nominal and real changes in public expenditures can be huge (Example 10 and Example 11).

Note 4. GDP, total public expenditures and public expenditures on education

- Be sure to obtain comparator information on the relationships among GDP, total public expenditures and public expenditures on education. OECD's Education at a Glance reports them for OECD countries and for countries in the World Development Indicators program (Argentina, Brazil, Chile, China, India, Indonesia, Jordan, Malaysia, the Philippines, the Russian Federation and Thailand). Whatever database is used, treat it with caution, checking for non-comparabilities in definitions of variables and estimation techniques. Note 1 (also see the core guidance) discusses problems with making inferences from cross-country comparisons.
- o If total public expenditures are a small share of GDP, education expenditures can easily be a small share of GDP and a large share of total public expenditures. For example, it looks as though Croatia and Poland make similar fiscal efforts in education and that Armenia makes significantly less (education public expenditure [EPE] as a percentage of GDP). In fact, however, Armenia makes more of a fiscal effort than Croatia, and Poland makes significantly more effort than Croatia (EPE as a percentage of total public expenditure [TPE]). The reason is the inter-country variations in the government's "take" from GDP (TPE as a percentage of GDP).

	TPE as % GDP	EPE as % GDP	EPE as %TPE
Croatia	49.4	4.7	8.6
Poland	34.5	5.0	14.5
Armenia	25.0	2.9	11.8

Note 5. Average versus actual cost of education

The difference between the average and annual cost of a student completing an education cycle is sometimes significant, generally due to high repetition rates. See Example 8.

Note 6. Earmarked taxes

In general, earmarked taxes are less desirable because they limit the fiscal

flexibility of government.

Note 7. Payments from households and enterprises

- Check households and enterprises as sources of private payments (Example 14). The former can be very large, depending on the country. The latter may be so minor that they can be ignored.
- For households, estimate total annual payments for both public and private educational services by level of education. Private payments for public services reflect the government's cost recovery policies. Include both formal and informal payments.
- Household survey data are usually required to estimate private payments for public or private services, especially when these payments are informal.

Table 3.15: Private Spending per Student by Income Quintile as a Percent of Annual Household Income

OI IIIII III	of filliant flousthold flicolite						
	Total	Public					
Primary							
Q.I	7.6	6.9					
Q.II	2.7	2.3					
Q.III	2.0	1.8					
Q.IV	1.9	1.5					
Q.V	2.0	0.6					
Tota1	1.9	1.0					
Secondary							
Q.I	69.1	47.5					
Q.II	17.8	14.9					
Q.III	10.9	7.7					
Q.IV	7.1	4.7					
Q.V	4.0	1.8					
Total	8.6	4.7					

Source: ENCOVI, 2000.

Source: Guatemala Public Expenditure Review 2005, Report No. 32376.

Table 5.2: Bangladesh—Education expenditure per student, 2000 (US\$ per year)

	Public	Private (households)
Primary	13	13
Secondary	27	73
Tertiary	155	151

Source PMED and MOE data for public, HIES 2000 for private expenditures.

Source: Bangladesh Public Expenditure Review 2003, Report No. 24370-BD.

Note 8. Private payments and equity problems

When private payments constitute a significant share of total expenditures on education there is almost always a significant equity problem (Example 14).

Note 9. Private Sector Development database

The Private Sector Development unit maintains the Doing Business Database for 178 countries that can be used to examine the effect of public policy on private provision of educational services. It has data on the costs of starting a business (such as the number of steps), hiring and firing workers, enforcing contracts, getting credit and closing a business. Website: http://www.doingbusiness.org/

Note 10. Sustainability of donor expenditures

If donor expenditures constitute a significant share of total expenditures on education, the potential for sustainability problems has to be assessed.

Education expenditure sources - Malawi

191. Total education expenditure by government and donors was USD127 million in 2003/04. Recurrent expenditure was USD9 1 million (all government) and development expenditure USD36 million (98 percent donors, 2 percent government; Table 3.4). The donors' share of total education expenditure was 28 percent in 2003/04; excluding external assistance on the government recurrent budget (budget support). Spending on education was up more than USD4 million compared to the previous year, 2002103; due to increased government expenditure.

192. Households contribute another USD30 million to education, mostly at primary and secondary levels. According to IHS2 respondents, households contribute about USD4 per child in primary to pay for learning materials, school maintenance, etc. Total household expenditure for primary education can thus be estimated to be around USD13 million for 2003/04. Households reported spending on average USD77 per student in secondary education; or USD14 million in total. Higher education has the least cost sharing with parents, as tuition for regular students is fully sponsored by the government. A small, but growing share of university students in "parallel" programs do pay fees and organize own accommodation, however.

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Table 3.4 Government and external education recurrent and development expenditure in 2003/04 (USD, Million)

	Adminis tration	Prim- ary ¹	Secon- dary ^l	Teach.	Univers ities ²	Other subv. org. ³	Total	Percent
Recurrent expenditure								
Government	8.0	46.1	14.7	2.1	16.2	4.1	91.2	100
Percentage	8.8	50.5	76.5	2	2.3	4.5	100	
Development expendito	ure							
Government	0.1	-	0.6	-	-	-	0.7	2
Donors, incl. bilateral	2.7	27.4	4.0	1.4	-	-	35.4	98
Total	2.7	27.4	4.6	1.4	-	-	36.1	100
Percentage	8	76	13	4	0	0	100	
Total expenditure								
Government	8.1	46.1	15.3	2.1	16.2	4.1	91.9	72
Donors, incl. bilateral	2.7	27.4	4.0	1.4	-	-	35.4	28
Total	10.7	73.5	19.3	3.5	16.2	4.1	127.3	100
Percentage	8	58	15	4	12	2	100	_

Source: Annual Appropriations Account. Donor expenditure is from the DFID donor disbursement survey 2004. Notes: 1. The estimated wage bill for approx. 4100 primary teachers who teach at secondary schools is included under Secondary, even though it appears under Primary in government accounts. 2. The university tuition loan scheme is included under Universities, even though it appears under Secondary education in government accounts. 3. The organizations are: MIE, NLS, National UNESCO Commission, and MANEB.

Source: Malawi Public Expenditures Review 2007, 40145-MW.

Note 11. Decentralization and block grants

For more information on decentralization, including school-based management, visit http://go.worldbank.org/6YJ412AQY0 and http://go.worldbank.org/9EX3ZU6O90

Under some conditions block grants can operate similarly to own-source revenue in terms of their effects on the efficiency of sectoral spending. The four conditions are that local governments: are funded through block grants; are accountable to their citizens for the spending more than to higher tiers of government; have open and efficient budgeting processes—budgeting is contested but rational (populism and technocratic rationality have to go together); and have good, standardized metrics of performance so that citizens can compare one local government against another. What these arrangements do not do is generate a sense of overall fiscal economy. Local governments have an incentive for overall tax rates to be high because essentially they see themselves as free-riding on the national fiscal sources.

Note 12. Presence of multiple tranches

Multiple tranches usually signal that upper-tier government agencies are engaged in turf fights among themselves or do not trust (or pretend not to trust) lower-tier government agencies. Multiple tranches make it difficult for lower-tier agencies to set spending priorities because their revenue streams are uncertain. Different reporting requirements by multiple upper-tier funders

increase transaction costs for lower-tier agencies.

Note 13. Design of funding formulas

Is the formula simple and transparent, or complex and therefore more subject to political manipulation? Does it take into account basic variations in the local costs of providing services? Cities have higher labor costs. Rural areas are less able to realize economies of scale.

Note 14. Subventions from central to local government

Do subventions for education from the central government to local governments fall significantly short of the local costs of providing services and inputs? If so, how do local governments cope with the shortfalls? Look for underfunded inputs (school maintenance, learning materials), the use of locally raised resources to fill the gap and cost recovery from families. If vertical imbalances seem to be a serious problem, consider recommending something like the Australian Commonwealth Grants Commission. The commission was established as an independent arbiter between the Commonwealth and the states to assess claims by states for financial assistance (special grants) under section 96 of the constitution. The commission assumed the task of defining per capita relativities, its advice based on fiscal equalization: "each State should be given the capacity to provide the average standard of State-type public services, assuming it does so at an average level of operational efficiency and makes an average effort to raise revenues from its own sources." Although the commission's findings have not always received unqualified support from the states and territories, the commission's technical competence, impartiality and objectivity are recognized broadly and seen to rationalize the conduct of intergovernmental financial relations.

Note 15. Funds available to local governments

Do local governments differ in the amount of money that they have available or choose to make available per student for educational services? Calculate the per student funding provided by the central government for each local government. Look for data that tell you how local governments spend their unconditional grants or their locally generated revenues (Example 13).

Note 16. Level-specific funding

Calculate level-specific shares by dividing the amount going to each level by the total allocated to all levels of education *net* of amounts going to the ministry of education and other purely administrative costs.

Note 17. Public expenditure ratios by school level

See chapter 3 on calculating unit costs in Mingat, Tan, and Sosale (2003). In general, divide the total public expenditures for a level of education by the total number of students enrolled in that level. The average OECD ratios are not a bad guide. Relative to the per student expenditure for primary education, the average OECD country spent 0.91 per student for preschool in 2001, 1.29 per student for lower secondary education, 1.34 per student for upper secondary education and 2.30 per student for tertiary education.

Note 18. Necessary data

At a minimum, obtain data on:

- o Recurrent versus capital expenditures.
- o Within the recurrent category, staff costs versus non-staff costs.
- If possible, within overall staff costs, the breakdown between teachers and non-teaching staff.
- If possible, within non-staff recurrent costs, the breakdown for maintenance, utilities, textbooks and so on.

Note 19. Useful data sources

- Household surveys. These surveys usually collect data on enrollments by level
 of education, ages (needed to calculate net enrollment rates) and gender of
 children, residential location of the household (rural or urban, province) and
 completion of different levels of education. For Living Standards
 Measurement Survey (LSMS) see http://go.worldbank.org/IPLXWMCNJO and
 for household surveys for LAC see
 - http://www.depeco.econo.unlp.edu.ar/cedlas/sedlac/default.html
- Special studies. Sometimes household surveys have information on membership in ethnic or religious groups, but if not, check for special studies on minorities conducted by NGOs, UNICEF or other donor groups to look at enrollments.
- Educational Attainment and Enrollment Around the World. This database currently covers typically low-income countries with a Demographic and Health Survey (DHS). It will be expanded to countries with a Multiple Indicator Cluster Survey (MICS, sponsored by UNICEF) as well as an ad-hoc collection of countries with a National Socioeconomic Survey or a LSMS survey. The website is updated fairly regularly, but the rate depends on the release of new household survey data. See

http://www.worldbank.org/research/projects/edattain/edattain.htm for LAC see http://websie.eclac.cl/sisgen/ConsultaIntegrada.asp?idAplicacion=1

Note 20. ADePT education module

The ADePT education tool soon to be available on the World Bank HD education website extracts common education indicators from micro-level survey data, including DHS, and presents them in print-ready format.

Note 21. Estimating school enrollment rates

- Look at both net and gross rates and ideally at the histograms of enrollment by age and by grade. A line chart of enrollment on the y-axis and age on the x-axis, with different lines for different grades, is a useful way to understand what is going on. If sample sizes permit, such a chart can be created for each consumption quintile.
- o Gross rates simply measure participation, calculated by dividing the number of students enrolled in a given level of education by the number in the population of the ages intended for that level. A number of overage or underage children in a given level of education can produce enrollment rates that exceed 100 percent.
- Net rates measure participation at the "appropriate" ages and are calculated by dividing the number of students enrolled in a given level of education who fall within the age range intended for that level by the number in the population of the ages intended for that level. Net rates are particularly important for countries, such as many Latin American countries, that have high repetition rates, since repetition increases the number of "out of expected age range" students.
- Using different indicators of parental socioeconomic status—such as consumption quintile/decile or mother's and father's education, calculate the net and gross enrollment rates and completion rates for children whose families differ in resources (see Example 36 and Example 37).

Note 22. Relating learning outcomes to consumption quintiles

o If country-specific learning assessments do not collect data that let you relate learning outcomes to consumption quintiles, there is a simple expedient. Many countries now have geographically based poverty maps for districts or municipalities. Many countries can map schools to municipalities, allowing learning assessment data by schools to be cross-linked to the geographic poverty database and yielding at least a proxy for learning achievements by consumption group.

- In addition to national assessments of learning outcomes, check to see whether the country has participated in any of the *international or regional learning assessments*. These assessments usually measure gender and characteristics of the home that can proxy for socioeconomic status and sometimes other characteristics that indicate subgroup membership. These assessments include:
 - Progress in International Literacy Study (PIRLS) applied in 2001 and 2006: http://timss.bc.edu/pirls2006/intl_rpt.html
 - Program for International Student Assessment (PISA) applied in 2001 and 2006:
 - http://www.oecd.org/document/2/0,3343,en_32252351_32236191_3971 8850_1_1_1_1_1,00&en-USS_01DBC.html
 - Third International Mathematics and Science Survey (TIMSS) applied in 1995, 1999, and 2003:
 - http://timss.bc.edu/timss2003i/userguide.html
 - OECD's International Adult Literacy Survey (IALS).
 - Laboratorio Latinoamericano de Evaluación de Calidad de la Educación (LLECE), or Latin American Laboratory for Evaluating the Quality of Education applied in 1997;
 - Monitoring Learning Achievement (MLA) applied in various years, mostly in African countries;
 - Southern Africa Consortium for Monitoring of Education Quality (SACMEQ) applied in 1995, 1999, and 2000-2002: http://www.sacmeq.org/links.htm
 - Programme d'Analyse des Systèmes Educatifs des Pays de la CONFEMEN
 (PASEC), or Programme of Analysis of Education Systems of
 CONFEMEN countries (i.e. conference of ministers of education of
 countries sharing the French language) applied over the period 1996–
 2001;

Note 23. Minimum and best practices for calculating incidence

- See Mingat, Tan, and Sosale (2003), chapter 7, for a general discussion of calculating the distribution of public subsidies for education.
- The calculation of incidence from primary household survey data is a moderately complicated task, with several methodological choices. Minimum practice is to report average public education financing per child or per household by household consumption quintile or decile. The programs used to calculate consumption aggregates for two LSMS surveys are available online at http://go.worldbank.org/IPLXWMCNJO under Tools for Using Household Survey Data. They help demonstrate how to implement some of

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- the ideas. See Example 24 and Example 25.
- o Best practice involves more sophisticated analyses. Calculating subnational variations in per child spending by poverty quintile or decile is much more meaningful than using national averages. And marginal and possibly dynamic incidence analysis complements the static average. Demery (2003) provides a good basic explanation of some of the issues and concepts in incidence analysis; van de Walle (2003) offers a more advanced treatment of some of the methodological approaches.
- o Information on how to calculate incidence for the health sector but also useful for education is provided in O'Donnell, van Doorslaer, Wagstaff, and Lindelow (2007) *Analyzing Health Equity Using Household Survey Data. A Guide to Techniques and Their Implementation*, available at http://go.worldbank.org/LVSSZJX9O0. Excellent instructions on how to compute concentration indices and benefit incidence are provided in electronic versions of the chapters, which can be downloaded together with customizable "do" files for use in Stata.

Note 24. Excluded groups

There has been impressive progress in bringing girls into primary school over the last few decades but significant disparities still exist. These largely stem from the lagging enrollment of excluded groups, for instance, rural tribes in Pakistan, lower castes in India, Roma in Europe, and indigenous peoples in Latin America (Lewis and Lockheed 2007). For a useful overview of the issue of excluded groups in education see Lewis and Lockheed (2007) Inexcusable Absence: Why 60 Million Girls Still Aren't In School and What to do About It available at http://www.cgdev.org/content/publications/detail/11898/. For in-depth country analyses see Lewis and Lockheed (Eds.) 2007 Exclusion, Gender and Education: Case Studies from the Developing World available http://www.cgdev.org/content/publications/detail/14466. See also Hall and Patrinos (Eds.) (2006) Indigenous Peoples, Poverty and Human Development in Latin America for more on exclusion in education in Latin America.

Note 25. Private and informal payments

- A survey of user fees in 79 World Bank client countries was conducted in 2001. Only two (Algeria and Uruguay) did not have fees of any type, while another eight allowed only PTA or community contributions. Fees for textbooks or compulsory uniforms existed in about half the countries. Tuition fees were collected in almost 40 percent of countries.
- \circ As Bentaouet Kattan and Burnett (2004) point out, the burden on households

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as a result of fee payments is significant. The poorer the family, the greater the burden of education spending. In Thailand, for instance, poor households spend 47 percent of their consumption on education while the average for all households is 16 percent.

Table 2
Household Expenditures on Primary Education as a Percentage of
Household Spending

		All Households	Poorest Quintile
ECA	Bulgaria	24	36
	Macedonia	13	17
East Asia	China	19	29
	Indonesia	17	17
	Mongolia	6	8
	Thailand	16	47
	Vietnam	12	22
South Asia	a Nepal	16	29

Source: Kattan and Burnett (2004), based on data from the World Bank's User Fee Survey, 2001, and Mark Bray, *Counting the Full Cost: Parental and Community Financing of Education in East Asia,* World Bank, 1996.

o Informal payments in education are charges for education services or supplies that are meant to be provided for free, or paid "under-the-table" directly to public officials or teachers to obtain specific favors. These are generally measured as the fraction of survey respondents reporting that they made payments to a public education entity for education services intended to be free of charge. Household surveys and perception surveys of citizens and public officials are the most common sources of information. More detailed surveys may also include the average value of payments made, to whom they were paid, and for what specific service. Types of informal payments include but are not restricted to payments for admission, advancement, preferential access to resources, and specific grades. Data on informal payments in education are increasingly being collected but household surveys vary in whether, and how well, they measure informal payments (Lewis and Pettersson 2009). See Example 15 and Example 30.

Note 26. Conditional cash transfers

Conditional cash transfers are increasingly used as a means to strengthen demand for education. A comprehensive overview and discussion of the issues involved, including the design and implementation of CCT programs, is provided in Fiszbein and Schady with Ferreira, Grosh, Keleher, Olinto, and Skoufias (2009) *Conditional Cash Transfers. Reducing Present and Future Poverty*, available at http://imagebank.worldbank.org/servlet/WDS IBank Servlet?pcont=details&men

uPK=64154159&searchMenuPK=64154240&theSitePK=501889&eid=000334955 20090227075314&siteName=IMAGEBANK.

Note 27. Public funding of non-public schools

There is no obvious efficiency rationale for fully funding non-public schools unless it can be shown that non-public schools achieve better outcomes than public schools. Paying the full unit cost saves the state nothing, but partial subsidies can create incentives for private provision that save the state money because it does not have to pay the full cost of educating the child.

Note 28. Improving education by investing in other sectors

A determinants analysis of parental demand for education that includes measures of variables from other sectors can give some insight into this question. Brenneman and Kerf (2002) report the education effects of investments in infrastructure (energy, information and communication technology, transport, and water and sanitation). For example, electricity has significant effects on the percentage of children who read and work on their studies at night. In Morocco, an improved rural road system resulted in an enrollment increase in the affected area from 28 percent to 68 percent, with female enrollment tripling. In several African countries access to piped water increased enrollment between 2 and 16 percent, depending on country, by releasing children from the work of fetching water and allowing them to use that time in school.

Note 29. Measuring labor force participation from surveys

It is preferable to answer these questions, especially in countries with a large informal economy, using data from a labor force or household survey that measures labor force participation, wages and income. Sometimes tracer studies of graduates exist.

Note 30. Challenges of Data Envelopment Analysis

The public expenditure review, *Brazil Municipal Education Resources, Incentives and Results,* used data envelopment analysis to estimate the efficiency frontier and efficiency scores for municipalities below the frontier, controlling for the municipalities' per capita income and population (also see Note 1 and Example 2). This technique let the task team identify the municipalities that were able to extract better outcomes for the same level of inputs than other municipalities—that is, to identify potential efficiency gains. The analytical challenge is to estimate how much of the variation is natural (not correctable) and how much is correctable. Arriving at such estimates requires some reasonable benchmarks,

based on studies, for the amount of variation that one would expect in a well-managed system. The data requirements for DEA are demanding so the method will not be suitable for all countries.

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Note 31. Personnel decisions about teachers and managers

How are teachers selected into the teacher corps? How are school managers selected? How are teachers deployed to more desirable or less desirable schools, such as isolated rural schools? See Example 19.

Note 32. Ratios of students and staff within schools

On average, what are student/teacher ratios? In rural schools? In urban schools? What are the teacher/non-teaching staff ratios? If the sector seems overstaffed, get data on projected retirements from the teaching force or the civil service over the next five years to see whether natural attrition will address the problem. See Example 21 and Example 33.

Note 33. Labor market survey analysis

Data from a labor force or household survey can be used to compare wages among public servants and between similarly qualified individuals in the private and public sectors. The *Morocco Public Expenditure Review 2002* has a good example of such analysis. Also see the discussion of the economics of teacher pay in Mingat, Tan, and Sosale (2003), chapter 6, p. 124.

Note 34. Procurement projects and audits

Check the Bank's *Country Procurement Assessment Review* and any procurement audits for the country or for specific projects.

Note 35. Measuring repetition and dropout rates

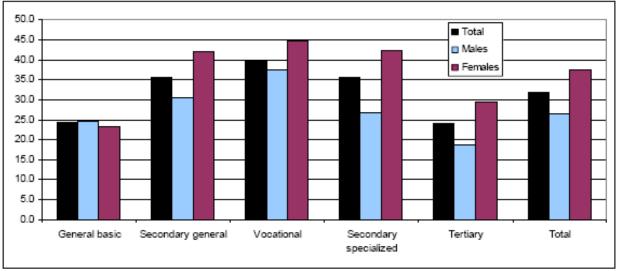
Estimate student flow profiles by grade. See chapter 2 in Mingat, Tan, and Sosale (2003) for how to set up this analysis. Household surveys such as the LSMS usually measure dropout rates within an age group more reliably than public data. Administrative data usually calculate the number of dropouts as those individuals that neither transition to the next grade nor are repeaters. But the literature shows that repetition is systematically underestimated, producing overestimates of dropout rates. Significant internal or external migration also poses measurement problems. Students who move are counted as dropouts from their school of origin, but this does not mean that they do not re-enroll in a school at their new destination.

Note 36. Analysis of data on recent graduates

Employment and wage data for recent graduates are often used to shed light on this question. But be aware that these data reflect supply-demand interactions, not necessarily the adequacy of the skills developed by the educational system (Example 38).

Figure 1: The more educated, the better chances to be employed (Unemployment rate by level of education, Percent)

50.0



Source: World Bank (2007b), Figure 2.19 (Original: NSS 2005b, 2004 LFS). *Source:* Armenia Programmatic Public Expenditure 2008. Education and Social Transfers.

Note 37. Factors that undermine the effect of spending on outcomes

Several factors can undermine the relationship between education spending and outcomes (see Example 39):

- Technical inefficiencies. Check Bruns, Mingat, and Rakatomalala (2003) for cost drivers, such as class size, teacher salaries, or the use of non-teaching staff. Does the sector purchase the right inputs—i.e., ones that drive outcomes—in the right amounts? For example, government may buy inputs that have little relationship to outcomes, such as expensive buses. It may fail to buy inputs that leverage outcomes, such as paying teachers enough to attract adequately qualified individuals. It may buy more of a particular input than is needed to produce good outcomes, such as too many teachers or too many schools.
- Poor governance. See Lewis and Pettersson (2009) for a discussion of the importance of good governance for effective education spending and sector performance, including leakages (also see below) and provider performance.

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The money spent does not reach the point of service delivery (also see Note 38). If money flows through multiple layers of government to the point of service delivery, has government measured the flow to assess diversion? Public expenditure tracking surveys (PETS) are designed to follow the flow of money through different tiers of government and frontline service facilities to their ultimate intended beneficiary, such as poor families, schools or clinics. They track the diversion of public funds as they flow through the different levels of government. Website: http://go.worldbank.org/HSQUS4IS20

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Service providers shirk—for example, teachers do not show up to teach. Quantitative service delivery surveys (QSDS) are appropriate for measuring this issue. Schools are the main unit of analysis, with the QSDS assessing the service delivery system (inputs, outputs), provider behavior, accountability arrangements and performance measurements in service delivery and providing baselines for examining the impact of policy and institutional reforms (see Example 42). Website: http://go.worldbank.org/HSQUS4IS20

Note 38. Diversion of public funds

In some countries a large share of education funding never reaches its destination. This has important implications for the analysis of the effectiveness of public education expenditures. Figure 1 displays potential fund diversion points in the education system.

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Level and Recorded Information Potential Diversion Budgeted Policy Changes Level 1 **Authorized** Diversion, Theft, Administration Disbursed Diversion Inflow Diversion, Theft, Administration Level 2 Outflow Diversion Inflow Diversion, Theft, Administration Level 3 Outflow Diversion Inflow **Facility** Absenteeism, Theft Outputs

Figure 1: Representation of Potential Diversion Points

Source: Savedoff (2008).

Note 39. Data sources for student outcomes

The secretariat for the EFA FTI tracks enrollment and completion rates and learning outcomes at the primary/basic education level for EFA countries (website: http://www.worldbank.org/education/efafti). The OECD's *Education at a Glance* reports on these and other outcomes. Also see Note 22.

Note 40. Assessing costs of education

An early approach to costing the Millennium Development Goal (MDG) of universal primary completion recognizes that the mix of policy actions required for accelerated EFA progress differs considerably from country to another (see Bruns, Mingat, and Rakotomalala 2003). Under the EFA FTI the costing exercise focuses on the education policy dialogue in low-income countries and is organized around a set of clear benchmarks (see box below)—called the FTI "indicative framework." These benchmarks provide a transparent and systematic way of tracking countries' fiscal commitment to EFA, the long-term sustainability of their primary education unit costs and quality and key outcomes, such as primary school completion and gender equity in school access and attainment.

The Benin PER 2004 Enhancing the Effectiveness of Public Spending. A Review of Three Sectors, for example, uses the projection methodology of the EFA FTI indicative framework to make medium-term projections of the financing requirements for the education sector in that country (see pp. 53–54).

Box: FTI Policy Benchmarks for EFA by 2015*

Service Delivery

Average annual teacher salary 3.5 x per capita GNP

Pupil-teacher ratio 40:1

Non salary spending 33% of recurrent education spending

Average repetition rate 10% or lower

Annual hours of instruction 850 or more **System Expansion**Unit construction cost \$10,000 or less **System Financing**

Government revenues 14–18 % of GDP (depending on percent

GDP)

Education spending 20% (as share of government revenues)

Primary education spending 50% (as share of total education recurrent

spending)

*Benchmarks to be applied flexibly on the basis of country circumstances

However, this framework can be relevant to countries that are looking to improve their primary education completion rates. It does not apply to goals for other levels of education.

Note 41. Alternative methodologies for costing education MDGs

For EFA FTI countries or candidate countries, investigate the usefulness of different methodologies that have been developed to estimate the costs of achieving EFA goals. See Gurria and Gershenberg 2004 "Costing the Education MDGs: A Review of the Leading Methodologies" and also the website http://go.worldbank.org/5R8AN4F6Z0.

"Costing the Education MDGs" discusses the World Bank's Maquette for MDG Simulation (WB-MAMS) Model. WB-MAMS is a new methodology for assessing costs currently being developed at the World Bank. It emphasizes World Bank and donor interactions with ministries of finance. The results are used to evaluate intersector allocations necessary to reach the MDGs, as well as the timing of additional public spending. Ethiopia is the first country that has been studied under the MAMS framework. See Withers and Tan 2004 "Methodological Differences in Costing the Education MDGs in Ethiopia: MAMS, MP & EPSM" and

the MAMS website http://go.worldbank.org/MU6OM0Q890.

In the WB-MAMS model, the user chooses a baseline level of spending on primary education, which is set within an aggregate budget constraint generated by the World Bank's RMSM-X macroeconomic model. Users also specify the timing of spending on primary education (e.g., front-loaded or back-loaded) and its distribution across three inputs: classrooms, teachers and non-salary spending. Once these choices are specified, the model applies assumed unit costs to compute the corresponding number of primary school classrooms and teachers that the available resources will buy. The education MDG outcome is then estimated as a function of the number of classrooms and teachers, the amount of spending on non-salary spending, the under-five child mortality rate and structural elasticity parameters that enter the MDG production function.

The MAMS model has the advantage of performing the baseline costing exercise within an explicit macroeconomic framework, the stability of which has been established within the RMSM-X model. MAMS, however, also has some weaknesses. First, the mathematical structure of the education MDG production function is somewhat of a "black box" and will not be easily understood by nontechnical policymakers in ministries of finance or education. Second, the model assumes that we have structural knowledge about the process driving education outcomes; assumptions regarding the structure cannot be reliably validated. Third, at present the MAMS model only considers the cost of achieving the MDGs for the first cycle of primary education (grades one through four) and is not sufficiently disaggregated to a) form the foundation of a comprehensive sector development and spending plan covering all levels of education; b) provide operational guidance to staff in the education ministry as they seek to design specific policies and interventions in efforts to achieve the MDGs; and c) clarify the structural constraints within the education sector that may require action outside the education sector to address. Fourth, the model does not account for the macroeconomic effects of additional spending on GDP growth and inflation over time.

Note 42. Simulating costs for reaching education targets

It is very difficult to generate meaningful simulations of the cost of reaching education targets. If projections are necessary, the Bank's SimSIP program can be helpful: http://go.worldbank.org/KCB8012ZF0 "The costing is done through cohort analysis for various cycles of schooling. Administrative costs are taken into account. Three sets of assumptions must be entered by the user in the simulator: country demographics, the performance of the education system (age

at entry in the various schooling cycles, as well as structure of repetition, promotion, and dropout rates), and costs (supply-side costs, including teacher wages and teacher-student ratios; demand-side costs related to the provision of stipends to part of the student body; and investment costs related to the training of new teachers and the construction of new classrooms). All variables are allowed to change over time. Simulations are provided for education outcomes or targets and for the cost of reaching these outcomes."

Note 43. Recommendations

A common failing of PERs is that they often do not derive recommendations from evidence but from some presupposed or idealized model of education policy. These a priori recommendations include the idea that a country "should" spend X percent of its GDP on education and "should" provide more to primary education and less to tertiary education. These recommendations may actually apply, but they must be based on a solid analytical foundation. This will also ensure that the recommendations are specific and relevant, not general (see Example 44).

Another problem of PERs is that they provide an impossibly large set of recommendations for policy. The review of PER impact referred to a 1998 World Bank report that PERs have on average 100 recommendations. Limit yourself to a small set of suggestions and focus on those that will be most realistically implemented. You must also provide some guidance for the implementation of these suggestions. This will ensure that the recommendations remain in the realm of the possible, rather than the improbable ideal. You must, in addition, suggest indicators for monitoring the success of the policies recommended. If the recommendations are adopted, how can the government, the Bank and civil society track the progress of implementation?

Finally, the PER must also provide some discussion of the assumptions underlying the recommendations. What circumstances or other factors must prevail in order for the recommendations to succeed? More important, what is the counterfactual? That is, what might happen if the recommendations are not implemented successfully, or if they are poorly or partly implemented? This requires acknowledging the risks involved in both the analysis and the policy process (see Example 44).



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Example 1. The rationale for public expenditures in education

Source: Maldives Public Expenditure Review 2002, Report No. 24238-MV.

The Maldives PER provides a good example of an introduction that explains the nature of the public expenditure review and states the fundamental questions to be answered and the rationale for public expenditure in education.

a. The Nature of the Review

- 4.1 An effective development strategy for the Maldives must give high priority to programs and policies which both raise the productivity of the labor force and improve the quality of life of the whole population. Education programs contribute centrally to both objectives. There are, however, other government programs which also lay claim to the public resources available. And, in turn, these resources which are generated both domestically and externally are constrained. In such a situation there is no alternative to prioritizing expenditures, both between sectors and within them. The central objectives of this section are to assess the extent to which the Government of the Maldives is spending public money (including development assistance) in an appropriate and effective way to provide education services, and to develop recommendations for increasing the benefits from these investments.
- 4.2 These issues have to be considered within three specific contexts. First, over the next four or five years, the growth rate of both the economy and resources for Government programs is likely to be around six-seven percent a year in real terms. Over the past decade, public expenditures in the education sector have increased at a rate much higher than this and higher than that of public expenditures overall. Any further increases above six percent a year would require lower than average increases for some other sectors and would need to be based on sound justifications. Second, it is important that analyses of public expenditures and government policies for education acknowledge both that there is private provision of education and an often substantial cost to households of accessing publicly financed schools. The latter is particularly the case in the Maldives. Third, expanded and higher quality provision in the education sector can be gained by increasing program efficiency as well as by increasing expenditures.
- 4.3 Allocations of public expenditure to education in the Maldives, as in virtually all other countries, are higher than expenditures in any other category of government developmental expenditure. It is important, therefore, to periodically re-assess their size and distribution and the extent to which these continue to reflect the importance which is given to achieving the sets of particular

objectives adopted by Government. In assessing public expenditures on education in the Maldives, the fundamental questions are:

- (i) What should be the role of government in the Maldives in financing and providing educational services and what are the implications of this for the degree of subsidization for each part of the sector?
- (ii) What are the Government's several objectives in the sector and how do they relate to the justifications for financial involvement?
- (iii) Given the justifications and the objectives, is the level of public expenditure and its distribution, relatively optimal?
- (iv) How effective and efficient are publicly funded activities and programs in meeting Government objectives and in responding to the rationale for Government involvement and what are the major constraints to improving their outcomes?
- 4.4 More simply, is the level of public expenditure appropriate in the context of the population's educational status, alternative sources of expenditure and competing demands? Is the distribution of public resources between the various levels of the education system, across regions and population groups, and between inputs, appropriate? Are the inputs funded by public resources used efficiently?

b. Why Public Expenditure in Education?

- 4.5 Before detailing the current status of the education sector in the Maldives and the expenditures being made both by Government and by others, it is useful to consider briefly the grounds on which the use of public resources in this sector can be justified. Conventionally, economists have used the arguments of both economic efficiency and equity. Public intervention is justified on (allocative) efficiency grounds when total reliance on private markets is likely to prevent the aggregate result of individual decisions coinciding with social valuations. The standard list of causes of such divergence includes externalities, public goods, non-competitive markets and an absence of well-informed consumers or producers. Public sector involvement can also be justified through an explicit concem with the social equity of the distribution of services which would result from the sole operation of markets. However, each of these cases for public sector intervention needs to be made carefully. Neither justifies the complete subsidization of services.
- 4.6 In the education sector, the main causes of market failures are externalities and it is widely argued that a reliance on individuals to pay its full cost would result in the demand and the provision being below socially optimal levels.

Further, when the private costs of education are borne by parents and the future benefits accrue to children, or to the parents of male children only, underinvestment from a societal viewpoint is likely. Imperfections in credit markets constrain borrowing against anticipated future increased earnings and again limit the demand for education below the amount which would be socially justified. Public interventions in the financing of education services can also be justified on the grounds of promoting social equity and alleviating poverty. The responsibility to foster cultural awareness and national harmony, and to respond to democratic mandates, are additional objectives for most governments and again can be used to justify subsidization of particular types of social expenditures.

4.7 Presenting justifications for public expenditure is not the same as declaring that all public expenditures in the education sector are justified, or are all equally justified. For instance, subsidization of education expenditures may publicly be justified on equity grounds, but in practice the subsidies may be captured largely, or not less than proportionately, by the better off sections of the population. Similarly, government interventions/subsidies may be justified on the grounds of externalities and public goods, yet in practice these interventions may be concentrated on types of education for which virtually all of the benefits are gained by the individual and few accrue to the rest of society. One purpose of this review is to assess the extent to which public expenditures in the Maldives in education currently are distributed in ways which increase demand to socially desirable levels and/or improve social equity.

4.8 The rest of the Education section begins by discussing briefly the current status of the education sector, moves to a description and analysis of current expenditures and trends, including assessments of effectiveness and the constraints to improved performance, and then considers the expenditure patterns in the context of Government objectives. In the final sections, the implications of the analysis are drawn and recommendations are made for changes in resource allocation and reductions in the constraints.

Example 2. Using DEA to estimate efficiency of public education expenditures

Source: Slovakia Public Expenditure Review 2008, Background Papers.

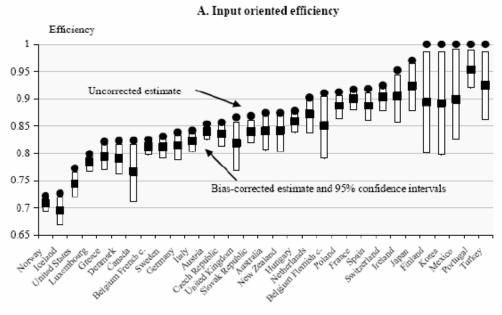
16. While some education outcomes [in Slovakia] are favorable (e.g. high proportion of students who complete secondary school), others still need to be improved. Education achievement is below the OECD average according to the 2006 OECD PISA study and is strongly influenced by social background. Tertiary attainment is low, albeit rising quickly; labor-market outcomes for graduates of

secondary vocational programs not leading to tertiary education are poor (low employment and activity rates, high unemployment rate).

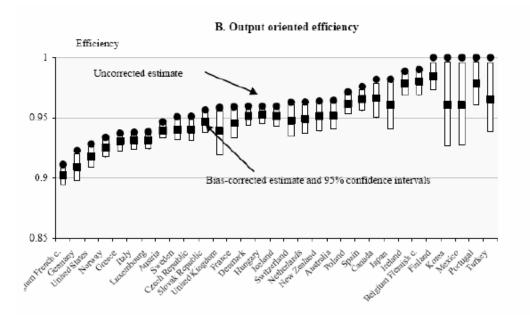
- 17. Education expenditure per (full-time equivalent) student in relation to GDP per capita is still low compared to the OECD average. The expenditure varied from 74% of the OECD average for secondary education in 2005 to 111.5% for tertiary education; for primary education this proportion is 70%. However, the primary and secondary pupil-teacher ratio is higher than the average of NMS and OECD countries.
- 18. Purely from the efficiency perspective, education spending in Slovakia is in general quite strong, in line with the OECD average and similar to the other NMS. Slovakia performs relatively worse on tertiary education efficiency and relatively better in secondary education. There remains, however, some scope for increased efficiency, which should be realized so that additional resources in the sector can be more effectively used. Moreover, according to OECD estimates there is still some room to improving education outcomes in primary and secondary education without increasing spending, or reducing pupil-teacher ratios. Holding resources constant, PISA scores could be boosted by about 4% (see Figure 10).

Revised May 2009

Figure 10. Uncertainty of technical efficiency estimates at the national level



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Example 3. Accurate population estimates are key to accurate estimates of enrollment rates

Source: Kyrgyz Republic Public Expenditure Review 2004, Report No. 28123-KG.

222. Household survey results on school attendance usually provide a valuable reality check on official enrollment figures. In most countries, survey data show rates of actual school attendance that are significantly below enrollment ratios which are based on official registration. In Uzbekistan, for example, household

survey responses imply rates of school attendance that are about 15 percentage points below the enrollment ratios that are calculated from official enrollment data. But in the Kyrgyz Republic, the results of the Kyrgyz Poverty Monitoring Surveys-which were carried out in 1996, 1997, and 1998-lead to levels of school attendance for primary education that are very close to the net enrollment ratios in the Education for All report. All these estimates are sensitive to the estimates of population that are adopted for the denominator of the calculation of enrollment ratios. The government's reported enrollment ratios are derived from registration data on enrollments and estimated population in the schoolyear age groups. If one calculates denominators instead from the single-year enumerated population aged 7 through 15 in the 1999 population census, it leads to a much lower gross enrollment ratio for grades 1 through 9 of 90.2 percent for the 1999/2000 school year. This finding is much more consistent with the findings on basic education coverage from other countries in the region. It implies a total of at least 200,000 children of compulsory school age that are not enrolled in school.

223. The results of the 1999 census of population also provide a basis for calculating the regional pattern of school coverage. Table 6.3 presents gross enrollment ratios by oblast for primary and secondary education-grades 1 through 11. The national gross enrollment ratio of 88.4 percent is surprisingly close to the 90.2 percent figure for grades 1 through 9, implying little attrition in the upper secondary cycle. What is particularly surprising is the low gross enrollment ratio of 77.1 percent for Bishkek municipality and the high enrollment ratios for Batken and Naryn. These findings may reflect higher attrition to pursue employment opportunities in Bishkek, and the absence of employment opportunities in Batken and Naryn Oblasts.

Table 6.3: Grade 1-11 Gross Enrollment Ratios by Oblast, 1999/2000

	1999/2000 enrollments, grades 1-11	1999 enumerated population, age 7-17 years	1999 gross enrollment ratio
Bishkek	104,278	135,246	77.1 %
Chui	158,298	183,842	86.1 %
Naryn	66,700	71,901	92.8 %
Issyk-Kul	98,286	110,589	88.9 %
Talas	51,116	56,778	90.0 %
Osh	301,733	332,170	90.8 %
Jalal-Abad	221,712	248,094	89.4 %
Batken	101,494	109,808	92.4 %

Source: National Statistics Commission.

Example 4. Differences between planned and actual public health expenditures

Source: Ethiopia Public Expenditure Review 2004. The Emerging Challenge. Volume I: Public Spending in the Social Sectors 2000-2020, Report No. 29338-ET.

- 2.53 The capital budget has been consistently under-spent, by significant amounts in some years (Fig. 2.19). This is particularly true in years when it has been expanded rapidly, suggesting not surprisingly that the capacity to absorb sudden increases in capital spending is limited. However, much of the apparent under-spending is on the aid funded part of the capital budget; and it is difficult to tell how much of this is due to under-reporting of spending (combined with excessively optimistic forecasts of planned donor spending), as opposed to problems in actually implementing the program.
- 2.54 More generally, under-spending on the capital budget has always been a problem, for several reasons, including:
 - (i) procurement bottlenecks;
 - (ii) difficulty in complying with donor requirements for administering funds and contracting;
 - (iii) unpredictability, and late notification and release of capital funding (as a result of which works cannot be committed to in time to implement them within the budget year);
 - (iv) contracting delays and insufficient contractor capacity;
 - (v) problems of transport and remoteness of sites; and
 - (vi) seasonality, which severely hinders the execution of works during the rainy season.
- 2.55 The majority of under-spending, however, has been on the aid budget. Historical data suggest that the while on average 82 percent of the domestically-financed part of the capital budget has been spent, only about 30 percent of the projected aid-funded budget was spent, during the period 1996/1997-2000/2001. As noted elsewhere, this is to some extent a forecasting problem: both donors and the Ministries are overly optimistic in projecting how much will actually be spent, so amounts included in the budget are over-estimates. Some of the apparent divergence from budgets is also due to reporting problems. The Regions, Bureaux, and MoFED do not have access to reliable data on how much has actually been spent on aid-funded projects, and reporting on actual aid expenditures is substantially delayed.
- 2.56 More generally, the federal-level capital budget has typically been spent more completely than have Regional level budgets, and as a consequence actual

capital spending has been more biased towards tertiary education than the budget numbers would suggest. (This is also a corollary of the aid-funded implementation problem referred to above: since aid tends to finance primary and secondary education in the Regions, where there is underspending, whereas domestic resources are concentrated more on capital investments for higher education at the federal level). The table below illustrates reported capital budget execution by educational level.

Table 2.19: Actual vs. Budgeted Education Capital Expenditure

(Current Birr millions)

	1996/97	1997/98	1998/99	1999/2000	20001/02	2002/03
Capital Budget	530	487	661	419	900	987
Actual Expenditure	<u>420</u>	<u>396</u>	441	<u>242</u>	<u>606</u>	<u>540</u>
Actual as % of Budget	79%	81%	67%	58%	67%	55%

Example 5. Total education expenditures illustrated

Source: Cambodia Integrated Fiduciary Assessment and Public Expenditure Review 2003. Enhancing Service Delivery Through Improved Resource Allocation and Institutional Reform, Report No. 25611-KH.

3.46 The education sector is financed from three main sources: the Government budget, donors, and out-of-pocket, contributions. Government expenditure in education only accounts for about half of total sectoral spending, while 35 percent is sourced from parental contributions, and the remaining 15 percent from external project financing (see Table 3.8). Total planned expenditure on education in 2002, all sources combined, is estimated at approximately 4 percent of GDP, or about CR 45,000 per capita (US\$ 11 per capita).

3.47 Significant shifts in the level and composition of spending took place over the past few years. These shifts reflect commitments to increase domestic recurrent education expenditure, and particularly the non-wage share. Between 1997 and 2000, RGC expenditure on education doubled in nominal terms (from CR 86 billion to 170 billion), and is projected to increase to 290 billion in 2002 and 337 billion in 2003. As a share of GDP, education expenditure more than doubled from 0.9 percent to 2 percent between 1997-2002.

Table 3.8: Estimated Total Expenditure on Education, 1997-2002 at

	1997	1999	2000	2001	2002 b/
Total Education, Capital + Recurrent (CR millions) w	401,251	496,111	503,826	526,932	576,338
As a percentage of GDP	4.4%	3.9%	3.9%	3.9%	4.0%
Per Capita (in CR)	36,551	41,371	40,199	40,233	42,937
Per Capita (in US\$) b/	12	11	10	10	11
Percentage Government budget	21%	31%	34%	44%	50%
Percentage Private	37%	38%	35%	35%	34%
Percentage External (project support)	41%	31%	31%	22%	16%
Total Recurrent Expenditure (Govt. + Private in CR					
millions) of	231,908	337,435	341,441	394,948	481,638
Total Govt. Exp. (Capital + Recurrent in CR millions)	86,246	155,732	169,860	229,653	290,200
Percentage GDP	0.9%	1.2%	1.3%	1.7%	2.0%
Education share of total Government expenditure	7%	8%	8%	9%	12%
Education expenditure per capita	7,856	12,986	13,553	17,531	21,620
Government Recurrent Expenditure on Education	83,403	149,781	165,815	212,305	286,200
As a pct. of Government education expenditure	58%	68%	68%	75%	84%
As a share of total Government recurrent expenditure	10%	14%	14%	15%	20%

Sources: Expenditure information from 1999 Poverty Assessment for 1997 data and private expenditure, TOFE for 1998-2001 RGC expenditure, Budget Law for 2002 for government expenditure, UNDP and ESSP estimates of external education (project) financing for 1999-2002. Population figures are from the UNFPA projections based on the 1999 population census.

Example 6. Composition of recurrent education expenditures

Source: People's Democratic Republic of Algeria. A Public Expenditure Review. Assuring High Quality Public Investment 2007, Vol. 1, Report No. 36270 – DZ.

Total expenditure excludes private investment expenditure due to lack of information.

by Expenditure for 2002 is budgeted. Other years are actuals as per the TOFE.

The estimated expenditure reduces private expenditure by the increased Government subsidy for fees, books, materials and supplies.

Table 7.7 Composition of Recurrent Spending by Subsector, 2003

Table 7.7 Composition of Recurrent	Primary	Lower	Upper secondary,	Upper secondary,
	111111111	secondary	general	technical
Salaries (% of total)	85.2	86.4	88.5	72.9
Central administration	0.1	0.1	0.1	0.1
Regional services	2.2	2.2	2.3	1.9
Schools	82.9	84.1	86.1	71
Goods and services (% of total)	0.9	5.4	3.6	18.2
Central administration	0	0	0	0
Regional services	0.2	0.2	0.2	0.2
Schools	0	4.5	2.7	17.4
Other institutions ^a	0.7	0.7	0.7	0.6
Transfers (% of total)	13.9	8.2	7.9	8.9
Subsidies for boarding and canteens	0.1	3.4	3.4	6.6
Scholarships	0	0.2	0.4	0.2
Primary school canteens	4.8	0	0	0
Other ^b	8.9	4.5	4	2.1
Total recurrent expenditure (%)	100.0	100.0	100.0	100.0
Total recurrent expend (DA billions)	75. 18	70. 20	34. 98	8. 43
Per pupil nonsalary spending (US\$)	2	23	14	285
Per pupil expenditure on transfers (US\$)	29	35	32	140

Source: Bank staff calculations based on data from MEN on actual expenditures (credits consommés).

Example 7. International comparison of public and private education expenditure

Source: Turkey Public Expenditure Review 2006, Report No. 36764-TR.

3.21 Total education expenditures, as a percent of GDP, are higher in Turkey than in most OECD countries (Table 3.4). Exceptionally high private expenditures as a share of GDP (2.2 percent) is the main reason for Turkey's outlier status. Compared to OECD partners, Turkey also allocates a smaller share of government spending to education (4.5 percent).

^a Other establishments include pedagogical support, institutions for research, training, curriculum development, etc.

Other transfers comprise special allowances for poor children, school health programs, and sports, cultural, and extracurricular activities.

Table 3.4. Expenditure on educational institutions as a percentage of GDP from public and private sources, by source of fund

	in pasite and priv			
	Public ¹	Private ²	Total	
Malaysia ³	7,2	-	-	
Korea	4,8	3,4	8,2	
United States	5,1	2,3	7,3	
Turkey⁵	4,5	2,2	6,7	
France	5,6	0,4	6,0	
Poland ³	5,6	-	-	
Mexico	5,1	0,8	5,9	
Finland	5,7	0,1	5,8	
United Kingdom	4,7	0,8	5,5	
Germany	4,3	1,0	5,3	
Spain	4,3	0,6	4,9	
Czech Republic	4,2	0,4	4,6	
Brazil ^{3, 5}	4,1	M	m	
India ⁵	4,0	0,2	4,2	
Slovak Republic ^{3,4}	4,0	0,1	4,1	

^{1.} Including public subsidies to households attributable for educational institutions. Including direct expenditure on educational institutions from international sources.

Source: OECD Education at a Glance, 2003 and Turkey National Education Accounts, ESS Background Study

Example 8. Average and actual cost per student

Source: Burkina Faso Public Expenditure Review 2005. The Budget as Centerpiece of PRSP Implementation, Report No. 29154-BUR.

^{2.} Net of public subsidies attributable for educational institutions.

^{3.} Public subsidies to households not included in public expenditure, but in private expenditure.

^{4.} Direct expenditure on educational institutions from international sources exceeds 1.5% of all public expenditure.
5. Year of reference

^{6.} Year of reference 2002

Table 30: Average Cost per Student Completing a Cycle

Instructional Level	Average yearly cost of instruction	Duration of cycle	Average cost of student per cycle	Actual cost of student per cycle
Primary (CEPE)	37 714	6	226 283	791 992
Secondary (1e cycle / BEPC)	70 742	4	282 968	1 245 059
Secondary (2nd cycle BAC)	70 742	3	212 226	615 455
University (degree)	854 924	4	3 419 696	26 331 662
Overall cost of educating one secondary school graduate (BEPC + BAC)			495 194	1 860 514
Overall cost of a student completing a university degree			4 141 174	28 984 167

Example 9. Budget reallocations

Eight months into the fiscal year (August 2003) the Albanian government made these reallocations within the budget. In this case the reductions in planned allocations for the education sector were small (under 1 percent), but in some countries mid-year reallocations can be significant.

Sector	Adjustment in milli	on lek
Education	-100	
Health	-30	
Labor/social	affairs -59	
Agriculture	+150	
Finance	+54	
Local govern	nment +85	

Example 10. Importance of correcting for inflation

If trend data on expenditures are not corrected for inflation, calculations of percentage annual changes can be seriously misleading—see below for Albania's education expenditures (currency is in millions of lek).

	2000	2001	2002	2003	2004
Original series total	16,421	19,488	19,021	22,200	26,474
Nominal annual %		18.68	-2.40	16.71	19.25
% change in price		6.9	6	3.7	4.2
		1.069	1.06	1.037	1.042
Deflator	100	106.90	113.31	117.51	122.44
Deflated series	16,421	18,230	16,786	18,892	21,622
Deflated annual %		11.02	-7.92	12.55	14.45
Real % increase since 2000			2.22	15.05	31.67

Example 11. Nominal versus real education expenditures

Source: Kyrgyz Republic Public Expenditure Review 2004. Fiscal policies for growth and poverty reduction, Vol. 2, Report No. 28123-KG.

240. Level of Public Support. As shown in Table 6.7, the share of consolidated public budget allocated to the education sector was essentially the same (20 percent) in 2000 as in 1990, and increased to 23 percent in the 2001 budget year. But in spite of this increased level of commitment, the share of GDP devoted to education fell by exactly half during the 1990s-from 7.4 percent in 1990 to 3.7 percent in 2000. This decline reflects the smaller size of the public sector under the market economy. Expressed in real terms, public expenditures on education have fallen even more sharply-to just one-third of their 1990 level, reflecting the combined effect of the smaller public sector and the sharp decline in GDP.

Table 6.7: Public Expenditures for Education as a Share of Total Public Expenditures, 1990-2001

	Education	Education	Total Public	Education as	GDP	Education
	Expenditures	Expenditures	Expenditures	% of Total	(in millions	as % of
	(in millions of	(in millions of	(in millions of	Public	of current	GDP
	current som)	1995 som)	current som)	Expenditures	som)	
1990	3.2	2,381.0	15.9	20.1 %	43	7.4 %
1991	5.6	1,775.5	24.4	23.0 %	93	6.0 %
1992	37.3	1,271.4	231.1	16.1 %	741	5.0 %
1993	227.2	906.3	1,225.8	18.5 %	5,355	4.2 %
1994	730.8	1,038.0	2,812.8	26.0 %	12,019	6.1 %
1995	1,064.9	1,064.9	4,610.5	23.1 %	16,145	6.6 %
1996	1,222.8	903.5	5,202.4	23.5 %	23,399	5.2 %
1997	1,514.0	937.6	6,695.7	22.6 %	30,686	4.9 %
1998	1,681.6	954.7	7,298.3	23.0 %	34,181	4.9 %
1999	1,892.3	780.9	9,042.2	20.9 %	48,744	3.9 %
2000	2,289.9	740.17	11,284.5	20.3 %	62,203	3.7 %
2001	2,849.3	854.3	12,257.0	23.2 %	73,890	3.9 %

Sources: National Statistical Committee and World Bank database.

Example 12. Detecting inconsistent budget allocations

Source: Malawi Public Expenditures Review 2007, Report No. 40145-MW.

198. The 2003/04 budget allocations are fundamentally different from the previous fiscal year, raising concerns about the data quality and about prioritization. Table 3.6 provides a detailed analysis of how the increase in expenditure was distributed across education levels and cost centers. The budget allocations differ widely, raising a concern about the quality of the accounting data, as it seems inconceivable that a budget would be distributed so differently in two consecutive years. In some instances, expenditures appear to have been accounted under the wrong program: e.g., a large part of primary education expenditure in Shire Highlands was accounted under Administration, hence the 1644 percent increase in the normally small administrative budget and the 25

percent decrease in the normally large primary budget. Moreover, if the accounting data do reflect actual spending, they raise concerns about consistency, as each division seems to have prioritized very differently across the various education levels. Similarly, across geographic divisions, some budgets were cut, while other divisions received substantial additional funding.

Table 3.6 Real growth in MOE recurrent expenditure from 2002/03 to 2003/04

Program	Admini-	Primary	Secondary	Teacher edu.	Total
Cost center	stration				growth
HQ	24%	56%	118%	-40%	24%
Northern	-34%	46%	49%	-100%	42%
Central Western	308%	-11%	-37%	-100%	-10%
Central Eastern	219%	-3%	169%	-100%	7%
South Western	134%	9%	-20%	-100%	4%
South Eastern	-13%	-23%	37%	-	-15%
Shire Highlands	1644%	-25%	69%	-100%	23%
Malawi College of			13%		13%
Distance Edu.					
DOMASI				-3%	-3%
Total growth	105%	5%	37%	-46%	11%

Source: Ministry of Finance, Annual Appropriations Account, 2003/03 and 2003/04.

199. The recent budget increases have been heavily skewed away from primary. MOE's budget increased by 11 percent in real terms from fiscal year 2002/03 to 2003/04, but spending on primary education only grew 5 percent, compared to 37 percent for secondary, and 105 percent for administration and support services. Spending on teacher education was cut by 40 percent. Overall, about half of the increase went to wages (PE), and half to other expenditure (ORT). PE grew most in the Northern Division, where wages for primary education and secondary education expanded as much as 50 percent in real terms, likely due to training of existing teachers. PE spending also grew in the Shire Highlands and Central Eastern divisions, while HQ and the other three divisions actually spent less on salaries. The growth in the ORT budget was more evenly distributed across divisions, though the bulk of it was spent in HQ on teaching and learning materials for primary and secondary. The large increase in HQ administration costs reflects an expenditure of USD1.I million in 2003/04 on Formation and Maintenance of Capital Assets.

Example 13. Expenditures by level of government

Source: Brazil Governance in Brazil's Unified Health System (SUS). Raising the Quality of Public Spending and Resource Management 2007, Report No. 36601-BR.

Since the launching of the Unified Health System (SUS) in 1988, change has been incremental but steady. The main strategy of Brazil's health reform (Reforma Sanitaria) has been the decentralization of service provision from the

federal government to the municipalities, and to a lesser extent, to state governments. All states and most large urban municipalities have gained full management responsibility (gestzo plena) for higher level care." A second key element of the reform was the establishment of a federal financing system based on grant transfers. Accounting for over 80 percent of federal health financing, this system represents an important shift away from directly paying for (and operating) services to financing programs and health care through subnational entities. A praiseworthy achievement of decentralization and the grant-based financial systems has been the financial buy-in from states and municipalities, which currently finance nearly 45 percent of all publicly funded health care (See Table 1.1 below). The federal government finances the difference through grants transfers.

TABLE 1.1: HEALTH EXPENDITURE, 1995 AND 2004 (IN 2004 R\$ THOUSANDS)

			Growth
Spending Indicator	1995	2004 *	% 95-04
Federal health expenditure	35,138	35,611	1.3
States health expenditure	11,296	13,447	19.1
Municipal health expenditure	10,040	15,640	55.8
Total Public Health Expenditure	56,474	64,698	14.5
% of Public Expenditure	10.98	10.17	-
% of GDP	3.89	3.66	-
Private Health Expenditure	67,312	81,896	21.7
% of GDP	4.64	4.64	-
Household Health Expenditure	53,909	62,416	15.8
% of Household Consumption	6.20	6.40	-
Total Health Expenditure	123,785	146,594	18.4
% of GDP	8.52	8.30	~
% Private	54.38	55.87	-
% Public	45.62	44.13	-

^{*} estimated.

Health spending excludes spending on pensions and retirements of public servants, debt-related spending and health care to public servants, but includes estimates for federal university hospitals.

Source: DATASUS, SIOPS, IBGE (for GDP)

Example 14. Private expenditure on education and equity implications

Source: Armenia Programmatic Public Expenditure 2008. Education and Social Transfers.

Poorer households are less likely to spend on education except for preschool,

textbooks, and stationery. Private expenditure as a percentage of total education expenditure in Armenia is high as compared with international standards (see Table 4.1 in Section 4.1 above), but the spending patterns vary across quintiles. Table 5.2 illustrates how private households in Armenia spend their money on education and how the pattern differs by quintile. About three quarters of households in all quintiles spend some money on textbooks and stationery. Differences between quintiles can be seen, however, when it comes to education-related transportation and education fees, with wealthier households being much more likely to incur costs in these categories. While the range of differences is smaller, wealthier households are more likely also to spend money on private lessons.

Table 0-2: Wealthier Households are More Likely to Spend Money on Education Fees, Education-related Transportation, and Private Lessons, 2005

(Percentage of households that incurred costs on education)

			Primary, secondary and higher education						
		Private	Textbooks/	Education	Educrelated	Other educ.			
	Pre-school	lessons	stationery	fees	transportation	expenses			
Full ISLS Sample									
Armenia	3.8	3.0	73.5	10.3	15.4	61.4			
Consumption qu	intiles				•				
Q1	4.7	2.0	76.1	2.3	2.7	60.1			
Q2	3.0	0.5	77.6	5.1	7.5	66.1			
Q3	4.8	2.0	73.9	6.9	12.2	62.3			
Q4	3.1	4.1	68.8	10.5	16.7	59.0			
Q5	3.6	5.2	72.4	22.5	31.6	60.2			

Source: National Statistical Service, Integrated Survey of Living Standards (ISLS), 2005.

Not only are poorer households less likely to spend on education, but when they do spend money, they spend less, especially on private lesson, education fees and education-related transportation. As shown in Table 17, the poorer households with children enrolled at different levels spend very little on private lessons, education fees and education-related transportation as compared with those in other quintiles. The total spending net of stipends is even negative for the poorest quintile. Furthermore, Table 18 shows what the average family in each quintile, with or without children enrolled, spends. The average family in the poorest quintile spends the equivalent of USD 35, whereas the average family in the richest quintile spends the equivalent of USD 256, or 7-8 times more. These tables together suggest that children from poorer families, when they go to school, are more likely to go to public schools within walking distance from home and are less likely to receive supplementary, private lessons.

Table 0-3: When Poorer Households Spend on Education, they spend less, 2005 (Households with children enrolled at different levels)

(USD per year)

								Total of	
								all 6 expen.	Net total
			Primary, s	econdar	y and higher	education		categories	as % of
	Pre-	Private	Txtbks/	Educ.	Edrelated	Other ed.	Stipends	net of	agg. HH
	school	lessons	stationery	fees	transport'n	expenses	recvd	stipends ¹	consump.
	1	2	3	4	5	6	7	8=Σ(1:6)-7	9
Full ISLS Sample									
Armenia	85.18	242.75	18.63	54.22	41.35	21.68	136.77	327.04	14.53
Consumption quin	tiles								
Q1	59.56	32.39	16.01	5.13	4.56	13.89	159.20	-27.68	-2.03
Q2	65.62	116.24	15.45	14.44	16.10	18.34	150.00	96.20	5.70
Q3	77.13	72.72	17.44	26.32	27.05	20.20	128.91	111.94	5.73
Q4	76.53	153.88	18.51	47.26	49.35	24.87	132.00	238.39	10.33
Q5	141.95	391.31	24.28	152.01	94.04	28.61	138.17	694.03	19.95

Source: National Statistical Service, Integrated Survey of Living Standards (ISLS), 2005.

Notes:

Table 0-4: An Average Family (with or without children enrolled) in the Richest Quintile Spends 7-8 Times more than a Family in the Poorest Quintile, 2005

(USD per year)

				(0.02	per year)				
								Total of	
								all 6 exp.	Net total
			Primar	y, secondai	y and higher e	ducation		cat'ies	as % of
	Pre-	Private	Textbks/	Education	Educrelated	Other educ.	Stipends	net of	agg. HH
	school	lessons	stationery	fees	transport'n	expenses	received	stipends	consump.
Quintile	1	2	3	4	5	6	7	8= Σ (1:6)-7	9
Q1 (poorest)	3.52	1.04	12.73	4.08	3.63	11.04	1.09	34.95	2.56
Q2	2.42	0.83	12.36	11.55	12.88	14.66	2.19	52.51	3.11
Q3	4.32	2.16	13.04	19.68	20.23	15.11	3.93	70.61	3.61
Q4	2.79	8.24	12.98	33.14	34.61	17.44	3.83	105.36	4.56
Q5 (richest)	5.58	36.13	17.95	112.41	69.55	21.15	7.19	255.58	7.35
All Armenia	3.81	11.20	14.03	40.83	31.13	16.32	3.91	113.41	5.04

Source: National Statistical Service, Integrated Survey of Living Standards (ISLS), 2005.

Example 15. Informal payments in education

Source: Lewis and Pettersson (2009) "Governance in Education. Raising Performance in the Sector", Draft. World Bank, Washington, D.C.

The household burden of informal payments can be seen in terms of its relative share of average income. This varies substantially across countries: from 4.4 percent of half monthly per capita income in Bulgaria, to 143 percent in Ghana, to an astounding 380 percent in Pakistan (Table 12). In the case of Pakistan, 92 percent of parents reported making informal payments (all types) for education, combining this with the large amounts paid, the scale of the problem is enormous and may help to explain why private primary schools have seen the fastest growth over the last decade, and this applies to girls' schooling in

¹ Education expenditure of hypothetical household with at least one child in preschool, one child receiving private lessons, and one child enrolled in a primary, secondary or higher education institution.

The ISLS in 2005 included only 5,187 households in the national sample. Thus, despite the use of a stratified random sampling methodology, standard errors tend to be high in the case of disaggregated estimates, as in the case of marzes, especially small marzes. The number of households in Vayots Dzor in 2005, for example, is estimated to have been only slightly above 14,000 in total. The number of sampled households was only 258, and hence the margin of error around any estimate for this and other small marzes is relatively large.

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particular (Lloyd, Mete, and Grant 2007). Even in countries where informal education payments are smaller in absolute terms, they can still constitute a large share of total household expenditure, and most importantly, they are a form of corruption.

Table 1. Incidence and magnitude of informal payments for education selected countries, 2000-2006

•	Informal payment	% of households that make
	(% of half monthly per capita income)	informal payments
Albania (2005)	46	35
Bulgaria (2001)	4	16
Tajikistan (2003)	23	9
Colombia (2006)	n.a.	2
Guatemala (2005)	38	8
Haiti (2006)	n.a.	60
Paraguay (2006)	23	7
Peru (2001)	6	7
Bangladesh (2002)	87	40
India (2002)	76	34
Nepal (2002)	139	25
Pakistan (2002)	380	92
Sri Lanka (2002)	86	61
Ghana (2000)	143	24
Madagascar (2006)	38	7
Mozambique (2004)	57	16
Namibia (2006)	n.a.	20
Zambia (2003)	9	6

59

Note: Data for each region are from the same survey where possible to ensure consistency across countries in how the question on informal payments was asked.

Sources: World Bank LSMS (various years); World Bank Diagnostic Survey (various years); and Thampi (2002).

Example 16. Regional PERs in decentralized government

For an example of an analysis of the education sector in a decentralized context, see this regional (as opposed to national) PER: Mexico State-Level Public Expenditure Review. The Case of Veracruz-Llave 2003, Report No. 25162-ME, pp. 29-40.

Example 17. Regional differences in spending

In Kazakhstan the provinces collect the taxes and for some taxes are allowed to keep what they raise. The oil-rich province of Mangistau spends 4.3 times the amount per student that a poor province (South Kazakhstan) spends. In Poland local governments use locally generated taxes to "top up" their subventions for education from the central government. On average rural jurisdictions contribute

an additional 3 percent to the subvention; mixed rural/urban areas, 4 percent; urban areas and Warsaw, 39 percent. However, although rural areas contribute a much smaller percentage to total education resources for their schools, their contributions constitute 45 percent of their total budgets, as opposed to 30 percent of the total budgets for urban areas.

Example 18. Accounting for differences in funding between educational levels

The fact that in 1998 Poland was spending 1.84 times basic education per student expenditures for preschool and 0.96 times for upper secondary education was a warning flag. Why was preschool relatively expensive? What was going on in upper secondary education? The answer to the latter turned on intergovernmental financing arrangements. In Poland the financing responsibility for pre-tertiary education is split between two levels of local government. The level responsible for upper secondary education has little tax-raising authority and has to depend almost entirely on the inadequate central subvention to pay for secondary education, whereas the level responsible for basic education has significant tax-raising authority and is able to "top up" the central subvention.

Example 19. Inefficient teacher distribution

Source: Indonesia Public Expenditure Review 2007. Spending for Development. Making the Most of Indonesia's New Opportunities, Report No. 38772.

Although education budgets are increasing, Indonesia's extremely low student-teacher ratio (STR) suggest inefficiencies in sector spending. While a low STR provides the potential quality benefit of more teacher-student interaction, general consensus is that a STR of 30:1 is optimal and that levels below this have very low marginal returns. Since teacher salaries are a significant cost, a low STR tends to carry a high financial burden. Indonesia has one of the lowest student-teacher ratios in the region, as illustrated in Figure 3.7. Comparable STRs for Asia/Pacific countries are around 31:1 for primary and 25:1 for junior secondary.45 Indonesia's rates are significantly lower, at about 20 and about 14 for primary and junior secondary, respectively (Figure 3.7). Indonesia's ratios are on a par with or even lower than the ratios in the US and many European countries. It is also well below Indonesia's national policy regarding the STR, which is set at 40:1 for primary and 28:1 for junior secondary (World Bank, 2006h).

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Primary School Junior Secondary School Cambodia 56.24 Philippines 37.09 India India Lao PDR Philippine Vietnam Korea, Rep. 31.26 25.59 Thailand Mongolia Lao PDR Mongolia United Kingdom China China Thailand Korea, Rep. Indonesia Malaysia Japan Malavsia Indonesia United Kingdom United States 20 30

Figure 3.7 Primary and secondary school STRs by selected countries, 2003

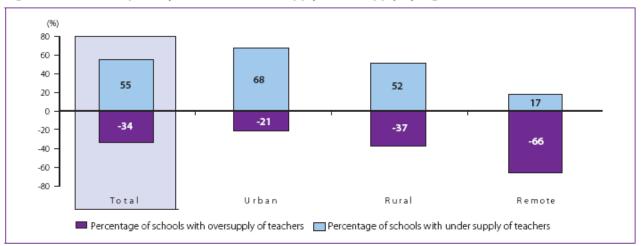
Source: Edstats 2003.

The supply issue is in part related to distribution inefficiencies. Based on the standards set by the current staffing entitlement formula for primary school (nine teachers minimum and a target STR of 40:1), about 55 percent of schools are oversupplied, while 34 percent are undersupplied (Figure 3.8). Inequities in teacher distribution are particularly evident when looking at the supply of teachers in urban, rural and remote schools. Urban and rural area schools have substantial oversupplies (with 68 percent and 52 percent of such schools having an oversupply, respectively), while remote schools have serious teacher shortages, with 66 percent of the schools being undersupplied. The government's new policy of doubling the base salary for teachers working in remote schools should encourage more teachers to work in these schools.

The current method of determining teacher supply requirements encourages oversupply. Under the current system, schools submit their teacher supply requirements to the district office. The districts then request the number of additional teachers required from the central education office. The central office subsequently allocates teachers to districts and provides the additional teacher salaries through the DAU. Under this system, the schools and districts—which do not actually pay the salaries—have a strong incentive to claim undersupply and request additional (and largely free) resources, with little incentive to use teacher resources efficiently. This is shown in practice, where schools almost always claim an undersupply, even when they have a large oversupply. In a 2005 survey of 276 primary schools, 65 percent of the schools claimed to have an undersupply while only 8 percent claimed an oversupply. However, according to the entitlement formula, 55 percent showed oversupply while 34 percent showed an undersupply. Of the schools that claimed an undersupply, 41 percent actually

had an oversupply.

Figure 3.8 Percent of primary schools with oversupply, undersupply by region



Source: Employment and Deployment Survey, 2005.

Note: Based on the current entitlement formula.

When considering the oversupply of teachers, it is important to take into account Indonesia's large share of part-time teachers. About 6 percent of Indonesia's primary school teachers and 25 percent of public secondary school teachers work part-time. This has added to the claims of an undersupply of teachers in certain areas. Using part-time teachers only reduces the cost burden of the current personnel system slightly, because part-time teachers' salaries are not significantly lower than salaries of their full-time colleagues. Primary school teacher salaries (including district and school incentives) vary surprisingly little based on hours worked. This is true for secondary school teachers as well. The fact that part-time teachers do not earn significantly less than regular teachers means that they are actually more expensive on a per-hour basis. At the secondary school level, subject experts are often hired on a part-time basis. In order to increase cost-effectiveness, however, these teachers should be encouraged to improve their level of certification to ensure full-time employability. At the primary level there are fewer part-time teachers (6 percent nationally), although primary school teachers often have responsibilities other than classroom teaching and many tend to work fewer hours than the average classroom teacher.

The bottom line from a financing perspective is that the oversupply presents a significant cost burden. Using realistic STRs that follow international best practice and are in line with the regional average, Indonesia shows a teacher oversupply of about 21 percent (Annex E.6). Even when using a conservative estimate and taking into account the large part-time teacher workforce, the cost burden of the

oversupply of teachers for primary and junior secondary schools alone reaches over Rp 5 trillion, or about 8 percent of the total education budget. This high cost will be exacerbated when teachers' salaries are significantly increased as a result of the new incentives specified in Teacher Law No. 14/2005.

Example 20. Regional and gender variations in enrollment, survival and completion rates

Source: Nicaragua Public Expenditure Review 2007, Report No. 39807-NI.

3.9 Access and internal efficiency. Enrollment in primary education has increased in absolute terms from 838,437 students in 2000 to nearly 1 million in 2006; representing an average annual growth rate of about 2.1 percent over the period 2000-2006; Table 3.1. The increase responds to greater efforts to increase first time enrollment in grade 1 to cater for the natural growth in the school age population. The positive trend is supported by data from the two most recent household surveys, which highlights a decline in the proportion of children aged 7-12 not attending school from 12.1 percent in 2001 to 9.4 percent in 2005. While the decline in the proportion of non-attendance is most evident amongst children from extremely poor households, from 27 percent to 21 percent from 2001 to 2005, respectively, the proportion of children out of school remains extremely high and, therefore, in need for urgent attention.

Table 3.1 Enrollment by Level, 1995 & 2001-2006

	Indice	Lincom	dent by Lev	· c1, 1/// cc	2001 2000		
Level	1995	2001	2002	2003	2004	2005	2006
Special Education	3,009	3,366	3,262	3,486	3,366	3,353	3,371
Preschool	99,145	163,832	177,534	183,709	199,422	213,672	209,950
Primary	764,587	866,516	923,391	927,217	941,957	945,089	966,206
Secondary	220,746	334,986	364,012	376,409	394,347	415,273	425,718
Teacher Education	7,460	6,201	6,774	6,243	5,886	5,351	5479
Adult Education	51,293	83,413	78,316	66,347	89,074	91,961	99623
Total	1,146,240	1,458,314	1,553,289	1,563,411	1,634,052	1,674,699	1,710,347

Source: Indicadores MECD. Incluve Todos la Oferta de Cobertura del MECD.

3.13 With respect to internal efficiency indicators, progress has been steady since 2001, but it has also been slow. Repetition rates have remained unchanged since 2001, at around 11 percent for in primary education and 6 percent in secondary education. The proportion of students who complete primary education in the allotted time for the cycle (6 years), increased from 27 percent in 1997, to 36 percent in 2001 and 41 percent in 2006; Table 3.3. Completion rates within six years are higher among female students and in urban areas. It is important to note the substantive improvements of this indicator in rural areas, from a low base of 14 percent in 1997, to 23 percent in 2001 and 31 percent in 2006. Increasing the proportion of students who complete without repeating a grade is of particular importance not only to ensure that learners become

confident of their academic abilities and prospects for their educational future (the likelihood of dropping out increases sharply for overage students) but also to increase the efficiency of resource use by creating more places in the system.

Table 3.3 Percentage of Students Completing Primary School in 6 Years

Year	Total	Female	Male	Urban	Rural
1997	27	29	24	42.3	14.9
1998	31	34.4	27.2	48.8	16.8
1999	32.2	35.7	28.9	49.5	18.7
2000	35.4	39.2	31.9	54.1	21.5
2001	36.3	40.5	32.4	52.5	23.3
2002	38.5	42.8	34.6	59.2	27.7
2003	40.8	45.3	36.7	58.9	30.2
2004	40.9	45.1	37	60.8	30.2
2005	41.2	45.6	37.2	58.2	31.2
2006	41	45.2	37.1	57.3	31.3

Note: **2006 is preliminary

3.14 Improvements in the primary completion rate are hampered by school desertion, grade repetition and the fact that many students simply fail to register for the next school year. This last phenomenon is most prominent in the transition from first to second grade. Figure 3.2 shows the declining enrollment across successive years, from 2000 to 2005. In 2001, 234,001 students enrolled in the first grade, of which 24,297 (or 10.4 percent) later repeated that grade, while 20,122 (8.6 percent) deserted during the school year, which left 189,582 students that could have proceeded to the second grade in 2002. In 2002, however, only 176,318 students registered in the second grade, and 15,005 of those were repeaters from the year before. So, the net enrollment of students that came from the first grade was only 161,313. That means that 28,269 students that finished the first grade simply failed to register for the second grade. In other words, a total of 72,688 that had initially enrolled in first grade during 2001 did not make it into the second grade in 2002, or 31.1 percent of the first grade enrollment. Of that number, 10.4 percent repeated first grade, 8.6 deserted during the first year and 12.1 percent simply failed to show up at registration time. This same trend is also observed in the transition from 2002 to 2003, and from 2003 to 2004; Table 3.4.

Table 3.4 Enrollment Losses between First and Second Grade; 2001 – 2004

		Fi	irst Grade		Second Grade						
	Initial	Final	Repeaters	Deserters	Initial	Final	Repeater	Deserters			
Year	Enroll.	Enroll.			Enroll.	Enroll.	s				
2001	234,001	213,879	24,297	20,122							
2002	246,136	223,938	35,878	22,198	176,318	164,966	15,005	11,352			
2003	241,236	221,434	42,045	19,802	178, 725	168,129	17,155	10,596			
2004					179,717	167,468	18,560	12,249			

3.15 The drop out rate in primary education remains very high, particularly in the early grades of the cycle. The average annual drop out rate in grade 1 for 2000 through 2005 was 17.5 percent compared to 20 percent 1990-2000. Since 2005 there has been a marked improvement in lowering the drop out rates in grade 2 and beyond, which is a commendable achievement for the Ministry. While there is still some way to go to eliminate drop out in primary education, the immediate challenge remains in grade 1 which is an exit point for many students, see Table 3.5.

Table 3.5 Drop out Rates in Primary Education by Grade 1990-2005

Year	Grade 1	Grade 2	Grade 3	Grade 4	Grade 5
1990	23.5	7.5	9.8	11.9	10.9
1995	21.2	9.2	13.7	16.5	13.1
2000	19.9	10.2	9.6	11.9	8.5
2001	17.7	10.1	8.7	11.5	9.2
2002	19.9	9.2	10.5	11.3	10.1
2003	16.3	8.1	8.9	10.5	11.6
2004	18.6	9.4	10.7	11.8	9.0
2005	15.3	2.2	4.1	6.8	7.9
Average 1990-2000	20.70	8.24	10.88	13.43	10.78
Promedio 2001-2005	17.57	7.78	8.58	10.38	9.56

Note: Data for 2006 are preliminary

Example 21. District variation in school enrollment rates

Source: Indonesia Public Expenditure Review 2007. Spending for Development. Making the Most of Indonesia's New Opportunities, Report No. 38772.

However, enrollment rates in Indonesia still vary widely by region and these regional gaps are more pronounced than the enrollment gaps in income levels. The poor's likelihood of enrollment varies by region, even within the same income quintile. The poor in Papua have low net enrollment rates even at primary school level (80 percent). In fact, the regional differences dominate conditions to such an extent that the richest quintile in Papua still has lower enrollment rates (92 percent) than the poorest quintile in Sumatra (World Bank, 2006). At the junior secondary school level, the level of access varies even more widely across provinces. Indonesia has largely similar and almost universal enrollment rates at the primary level across provinces. However, major differences in enrollment rates emerge for children aged 13 to 15. While Jakarta and Yogyakarta achieve enrollment levels of over 90 percent, the majority of provinces considered in this analysis fall below 80 percent. South and Central Sulawesi fall below 70 percent.

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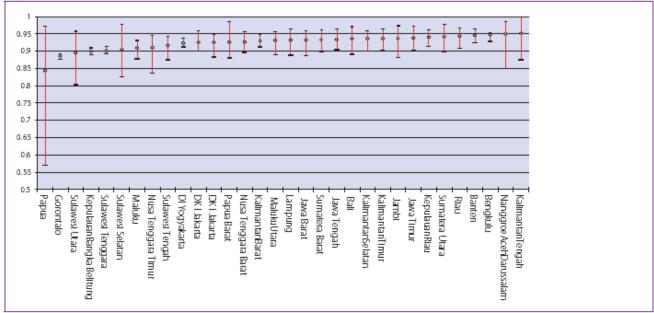


Figure 3.6 Primary education: district enrollment rates within provinces

Source: Susenas 2004.

Example 22. Cohort analysis of school completion

Source: Bolivia Public Expenditure Review 2004.

7.24. A 1997 cohort analysis (Table 7) reveals that of every of 100 Bolivia children entering grade 1, only about 57 complete primary and 28 complete secondary, including late graduates. On time graduates (no repeaters) in primary and secondary represent only about 36 and 17 percent of the cohort respectively. This means that of the 290,000 children who entered grade 1 in 1997 close to 45 percent, or about 125,000 children, will *not* complete primary education, and an additional 20 percent, or about an additional 60,000 children, will not complete it on time. The challenge for Bolivia is to improve these rates, but without neglecting student learning.

Table 7.10 Primary and Secondary Public Schools Cohort Evolution in Bolivia

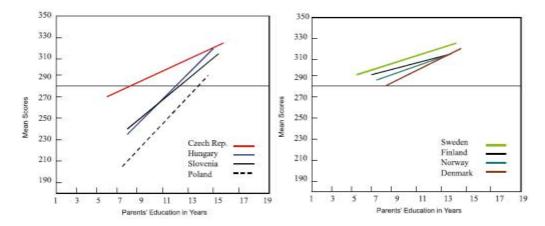
				Prin	nary						Sec	condary	y
Year	1	2	3	4	5	6	7	8	1	2	3	4	Graduates
1997	100		_		_	_	_			_			
1998	6	84		_	-	_	_		_				_
1999	0	9	75										_
2000	0	0	10	69									_
2001	0	0	0	12	64			-	—	_			_
2002	0	0	0	0	13	59					_		_
2003*	0	0	0	0	0	16	50						
2004*	0	0	0	0	0	1	17	42		_	_		_
2005*	0	0	0	0	0	0	1	18	36		_		_
2006*	0	0	0	0	0	0	0	1	19	28			
2007*	0	0	0	0	0	0	0	0	2	17	23		_
2008*	0	0	0	0	0	0	0	0	0	2	16	19	_
2009*	0	0	0	0	0	0	0	0	o	0	1	14	17
2010*	0	0	0	0	0	0	0	0	0	0	0	0	11
Survival rate	100	93	86	81	76	76	68	61	57	46	40	33	28
(as a percent)													

Note: *Estimated assuming 2001 promotion and repetition rates.

Source: Viceministerio de Educación Inicial, Primaria y Secundaria (2003).

Example 23. Socioeconomic effects on literacy

As the graph shows, public policy can make a difference. It shows the relationship between the literacy scores for 16–25-year-olds, measured in the OECD's International Adult Literacy Survey, and their parents' education measured in years. Each line in the chart was drawn to encompass the range of parents' education in that country from the 10th to the 90th percentiles. These lines are known as socioeconomic gradients. The graph shows that the Scandinavian countries are able to reduce the relationship between the parents' education—ordinarily a powerful predictor of children's learning achievements—and their children's learning outcomes. In contrast, ECA countries are much more elitist.



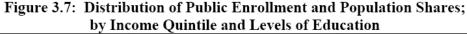
Source: OECD, 1997, Literacy Skills for the Knowledge Society.

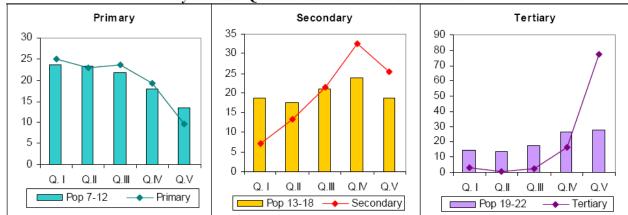
Example 24. Income-bias in public education funding increases in higher grades

Source: Guatemala Public Expenditure Review 2005, Draft.

3.29 This section reviews per child spending at the various educational levels and compares that with the distribution of enrollment figures across income groups at those same levels. That review indicates that much of educational provision in Guatemala is regressive in that a disproportionate amount of public resources is invested in children of wealthier backgrounds. This fact raises serious equity concerns considering that public education is financed with general tax revenues.

3.30 Public resources are equitably targeted at the primary education level, but poorly targeted at the secondary and tertiary levels. This is illustrated in Figure 3.7, which compares the distribution of public enrollment with the distribution of school age population by income quintiles. The lines in Figure 3.7 denote the proportion of public enrollment consisting of children from each income quintile. In primary schools and pre-primary schools the poorer income quintiles tend to have the highest proportion of enrollment. This is because children from wealthier families are more likely to enroll their children in private schools. At the secondary and tertiary levels, however, enrollment is concentrated in the top income quintiles. The distribution of secondary enrollment appears to be concentrated in the middle-upper class. At the tertiary level the highest proportion of students come from the wealthiest quintile. This pattern is similar in the other Central America countries.





NOTE: Lines denote the proportion of public enrollment consisting of children from each income quintile; bars denote the proportion of the age appropriate population consisting of children from each quintile.

Source: ENCOVI 2000.

3.31 The bars in Figure 3.7 denote the proportion of the age-appropriate population that belongs to each income quintile. Note that the school-age

population, particularly in the younger age range, is not evenly distributed across quintiles. The lowest income quintiles have a disproportionately higher representation because poorer families tend to have more children than richer families. Figure 3.7 shows that at the primary level the lowest income quintile tends to make a more than proportional use of public resources, compared to its school-age population share; while the highest quintile makes a less than proportional use of public delivery, compared to its school-age population share (presumably because they make a disproportional use of private education services). This indicates that primary gross enrollment is roughly equitably distributed across income quintiles. The secondary gross enrollment rate, in contrast, is fairly inequitably distributed across quintiles. At the secondary level, the two lowest income quintiles make a less than proportional use of public education services, while the fourth quintile makes a much more than proportional use of public services. The highest quintile also tends to make a more than proportional use of public services, but somewhat less than the fourth quintile on account of their disproportional access to private education services. Finally, the highest quintile makes a much more than proportional use of public services at the tertiary level, while every other quintiles makes a less than proportional use of those services.

3.32 The primary education public subsidy is progressive but the secondary education subsidy is regressive. Table 3.14 shows the estimated public subsidy per school-age population by quintile at the primary and secondary education levels (for which the estimates of unit costs are most reliable). The per-capita public subsidy at the primary level is fairly similar across the first four quintiles. (This is because the enrollment share generally parallels the population share by income quintile as seen above at the primary level.) The public primary subsidy is lower for the richest quintile because of their lower enrollment proportion. Therefore, in per capita terms, public primary spending continues to be progressively distributed, although not highly so. The situation changes quite dramatically at the secondary level, where the per capita public subsidy is about four times higher for the fourth than for the first quintile, and about three times higher for the fifth quintile, due to the disconnect between enrollment and population shares.

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Table 3.14: Per Capita Public Subsidies in Education in Guatemala; 2000/2001

	Per	-Capita Public S	Subsidy in Prim	ary		
	Q. I	Q.II	Q.III	Q.IV	Q.V	Total
Public Subsidy	63,667,050	58,416,600	60,087,750	49,142,100	24,629,100	255,942,600
% of Public Subsidy	24.9	22.8	23.5	19.2	9.6	100
Per Capita Public Subsidy	139.5	128.8	142.5	141.2	94	131.8
	Per (Capita Public Si	ıbsidy in Secon	dary		
	Q. I	Q.II	Q.III	Q.IV	Q.V	Total
Public Subsidy	2,993,312	5,536,744	8,838,992	13,437,704	10,481,560	41,288,312
% of Public Subsidy	7.2	13.4	21.4	32.5	25.4	100
Per Capita Public Subsidy	9.8	19.5	26	34.7	34.3	25.4

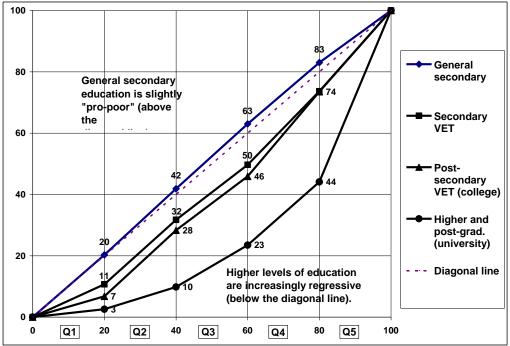
Source: Table 3.4 and ENCOVI 2000.

Example 25. Illustrating public education expenditure equity using concentration curves

Source: Armenia Programmatic Public Expenditure 2008. Education and Social Transfers.

The 'concentration curves' in Figure 15 illustrate that general secondary education is quite equally distributed, actually, very slightly 'pro-poor' with the poorest 40 percent of households comprising 42 percent of enrollments. Preschool education is also fairly equally distributed, though not shown here (see footnote of Figure 15). This can be explained by the fact that the net enrollment rate at this level for all children in Armenia is quite high and by the fact that poorer households in Armenia have, on average, more children than richer ones. On the other hand, university enrollments in Armenia are quite unequally distributed among households, with rich households much more generously represented than poor ones. Vocational education, both secondary and postsecondary levels, is more equally distributed, but still favors the rich somewhat. Taking the whole population into account, Figure 16 shows that individuals from poorer households have attained lower levels of education in the past. For example, only 7.2 percent of individuals from the poorest quintile have attended higher education as compared with 28.8 percent of those from the richest quintile.

Figure 15: General secondary education is fairly equitably distributed, but university enrollments are quite unequally distributed among households, 2005



Source: National Statistical Service, Integrated Survey of Living Standards (ISLS), 2005. Note: The concentration curve for pre-primary education is not shown here only because it crowds out the graph. The distribution is fairly equal with 21 percent (Q1), 36 percent (Q2), 62 percent (Q3), and 79 percent (Q4).

Armenia's NSS adopts a survey method in which aggregate annual household consumption is measured to approximate annual household income. Households are then ranked according to aggregate consumption per adult equivalent and divided into consumption quintiles. By definition, a quintile includes one-fifth (20 percent) of individuals in the given population, but because poorer households have a larger number of household members on average, the proportion of households (as opposed to individuals) in each quintile is 16 percent for the poorest quintile, 18 percent of the second poorest, 20 percent for the third, 22 percent for the fourth, and 24 percent for the fifth (or the wealthiest), respectively.

Example 26. Tracking pro-poor expenditures in education

For a good example of a PER that is tightly linked to the poverty reduction strategy and focuses on monitoring pro-poor expenditures in education, see United Republic of Tanzania Public Expenditure Review FY03: Managing Public Expenditures for Poverty Reduction. Report on Fiscal Developments and Public Expenditure Management Issues, Report No. 26807-TA.

Example 27. Education conditional transfer programs

Source: Bangladesh Public Expenditure Review 2003, Report No. 24370-BD.

142. Currently, two demand-side programs provide subsidies to selected schools and direct benefits to selected groups of students and their families. The Food for Education (FFE) program provides grain rations (recently monetized) to

disadvantaged families if they send their children to primary school. The Female Secondary Stipends (FSS) program provides stipends and tuition waivers to girls residing in non-municipal areas if they attend grades 6-10. About 16 percent of all education ADP spending is devoted to FSS, and another 20 percent to FFE and primary stipends combined (Table 5.4).

Table 5.4: Bangladesh-Annual expenditures on conditional educational transfers

	FY 97	FY 98	FY 99	FY 00
FFE (Tk bn)	3.3	3.7	4.0	39
FSS (Tk bn)	2.2	2.6	2 8	3 1
FFE as a percentage of education ADP	22 6	25.2	23.6	197
FSS as a percentage of education ADP	150	17.7	16.5	15.7

Source World Bank staff calculations from various budget documents

143. Evidence from surveys suggests that the FFE program is reasonably well targeted toward the poor. For example, those in the poorest 20 percent of the income distribution are nearly five times as likely to participate in the FFE program as are the richest 20 percent of the population. In addition, there is strong evidence from the mid-1990s that the FFE program succeeds in attracting poor children to school (Ravallion and Wodon 2000). Specifically, estimates show that participation in the FFE program increases the probability of attending school by 20 percent on average. Evidence from the 2000 HIES shows that these gains have been sustained.

144. While the FSS program is not pro-poor and no formal evaluation of its effectiveness has been done, it is deemed to have raised girls' secondary enrollments as high as or higher than those for boys for all but the wealthiest 20 percent of the population (see Table 5.1).

145. More recent information indicates that the effectiveness of the programs in place is significantly negated by implementation problems. Most disturbing are estimates of aggregate household transfers for the FFE and FSS programs obtained from the HIES 2000. The administrative leakage in the FFE program is such that a large portion of the aggregate program allocation is not accounted for in the survey estimates. What is particularly worrisome in the Bangladeshi context is that similar calculations for the FFE program using the 1995-96 Household Expenditure Survey (1995-96 HES) indicate substantially lower discrepancy, suggesting that problems of leakage have worsened over time (see Chapter 7).

Example 28. Colombian voucher system

Source: Angrist, Bettinger, Blom, King, and Kremer (2002) "Vouchers for Private Schooling in Colombia: Evidence from a Randomized Natural Experiment", American Economic Review 92(5).

The Colombia voucher system expanded educational supply for the poor. It was established in late 1991 to expand secondary school capacity and had these characteristics:

- Cost-sharing between central and local governments (80–20 split).
- o Voluntary municipal and school participation
- Targeting using poverty mapping.
- o Grade 5 graduates qualify; vouchers renewable yearly up to grade 11.
- o Variable value of voucher up to ceiling, with annual inflation adjustment.

It used a lottery system to allocate the vouchers to the poor, creating a random assignment experiment that could be evaluated. The evaluation showed these results, for example: relative to lottery winners, a lower percent of lottery losers were currently enrolled in private school (53.9 percent versus 69.9 percent), and a lower percent completed the 8th grade (63.2 percent versus 74.4 percent).

Example 29. Subsidy of private schools

Source: Poland Public Expenditure and Institutional Review 2002. Towards A Fiscal Framework For Growth", Report 25033-POL.

In Poland private schools that receive public subsidies also charge fees. Private preschools are subsidized, per capita, at the rate of 75 percent of the average unit cost in the public preschools. Primary, lower secondary, and upper secondary non-public institutions that are "accredited" receive, per capita, 100 percent of the average unit cost in the public schools. Since students in the postsecondary programs are past the compulsory age for education, government pays 70 percent of the average public unit cost for students in private postsecondary programs. Private tertiary institutions receive no public subsidies.

Example 30. Prevalence of bribes and other informal fees

- o In Moldova students have a website that shows the bribes required to enter different university faculties. (See Moldova's Education Sector: A Financing Strategy to Leverage System-Wide Improvement, February 2002.) In some countries of the former Soviet Union, wealthier parents buy places for their children in good academic upper secondary schools closely affiliated with a university to increase the chances of their children's acceptance at that university.
- o The Albania 2002 LSMS showed that 7 percent of students buy tutoring

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lessons. Of these, about 55 percent bought the lessons from their own teachers or other teachers in their school.

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Example 31. Determinants of education and health

Source: Peru Restoring Fiscal Discipline for Poverty Reduction. A Public Expenditure Review 2002, Report No. 24286-PE.

The Peru PER FY02 provides a nice analysis of the multisectoral determinants of education and health outcomes.

4.2 Increased public expenditure in health and education improves both access to and attainment in schools, and reduce mortality rates for infants and children. There is increased recognition that expenditure allocations in favor of education and health can boost economic growth, while promoting equity and reducing poverty. The rationale for higher public spending in education is often based on its impact on individuals' lifetime incomes (i.e., the social rate of return, highest in primary education, then in secondary). Similarly, the rationale for increased spending in health is justified on the basis that it reduces the impact of diseases on the productive life years of the population. Empirical evidence, however, has not been conclusive, especially if public resources are used inefficiently and inequitably, and public expenditure crowds out private spending on the social sectors. Using a model and a cross-sample database developed by Gupta, Verhoeven and Tiongson (1999), data from Peru are added to a sample of around 50 countries, and ensuing estimation followed an OLS and two-stage least squares (2SLS) linear regression technique (Tables 4.la-b). Highly robust results for education and health indicators show that:

- Total education spending has mixed coefficients: a statistical significant one as a determinant of enrollment rates in secondary education, but insignificant ones as a determinant of enrollment rates in combined gross primary and secondary education. In the 2SLS gross secondary education regression, the coefficient of combined primary and secondary education spending is also statistically significant. Overall, the F-statistic is significant at the 1 percent level. Other variables whose coefficients also appear as statistically significant are population, child mortality rate, income per capita, and urbanization.
- Total health spending has a statistically significant effect on both outcomes, infant and child mortality. Its coefficient appears weakly significant in the 2SLS infant and child mortality regressions. Other variables whose coefficient appears statistically significant are: adult illiteracy rate and income per capita.

Table 4.1a: Regression Results for Education Indicators: Linear Regressions^a

	ENROLLMENT RATES						
	Gross Primary	and Secondary	Gross Sc	condary			
	OLS (weighted) ^b	2SLS (weighted) ^c	OLS (weighted) ^b	2SLS (weighted) ^c			
Constant	53.81	36.28	23.04	***31.10			
	(42.65)	(27.38)	(18.92)	(11.25)			
Primary and secondary education	19	20	.12	*.22			
spending (% of total educ. spending)	(.30)	(.31)	(.11)	(.11)			
Education spending	1.18	.80	***2.43	*1.86			
(percent of GDP)	(1.47)	(1.52)	(.95)	(1.08)			
Population aged 0-14	.17	.85	**76	***77			
(percent of population)	(.98)	(.77)	(.37)	(.26)			
Child mortality rate	**12	***-,21	***01	*07			
(per thousand of children 0-5 years)	(06)	(.07)	(.03)	(.03)			
Income per capita in PPP terms ^d	1.82	086	***3.07	**1.65			
	(2.20)	(1.32)	(1.16)	(.81)			
Urbanization (percent of population)	.53	**.71	***.45	***.45			
	(.37)	(.32)	(.15)	(.13)			
Adjusted R-squared	53.78%	48.46%	78.15%	81.05%			
Number of observations	43	42	44	43			
F-statistic	***17.45	***12.29	***60.40	***81.64			
P-Value	0.00	0.00	0.00	0.00			

Source: World Bank estimates.

Table 4.1b: Regression Results for Health Indicators: Log-Log Regressions a

	Infant	Mortality	Child	Mortality
	OLS	2SLS (weighted) ^b	OLS	2SLS (weighted) ^b
Constant	***5.64	***5.49	***6.44	***6.31
	(.89)	(.87)	(1.13)	(1.15)
Health spending	11	*1 4	.11	*14
(percent of GDP)	(.09)	(.08)	(.076)	(.07)
Adult illiteracy rate	***.35	***.39	***.36	***.39
(percent of population 15 or older)	(.07)	(.07)	(.08)	(80.)
Income per capita in PPP terms	**30	**3 4	**37	**39
	(.12)	(.13)	(.15)	(.15)
Urbanization (percent of	19	12	24	19
population)	(.18)	(.22)	(.19)	(.20)
Access to sanitation	`.06	.08	.10	.11
(percent of population)	(.10)	(.11)	(.12)	(.13)
Adjusted R-squared	75.75%	79.89%	77.97%	78.85%
Number of observations	31	29	31	29
F-statistic	27.49	50.99	46.10	65.00
P-Value	0.00	0.00	0.00	0.00

Source: World Bank estimates.

a. Robust standard errors are in parenthesis: *** indicates significance at the 1 percent level, ** significance at the 5 percent level, and * significance at the 10 percent level.

b. By adult illiteracy.

c. Instruments used: aid in percent of government expenditures, military spending in percent of government expenditures, share of unallocated education spending and total government spending.

d. Multiplied by 1000.

a. See footnote 1 in Table 4.1

b. Instruments used: aid in percent of government expenditures, military spending in percent of government expenditures, and total government spending.

Example 32. Inefficiencies in education

Source: Bulgaria. Accelerating Bulgaria's Convergence. The Challenge of Raising Productivity 2007, Vol. 2, Report No. 38570-BG.

5.6. *Increasing efficiency of resource use:* At first glance, the efficiency of resource use looks reasonable when looking at readily available aggregate statistics. For example, overall spending on education as a share of GDP is in line with other countries at similar level of income (4.3 percent of GDP in 2005), and aggregate student-teacher ratios-the most commonly used summary measure in international comparisons of efficiency-are lower than OECD averages in primary and general secondary, but not necessarily excessively so (see Table 5.2).

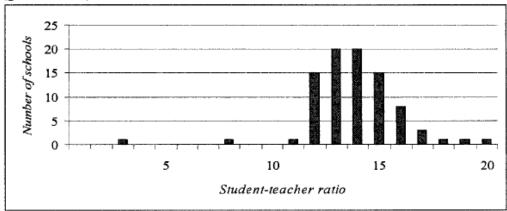
5.7. However, public spending per student has been increasing rapidly since 1997, mostly because student cohorts have declined faster than the number of teachers (resulting in lower S/T ratios) and because of rising teacher salaries. But aggregate figures conceal substantial variation in student-teacher ratios across schools: a large number of schools (31 percent of the municipal schools)—both in rural and urban areas—have exceptionally low student-teacher ratios (less than or equal to 11). Bulgaria's problem of small schools with low student-teacher ratios is partly a result of having a large number of municipalities located in rural, mountainous areas with scattered settlements. However, there is also a large number of schools with low student-teacher ratios located in urban areas (see Table 5.3), where optimization of the school network should be considerably easier, given the short distances between schools. This problem is particularly visible in Sofia's 87 "urban" schools teaching only grades 1-8." The student-teacher ratio in these schools at 13.2 is lower than the national average of 13.9 for similar type schools located in urban areas. There are a number of schools with low student teacher ratios and very few schools which are operating with reasonably high ratios (that is, above 16) (see Figure 5.3). In addition, schools in Bulgaria have a large non-teaching staff for every 100 teachers in the system, there is 43 non-teaching staff.

Table 5.2: Student-Teacher Ratios in Primary and General Secondary

	Primary	Lower Secondary	Upper Secondary	Public spending, % GDP
OECD Average	16.5	14.3	13.0	5.2
EU15 **	14.9	12.1	11.6	
EU8 **	15.1	12.2	12.3	
Bulgaria *	16.7	12.8	12.1	4.3
Czech Republic	18.3	14.3	12.6	4.3
Estonia (01/02)		11.2	10.3	
Hungary	10.6	10.6	13.2	5.5
Latvia		13.5	12.7	
Lithuania		8.5	8.3	
Poland	11.9	12.6	13.5	5.8
Slovenia		13	13.7	
Slovak Republic	19.4	13.9	14	4.3
United Kingdom	20.0	17.4	12.6	5.1
Finland	16.6	9.8	15.9	6.0
France	19.4	13.7	10.6	5.8
Germany	18.7	15.6	13.7	4.4
Sweden	12.3	12.1	14.1	6.5
United States	15.5	15.5	15.6	5.4

Notes: *Bulgaria refers only to public education. The number of teachers based on NSI data (full-time equivalent public teachers). The number of students in primary, lower and upper general secondary based on NSI school level data base.

Figure 5.3: Student-teacher ratios in 87 urban schools in Sofia (grades 1-8)



Source: School level expenditure data base, NSI/MOF/MES/WB

^{**}Not weighted by population size (that is, the average of the countries' student-teacher ratios)

Source: OECD, education at a glance 2005; and National Statistical Institute, expenditure data from 2003, Bulgaria

Table 5.3: Large Variation in Student-Teacher Ratios Translating into Varying Per Student Costs

Location	% of student in municipal schools	% of municipal school expenditure ¹⁰⁹	Average student- teacher ratio	Average expenditure per student	Number of schools
Student-teacher ratio≤11					
City	3.9	4.8	9.3	1,092	99
Village	7.1	10.6	8.9	1,176	695
Total	11.0	15.4	9.0	1,166	794
Student-teacher ratio>11	1				
City	73.9	68.5	14.4	711	1,014
Village	15.1	16.1	14.3	838	769
Total	89.0	84.6	14.3	766	1,783
All municipal schools					
City	77.8	73.3	13.9	745	1,113
Village	22.2	26.7	11.8	999	1,464
Total	100.0	100.0	12.7	889	2,577
Of which: schools with st	tudent-teacher ratio	≥14			
City	41.4	36.1	15.8	665	529
Village	5.9	5.6	17.7	766	278
Total	47.3	41.8	16.4	700	807

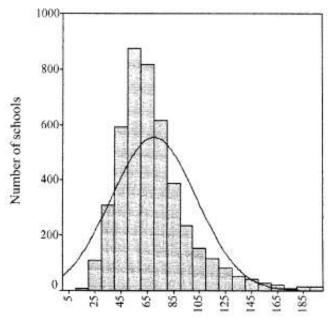
Source: School level expenditure data base, NSI/Ministry of Finance/Ministry of Education and Science, and the World Bank.

Example 33. Variation in student-teacher ratios in primary schools

Source: Benin Enhancing the Effectiveness of Public Spending. A Review of Three Sectors 2004, Report No. 29656-BEN.

Almost 40 percent of primary schools have an average pupil-teacher ratio of more than 70 to 1. The variation in pupil-teacher ratio at the school level is large and the distribution is skewed to the left (see chart). This reflects poor teacher management, the lack of effective norms regarding acceptable pupil-teacher ratios and the lack of incentives for teachers to go to schools with the greatest needs. The government has tried to address this issue by recruiting contractual teachers to specific schools; permanent teachers, however, continue to be transferred according to request.

Chart 3.2: Variation in pupil-teacher ratio in primary schools, 2002-03



Pupil-teacher ratio

Example 34. Translating declines in student population into cost savings

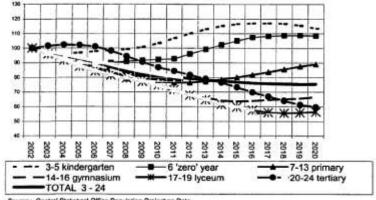
Source: Poland Public Expenditure and Institutional Review 2003. Towards A Fiscal Framework for Growth, Report No. 25033-POL.

In Poland by 2010 relative to 2000, the sector faces a 22 percent decline in the school-age population across all levels of education; by 2020, a 28 percent decline. Poland's demography promises a significant savings dividend if the government can adjust the size of its educational labor force and close and consolidate schools to capture the reduced costs of smaller cohorts. For example, the 1998 unit cost of a primary school student in 1998 was \$1,496. If all those who were 7–14 years old in 1998 had been enrolled, the cost for the 4.9 million children would have been \$7.4 billion. In 2010 the 7–14-year-old cohort is projected to decline to 3.1 million children. Using 1998 unit costs, this smaller cohort translates into a savings of \$2.7 billion, although not all of these savings can be realized because inputs are "lumpy"—even if a class shrinks by 50 percent you still need a teacher, unless classes can be consolidated. If a school loses a third of its students, it cannot be closed and its fixed costs saved unless it can be merged with another school.

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Figure 3.12: Projected Demographic Trends by Level-Specific Ages for 2002-2020 (200 = 100)

Figure 3.12: Projected Demographic Trends by Level-Specific Ages for 2002- 2020 (2002 = 100)



Central Statistical Office Population Projection Data

Example 35. Effects of curricula on innovation-driven growth

Source: Croatia: Country Economic Memorandum: A Growth and EU Integration Strategy 2003, Summary Report, Vol. 1.

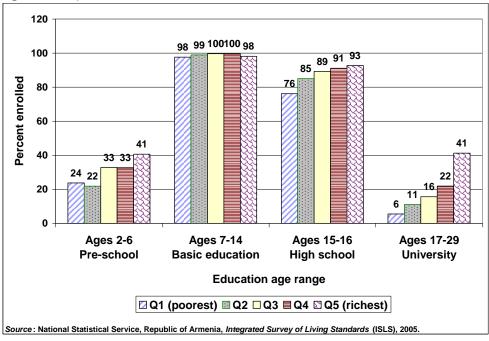
In Croatia employers, teacher unions, university faculty and independent analysts identified the curriculum at all levels of education as the major culprit and barrier to developing the human capital that Croatia needs to support innovation-driven growth.

Example 36. School enrollment by wealth quintile

Source: Armenia Programmatic Public Expenditure 2008. Education and Social Transfers.

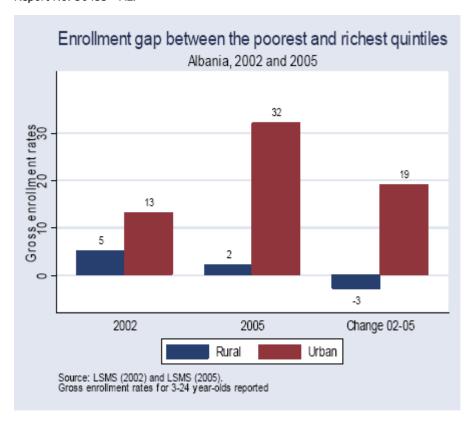
Access to basic education is equitable, but there are clear disparities in access to upper secondary education, and these become even wider for tertiary education. As shown in Figure 14, enrollment rates for basic education (grades 1-8) approach 100 percent for all quintiles, but disparities between quintiles become wider for the higher levels.

Figure 14: Enrollment rates for basic education approach 100 percent for all quintiles, but disparities between quintiles become wider for the higher levels, 2005



Example 37.School enrollment by wealth quintile

Source: Albania A Public Expenditure and Institutional Review 2006, Vol. 2, Report No. 36453 - AL.



Example 38. Collecting data to examine demand for and supply of skills

Source: Bulgaria. Accelerating Bulgaria's Convergence. The Challenge of Raising Productivity 2007, Vol. 2, Report No. 38570-BG.

6.18 An earlier World Bank study presented evidence that there was a mismatch between the skills of graduates and the needs of employers. To get further information on this issue, a small survey of the Bulgarian enterprises was carried out for this study by the Bulgarian Chamber of Commerce and Industry. The aim was to gauge employers' satisfaction with skills of their employees. The survey covered 300 enterprises employing a total of 34,424 employees. The enterprises were of four sizes ranging from micro to large. In the surveyed enterprises, irrespective of their size, the largest category of employees was the graduates of vocational schools (Figure 6.7).

6.19 Employees with tertiary education received the highest combined score for the satisfaction categories (very satisfied, or satisfied), and the lowest combined score for dissatisfaction categories (unsatisfied or very unsatisfied), when the surveyed enterprises were asked to indicate their level of satisfaction with their

employees in relation to their educational attainment. Employees with tertiary education were followed by graduates of vocational secondary schools, the graduates of general secondary schools, and the others. The implied preference of employers for tertiary education graduates is consistent with results of similar surveys in OECD countries. It is also not surprising that the employers prefer people with vocational skills to those with more general (secondary level) backgrounds. But as discussed earlier, the provision of such skills at the secondary level is costlier than the provision of general education. It also increases the risk that if the skills are not needed at some point in time, the lack of a broader general education will make it harder for such individuals to adjust to the demands of the labor market. A number of countries have come to the conclusion that the way forward is some sort of a hybrid general secondary education for (nearly) all, followed by a variety of non-university skill-building options at the tertiary level.

6.20 Overall, the link of the VET institutions to labor market is weak. The challenges facing VET in Bulgaria as identified by NAVET include: (i) improving market intelligence and information availability to potential clients and stakeholders; (ii) developing effective communication and information dissemination framework; (iii) continuously updating the occupational standards in line with the needs of employers; (iv) devising effective continuing VET programs to close the competency gap with EU; (v) creating incentive mechanisms to motivate the employers and workers to appreciate the need for and effectively participate in continuing VET; and (vi) mobilize and coordinate the efforts of all social partners, local authorities, NGOs and other to actively participate in the process.

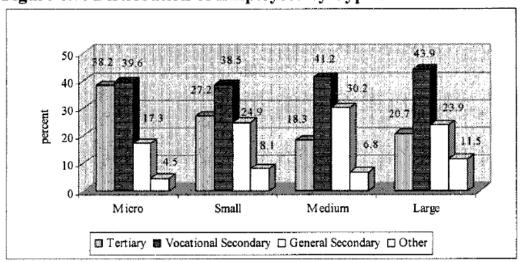
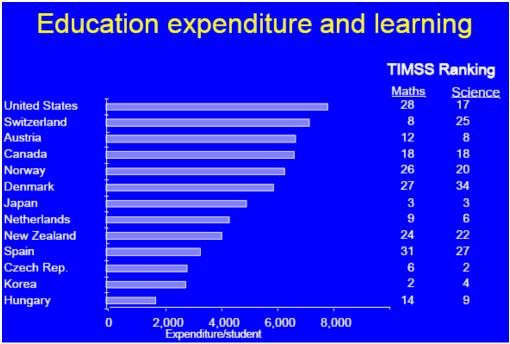


Figure 6.7: Distribution of Employees by Type of Education

Example 39. Per student spending has little effect on learning outcomes

There is little relationship between per student education expenditure and learning outcomes, as measured by the Third International Mathematics and Science Study (TIMSS).



Source: Elizabeth King.

Example 40. Measuring education system performance

Source: The Republic of Uganda: Public Expenditure Review 2003. Supporting Budget Reforms at the Central and Local Government Levels, Report No. 27135-UG.

Operational Efficiency

4.65 The education sector has gradually developed a culture of assessing budget efficiency by minimizing its costs and maximizing its outputs and outcomes. Unlike other sectors, the education sector now conducts annual tracking studies. The sector has also used annual reviews, internal audits, and end-of-project evaluations to improve the flow of resources as well as its overall operational efficiency. To ensure that reforms are followed through, the findings of tracking studies are usually discussed during the ESR and incorporated into the sector's action plan for the following year. Implementation of recommendations arising from the tracking studies is carried out through the Education Sector Consultative Committee and the ESRs.

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4.66 The most recent study carried out in the education sector tracks teacher recruitment and access to payroll. The results identify specific loopholes, including gaps in the overall system of recruitment and payroll, which have led to delays in recruitment and a lagging commitment to teacher recruitment at the district level. The study found that teacher recruitment is further encumbered by an inadequate knowledge of the guidelines among chief administrative officers (CAOs), who delayed hiring new teachers, and among new teachers, who delayed submission of their acceptance letters and taking up their appointments-especially if their deployment was to remote areas.

4.67 The tracking study also identified problems with payroll and financial management that were causing delays in payroll access, including the appointment of teachers in contravention of standing regulations. Recommendations to improve teacher management based on the results of the study were presented by the ESR, and a number of actions to be taken for improving the number of teachers on the payroll (especially for the 10 districts with the worst PTR) will be incorporated into the sector's action plan. This process reflects the institutionalization of budgetary efficiency issues in the education sector whereby tracking studies and the operational constraints they identify are linked to sector action plans through the ESR. Given the progress made in identifying allocative and operational constraints through tracking studies, there is an increased need for the education sector to effectively integrate the recommendations into sector plans, to implement and subsequently track their progress and improve overall efficiency.

4.68 Five years into the UPE program, sector policy is focusing increasingly on post-primary education, given the current pressures on existing facilities as a result of the UPE bulge. For example, in 2002, 401,555 students sat for the Primary Leaving Examination and applied to secondary schools. Currently, the available post-primary schools and institutions can absorb only 50 percent of these primary school leavers. The situation will be compounded in 2004, when about 900,000 UPE candidates will be seeking admission to post-primary institutions (MOES 2002).

Table 4.10 Actual and Projected Growth in Primary 7 Leavers, 1997-2003

Year	1997	1998	1999	2000	2001	2002	2003
Number of PLE	211,749	250,726	270,449	304,636	363,801	401,555	461,788
candidates							
% increase	0%	20%	8%	13%	19%	10%	15%

Note: PLE = Primary Leaving Examination.

Source: Uganda National Examinations Board. The 2003 figure is an estimate.

and costed framework that makes provisions for absorbing the UPE bulge into post-primary education. To arrive at the PPET policy framework, the MOES commissioned eight policy studies in 2001/02 on thematic issues to form the basis for the policy.

- 4.70 The efficiency measures agreed upon for implementation of the PPET strategy include increase in the teaching load (implementation of this has begun), selective use of double shifting in areas where it is appropriate, particularly in urban day schools, where the student concentration is particularly high. Establishment of a double shifting pilot for primary schools has been slow, although scaling up of the effort is planned during the 2003 school year.
- 4.71 The report on costed options for the PPET policy recommends a range of efficiency measures and outcomes that would respond to the urgent need to expand access to PPET as the number of primary graduates increases. Among the recommendations are a requirement that secondary teachers teach at least two subjects, slowly increasing the PTR from 17 to 30, expanding 0-level general secondary education, and slowing down the construction of community polytechnics.
- 4.72 A value-for-money analysis of the school facilities grant program has been agreed upon for fiscal year 2003/04 and the Terms of Reference are being developed for discussion with various stakeholders. In addition, a tracking or a value-for-money audit on the SFG program will be completed for the October 2003 ESR.

Example 41. Regional variations in educational outcomes

Source: Guatemala Public Expenditure Review 2005, Report No. 32376.

3.6 Educational outcomes are also very inequitably distributed in both the primary and secondary level. Household survey data indicate that about 60 percent fewer people complete primary in rural than in urban areas and about 90 percent fewer complete secondary in rural than in urban areas (Table 3.2). Differences are also very substantial across income quintiles, which shows that while about 60 percent of the upper income quintile (quintile 5) is expected to reach grade 12, only about 15 percent of the lowest income quintile (quintile 1) is expected to do so. In contrast to other Central American countries, females in Guatemala have much lower educational attainment (4.9 years versus 6.2 year for males), lower GER and NER in primary and secondary, and much lower completion rates in primary and secondary than males. Finally, Guatemala shows limited progress toward rectifying existing educational inequities for indigenous students over the past decade (indigenous people still have a poorer

performance in all indicators). Annex I includes more information on completion rates by income quintiles, urban-rural areas, regions, ethnicity and gender.

Table 3.2: Evolution and Distribution of Completion Rates Across Income Quintiles, Regions, Areas, Ethnicity and Gender

	% pr	imary com	plete ¹	% bas	% basic cycle complete ²			% diversified cycle complete ³		
	1989	2000	2002	1989	2000	2002	1989	2000	2002	
Country	32.0%	37.4%	45.4%	14.5%	27.3%	27.2%	11.6%	18.4%	19.5%	
Quintile										
1	7.4%	9.6%	n.d.	1.5%	0.8%	n.d.	1.2%	1.3%	n.d.	
2	19.0%	26.0%	n.d.	3.3%	4.0%	n.d.	0.9%	3.2%	n.d.	
3	34.2%	35.0%	n.d.	5.8%	18.5%	n.d.	3.9%	4.3%	n.d.	
4	53.7%	51.3%	n.d.	26.8%	30.7%	n.d.	12.9%	21.8%	n.d.	
5	71.8%	68.4%	n.d.	46.0%	62.9%	n.d.	38.3%	46.4%	n.d.	
Region										
Metropolitana	57.1%	56.2%	68.9%	27.3%	51.5%	48.5%	29.4%	34.4%	36.9%	
Norte	17.1%	13.0%	24.9%	6.3%	10.1%	12.9%	8.2%	5.5%	7.5%	
Nororiente	36.4%	42.1%	43.2%	18.0%	12.3%	24.0%	6.6%	23.4%	17.4%	
Suroriente	27.1%	37.2%	45.9%	12.4%	18.3%	23.2%	4.9%	9.2%	14.3%	
Central	41.9%	40.3%	51.5%	19.1%	24.9%	28.4%	10.5%	15.3%	20.0%	
Suroccidente	23.5%	36.0%	42.8%	10.3%	28.2%	24.1%	6.7%	17.9%	16.1%	
Noroccidente	15.7%	17.9%	28.6%	3.3%	10.0%	12.9%	1.7%	6.9%	8.7%	
Petén	28.4%	34.9%	35.8%	6.9%	15.8%	20.9%	5.2%	9.9%	12.3%	
Area										
Urban	55.9%	60.4%	62.9%	31.4%	49.7%	44.4%	27.3%	32.9%	33.7%	
Rural	19.7%	23.2%	32.0%	5.3%	12.2%	12.2%	1.8%	7.4%	6.3%	
Sex										
Male	34.0%	40.8%	46.8%	15.5%	31.1%	28.5%	14.0%	19.7%	57.0%	
Female	30.1%	33.9%	44.0%	13.5%	23.4%	25.8%	9.7%	17.2%	36.6%	
Ethnicity										
Indigenous	14.3%	22.0%	30.1%	2.0%	13.4%	13.2%	1.4%	6.8%	7.6%	
Notindigenous	41.9%	47.8%	56.4%	21.5%	35.3%	37.2%	18.0%	25.0%	28.0%	

- 1. Proportion of 14-year old population with 6 years or more of schooling;
- 2. Proportion of 18-year old population with 9 years or more of schooling;
- 3. Proportion of 20-year old population with 11 years or more of schooling;

Source: Lavarreda (2005).

Example 42. Teacher absenteeism

Source: Honduras Public Expenditure Review 2007, Vol. 2, Report No. 39251-HO.

5.77 At the core of the needed changes is the effort to convert the country investment in education into learning time and education quality. Frequent school closures (strikes, weather, teacher training, extra holidays), teacher absenteeism and tardiness, reduces the class time devoted to any learning task. According to the school census, 40 percent of teachers in Honduras missed one month or more of school in 2000 (World Bank, 2005). Also problematic is that

the gravity of the absenteeism problem may not be fully acknowledged, as few principals in Honduras (a mere 7 percent) consider high absenteeism to be a problem in a school survey conducted by UMCE (2003).

Table 5.21 Measures of Teachers Efforts

Teachers' Absences	
Teachers' yearly absences (days)	16
Teachers with no month away (%)	60
Teachers with 1 month away (%)	26
Teachers with 2 or more months away (%)	14
Average hours per week	30
Average declared hours per week according to ho	usehold survey
Primary and Secondary	33
Primary	31
Secondary	38

Source: World Bank (2005)

5.78 Using a 42 normal weeks per year and 21 hours of weekly teaching hours; an estimated losses of 4 weeks due to teachers' absences and 3 weeks of school closings due to non-teacher absence reasons, World Bank (2005) obtained an estimated 735 hours of effective number of class hours per year which corresponds to 83 percent of the 882 notional class hour per year (or 61 percent of the 1,200 notional hours of Europe).

Example 43. Links between government plans and public expenditures

Source: Pakistan Public Expenditure Management: Strategic Issues and Reform Agenda 2004, Vol. 1, Report No. 25665-PK.

For a discussion of public expenditures tightly linked to government plans for the education sector (education sector reform) see Pakistan PER 2004, Vol. 1.

Example 44. Recommendations and policy priorities

Source: Mauritania Public Expenditure Review. Focusing Public Expenditure on Growth and Poverty Reduction 2004, Report No. 29167-MAU.

Policy priorities

4.71 This section has highlighted a number of weaknesses in the performance of the education sector. The following critical areas have been identified for policy improvement and action for the successful attainment of the goals set in the Education Sector Development Program which are similar to education for all and the millennium development goals for education.

4.72 Completion rates. Existing evidence on the general causes of low

completion rates points to the large proportion of incomplete primary schools (87 percent) and the high levels of repetition and dropout rates. The low level of completion rates reduces the likelihood of Mauritania being on track to achieving the millennium goals. The government needs to step up actions aimed at accelerating the process of providing complete cycle schools by using a combination of strategies including the construction of new classrooms, and the extensive use of multi-grade classes particularly in areas that are sparsely populated.

4.73 Quality and Efficiency. The poor quality of education reflected by low levels of learning outcomes at all levels of the education system is a priority area for immediate government intervention. Quality improvement results in reduced repetition, greater efficiency and affordability. The challenge is for the GIRM to move from a narrow focus of academic performance to an emphasis on learning outcomes for all children. This calls for a more holistic approach where the needs of the learner, within the classroom and the school are looked at carefully. A set of necessary conditions that flow from this approach include: (i) developing committed and motivated teachers; (ii) defining and implementing appropriate curricula; (iii) providing appropriate teaching and learning materials; (iv) using appropriate languages for teaching and learning; (v) promoting community participation in school activities; (vi) managing physical assets effectively; (vii) strengthening school based management; (viii) undertaking meaningful assessments and using the results as feedback to enhance teaching; (ix) creating a child-friendly learning environment; (x) improving the supervision of schools; and (xi) increasing learning time at school and harnessing new and old technologies.

4.74 Language Skill Development. The 1999 education reform institutionalized bilingual education at the primary and secondary levels of education but the majority of teachers are still monolingual. The existing teacher training colleges lack the capacity produce a sufficient number of bilingual teachers to be deployed into the school. Consequently, a challenge for the government is to attract into the teaching profession high school graduates who have had their secondary general education especially in French and who can communicate in Arabic. Extra efforts need to be made to provide intensive language training to existing teachers who have the potential of becoming bilingual and current preservice teacher education programs need to be revised to include language skills training. In-service teacher courses must also be organized to strengthen the language capacity of teachers in the schools.

4.75 Finance and Resource Allocation. The need to finance activities of the

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reform as well as other educational services cannot be overemphasized. It is desirable that the new funds available to the sectors from the HIPC and EFA Initiatives are allocated to activities that have the highest marginal returns. The challenge is not so much how much funding is allocated to education but how efficiently and how effectively the resources are used. Expenditure allocations should be guided by information about the system as well as further analytical work (cost/benefit analysis of alternative forms of investments in order to optimize resource utilization, benefit incidence analysis of education spending in recent years). The GIRM could also encourage other service providers such as the private sector (including non-governmental organizations) to play the role of provider of services and or sources of finance.

- **4.76 Educational Management.** At present, the management of the education system in Mauritania is fairly centralized although there are regional services that often rely on the central level for management decisions. The government's challenge in this area is to balance decentralization of decision making to local levels while making sure that the central level oversees the quality and coherence of the entire system. Decentralization is not a panacea to the problems of education systems. Irrespective of what option is chosen with respect to decentralization, a critical action for the improvement of the efficiency of the system is to increase schools' autonomy. Greater autonomy of the school and better links between the school and the community hold great potential for the improvement of opportunities for learning.
- **4.77 Equity focus.** Currently, there are great disparities in educational opportunities for children from different socio-economic backgrounds and for those living in urban and rural areas. As noted above, Mauritania has high enrolment ratios but retention rates are low. The challenge for the government is to enable all children to have access to primary education by constructing sufficient numbers of classrooms, rehabilitating deteriorating physical and using existing structures more efficiently through double shifting and multi-grading. Gender equality in schooling is also a challenge that needs to be addressed. Educational opportunities for girls can be made equal to that of boys by ensuring that there are more female teachers in the system, that schools are well equipped to cater to girls' needs, and that teachers are trained to be gender sensitive.
- **4.78 Institutional Capacity Strengthening.** The challenge to strengthen institutional capacity in the Ministry of Education from the central through the regional and district to the school level is urgent. The current limited capacity to budget, and to utilize resources more effectively and with accountability further

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undermines the Ministry's capacity to manage the sector. Without sufficient capacity to plan, manage and maintain the education sector, the government of Mauritania will find it difficult to attain the goal to provide education of good quality. Technical capacity, including the development of appropriately trained education specialists, economists and statisticians who can research and analyze sector issues is crucial and needs to be encouraged. Strengthening existing capacity and creating new capacity to realize and sustain the new vision is essential.

4.79 Donor coordination. The Government of Mauritania receives significant support from external development partners in forms that vary from financial resources to knowledge sharing. However, past efforts made within the context of education projects by various development agencies have remained largely uncoordinated and often overlap. The challenge is for the government of Mauritania to lead and organize all donors to work in partnership amongst themselves and with the government towards achieving the objectives of the reform.

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Examples of Good PERs in Education

- Albania PER (FY06): Report No. 36453 AL
- Algeria PER (FY07): Report No. 36270 DZ
- Armenia PER (FY08): Education and Social Transfers
- Brazil PER (FY03): Report No. 24413-BR
- Ethiopia PER (FY04): Report No. 29338-ET
- Guatemala PER (FY05): Report No. 32376-GT
- Honduras PER (FY07): Report No. 39251-HO
- Indonesia per (FY07): Report No. 38772
- Maldives PER (FY02): Report No. 24238-MV
- Turkey PER (FY01): Report No. 22530-TU
- Benin (FY04): Report No. 29656-BEN
- Uganda PER (FY07): Report No. 40161-UG

Data Sources

- Organisation for Economic Co-operation and Development. Education at a Glance: OECD Indicators. Paris: Center for Educational Research and Innovation: http://www.oecd.org/edu/ceri/
- UNESCO Institute for Statistics: http://www.uis.unesco.org/
- Education For All Fast Track Initiative: http://go.worldbank.org/I41DLBA8CO
- Educational Attainment and Enrollment Around the World:
 http://www.worldbank.org/research/projects/edattain/edattain.htm
- International Institute for Applied Systems Analysis Database on Educational Attainment for 120 Countries 1970-2000 using demographic back-projection methods:
 - http://www.iiasa.ac.at/Research/POP/edu07/index.html?sb=11
- EdStats: Internal website at http://sima.worldbank.org/edstats/
 External website at http://go.worldbank.org/ITABCOGIV1
- Development Data Platform (includes World Development Indicators):
 http://DDP/ or http://go.worldbank.org/DNBRRS9TB0 (internal website)
- TIMSS AND PIRLS Database: http://lighthouse.air.org/timss/

Relevant Thematic Groups

- Economics of education
- Decentralization
- Administrative and civil service reform

Relevant World Bank Websites

- World Bank Database of Public Expenditure Reviews for Education: http://go.worldbank.org/004MJCP3E0
- Economics of education: http://www.worldbank.org/education/economicsed/index.htm
- Public Services Research (including PETS and QSDS): http://econ.worldbank.org/programs/public_services/
- World Development Report, 2004: http://econ.worldbank.org/wdr/wdr2004.

References

Ablo, Emmanuel, and Ritva Reinikka. 1998. "Do Budgets Really Matter? Evidence from Public Spending on Education and Health in Uganda." World Bank Policy Research Working Paper 1926. Washington, D.C.

Angrist, Joshua, Eric Bettinger, Erik Blom, Elizabeth King, and Michael Kremer. 2002. "Vouchers for Private Schooling in Colombia: Evidence from a Randomized Natural Experiment", *American Economic Review* 92(5): 1535–1558.

Bentaouet Kattan, Rasja and Nicholas Burnett. 2004. *User Fees in Primary Education.* Washington, D.C.: Education Sector, Human Development Network, World Bank.

Birdsall, Nancy, Amina Ibrahim, and Geeta Rao Gupta. October 2004. "Achieving the Millennium Development Goal of Universal Primary Eucation." United Nations Millennium Project Task Force on Eucation and Gender Equality. Draft.

Blöndal, Sveinbjörn, Simon Field, and Nathalie Girouard. 2002. "Investment in Human Capital Through Upper-Secondary and Tertiary Education." In *OECD Economic Studies No. 34, 2002/I.* Paris: OECD.

Brenneman, Adam and Michel Kerf. 2002. "Infrastructure and Poverty Linkages: A Literature Review." World Bank, Washington, D.C. Draft.

Bruns, Barbara, Alain Mingat, and Ramahatra Rakatomalala. 2003. *Achieving Universal Primary Education by 2015: A Chance for Every Child.* Washington, D.C.: The World Bank.

Demery, Lionel. 2003. "Analyzing the Incidence of Public Spending." Draft. In F. Bourguignon and L. Pereira da Silva, eds., *Evaluating the Poverty and Distributional Impact of Economic Policies (Techniques and Tools).* Washington, D.C.: The World Bank and Oxford University Press. [www.worldbank.org/poverty/psia/tools.htm].

Fiszbein, Ariel and Norbert Schady with Francisco H.G. Ferreira, Margaret Grosh, Niall Keleher, Pedro Olinto, and Emmanuel Skoufias. 2009. *Conditional Cash Transfers. Reducing Present and Future Poverty*, World Bank, Washington, D.C.

Golladay, Fredrick. 1997. "The Hungarian Higher Education System." In Sue E. Berryman, Neil Boyle, Fredrick Golladay, Malcolm Holmes, Philip Keefer, and

Kenneth Sigrist. *Guidelines for Assessing Institutional Capability.* World Bank, Washington, D.C. Draft.

Hall, Gillette and Harry A. Patrinos (Eds.) 2006. *Indigenous Peoples, Poverty and Human Development in Latin America*. Basingstoke: Palgrave Macmillan.

King, Elizabeth. 1997. "Who Pays for Education in Indonesia? The Role of Government and Families." In C. Colclough, ed., *Marketizing Education and Health in Developing Countries: Miracle or Mirage?* Oxford, U.K. and New York: Clarendon Press.

Lanjouw, Peter, and Martin Ravallion. 1999. "Benefit Incidence, Public Spending Reforms, and the Timing of Program Capture." *World Bank Economic Review* 13(2): 257–73.

Lewis, Maureen, A. and Marlaine Lockheed. 2007. *Inexcusable Absence: Why 60 Million Girls Still Aren't In School and What to do About It.* Center for Global Development, Washington, D.C.

Lewis, Maureen, A. and Marlaine Lockheed (Eds.). 2007. *Exclusion, Gender and Education: Case Studies from the Developing World.* Center for Global Development, Washington, D.C.

Lewis, Maureen, A. and Gunilla Pettersson. 2009. "Governance in Education: Raising Performance in the Sector", Mimeo, World Bank, Washington, D.C.

Mingat, Alain, Jee-Peng Tan, and Shobhana Sosale. 2003. *Tools for Education Policy Analysis*. Washington, D.C.: The World Bank.

OEC. Various years. *Education at a Glance: OECD Indicators.* Paris: Center for Educational Research and Innovation, Organisation for Economic Co-operation and Development.

OECD. 1997. *Literacy Skills for the Knowledge Society.* Paris: Organisation for Economic Co-operation and Development. Canada: Human Resources Development Canada, and Statistics, Canada.

Perkins, Gillian. 1998. "The Georgian Education System: Issues for Reform Management." Background paper for the 1998 Georgia Education Sector Strategy Note, Europe and Central Asia Region, Human Development Unit. World Bank, Washington, D.C.

Pradhan, Sanjay. 1996. "Evaluating Public Spending: A Framework for Public Expenditure Reviews." World Bank Discussion Paper 323. World Bank, Washington, D.C.

Pritchett, Lant. 2001. "Where Has All the Education Gone?" World Bank Economic Review 15(3): 367–91.

Swaroop, Vinaya. 1999. "Public Expenditure Reviews: Progress and Potential." PREM Note 20. World Bank, Washington, D.C.

Vandermoortele, Jan, and Rathin Roy. 2004. *Making Sense of MDG Costing*. Poverty Group, UNDP.

Van de Walle, Dominique. 1998. "Assessing the Welfare Impacts of Public Spending." *World Development* 26(3): 365–79.

Van de Walle, Dominique. 2003. "Behavioral Incidence Analysis of Public Spending and Social Programs." Draft. In F. Bourguignon and L. Pereira da Silva, eds., *Evaluating the Poverty and Distributional Impact of Economic Policies (Techniques and Tools)*. Washington, D.C.: The World Bank and Oxford University Press

Withers, Kathleen, and Jee-Peng Tan. 2004. "Methodological Differences in Costing the Education MDGs in Ethiopia: MAMS, MP & EPSM." World Bank, Washington, D.C.

World Bank. 1996. "Vietnam Education Financing." Sector Report 15925-VN, Human Resources Operations Division, Country Department I, East Asia and Pacific Region. World Bank, Washington, D.C.

World Bank. 1999. "Russia: Regional Education Study." Europe and Central Asia Region, Human Development Sector Unit. World Bank, Washington, D.C.

World Bank. 2003. WDR 2004: Making Services Work for Poor People. Washington, D.C.: Oxford University Press and the World Bank.

World Bank. 2004. Benin: Enhancing the Effectiveness of Public Spending —A Review of Three Sectors. Report 29656-BEN. World Bank, Washington, D.C.

World Bank. 2004. "Costing the Education MDGs: A Review of the Leading Methodologies." Draft.

World Bank. 2007. *Are You Being Served? : New Tools for Measuring Service Delivery*, edited by Samia Amin, Jishnu Das, and Markus Goldstein. World Bank, Washington, D.C.

Specific Guidance for **HEALTH**



Preparing PERs



for Human



Development



Preface

These tools for analyzing public expenditures in HD sectors are part of a larger process to improve the treatment of human development issues in PRSCs, PERs, development policy lending and other cross-sectoral or macroeonomic analyses. The specific goal of these interlinked PER guidance notes is to support and spark the imagination of people tasked with analyzing expenditures in HD sectors—to help them learn from better than average examples and to make it easier to use the many resources already available.

The revision of the PER guidance was initiated by Maureen Lewis when she was Interim Chief Economist HD. Gunilla Pettersson undertook the update of the PER guidance. Many thanks to the following people for providing insight into the PER process and useful comments on how to improve the existing guidance: Cristian Aedo, Christian Bodewig, Jim Brumby, Pablo Gottret, Margaret Grosh, Robin Horn, Harry Patrinos, Christine Lao Pena, Stephane Legros, Maureen Lewis, Mattias Lundberg, Cem Mete, Montserrat Pallares-Miralles, Suhas Parandekar, Emilio Porta, Pia Schneider, Lars Sondergaard, Emil Tesliuc, and Erwin Tiongson.

The original PER guidance was launched in 2004 and led by Maureen Lewis, managed by Sue Berryman and carried out by Dina Abu-Ghaida and Sue Berryman (education), Dov Chernichovsky and Mattias Lundberg (health) and Margaret Grosh (social protection).

User's Guide

Checklists

It is important that this Health Guidance checklist be used in conjunction with the Core Guidance checklist. The latter checklist addresses cross-cutting issues, such as data sources and the selection and judicious interpretation of comparative data.

The guidance note given here is not to be taken as a minimum list where the authors must tick every box. Every PER must be selective in what it covers, with the selection of topics based on many factors—what is needed to underpin the country dialogue, what is already known and packaged elsewhere, what is manageable to do given constraints on time, data and funding, etc. This guidance note is meant to remind the analyst of the main features that might normally be included in the health chapter of a PER. Omissions will often be made, but with some justification in mind. In addition to agreeing in the concept note on the planned coverage of topics, it may be useful to convey to the reader of the full report the reasons for omissions of major themes. Similarly the depth of treatment and number of programs covered in depth will need to be considered, agreed and explained.

Note also that the guidance note is organized as a checklist rather than an outline or table of contents. While a report might be organized along these lines, there are many other outlines that could be effective. One option might be to work around the core PER questions of: Where does the money come from? Where does the money go? What does it buy? How could spending be improved? Another outline might be to present first the situation with all basic analyses, followed in a second section by a discussion of issues and in a third section by options for reform.

Notes

In many places in the checklist the symbol **Note** appears. The text of all the notes follows the checklist itself. Some are short text, which explain further what is meant in the checklist. Often the notes contain references to methodological material or to sources from which international comparators may be drawn.

Examples

In many places in the checklist the symbol Example appears. The text of the examples follows the text of the notes, each starts on a new page, with running headers to help the reader navigate. The examples are excerpts of a page, table or series of pages meant to show at least one interesting case of application of the themes contained in the checklist. In addition to using the varied examples that form some sort of composite "model" PER chapter, it may be useful to the task team to look at a few actual PERs, though of course no single report is exemplary in all ways.

Bibliography

Short references are given in the individual notes and examples. Full references are contained in the unified bibliography. For the majority of documents materials are available via the World Bank website or the internet.

Specific Guidance for Health



This document provides guidance for preparing a PER for the health sector. The PER may be prepared specifically for health, or it may cover the social sectors more generally, or it may be a specific chapter in a larger PER. The guidance that follows this introduction is divided into sections dealing with specific topics these might correspond to subsections in the health chapter of a larger PER, or to individual chapters in a background paper on the health system. For general perspective and orientation, however, some points are worth noting at the outset.

The guidance here is comprehensive. It assumes an ideal situation where the team can deal with all the issues and have all the data and resources required including time for the task. This is, of course, unlikely in the majority of situations. This begs the question: What should be the "core" topics, required of any PER? But this is the wrong question to ask. The scope and depth of the analysis should be driven not by some mandatory requirements, but by the issues and characteristics important in each case.

The PER might confine itself to issues of particular interest, or of special concern in the country. Or as is frequently the case, data and resource limitations, possibly compounded by institutional and political constraints, may limit the scope of the work. It is important therefore to acknowledge at the outset the scope of the report and the issues addressed. These choices, and the limitations implied, must be justified explicitly in the report.



The PER is about finance. But finance is not an end in itself. It is a means to enable and facilitate the provision of health care in an equitable and efficient manner. This is what distinguishes a PER from National Health Accounts.



Financing for health care comprises multiple sources of funding, methods of allocating funds and modes of paying providers. Different sources of funding health care affect the economy and society differently. And private financing and provision are often more important than public. So, to ignore the private sector would severely handicap the understanding of the sector. Although the PER

should focus on *public* expenditure, it is important to examine the interactions between the public and private sectors, especially since one function of public expenditure is to encourage private action to improve health.

The multiplicity of sources of funding care, including donor contributions, raises the question of sustainability—the availability of funding over the intermediate and long terms. This issue is particularly acute when certain types of care depend on funding (such as from donors) that might not be sustained.

The PER is primarily concerned with public financing and public provision of care. Neither should be taken for granted. Financing and provision are either highly regulated or outright managed by the state. But the rationale for state involvement in financing and provision must be explicitly justified, and its consequences explicitly acknowledged. Public involvement in finance and provision is often defended by reference to theoretical abstractions such as scale economies and market imperfections. These conditions may hold, but they must be supported by evidence rather than merely assumed.

The PER must address the following broad questions:

- How are health spending and services distributed among the population?
- How efficient is the provision of health care and other related interventions?
- What are the macroeconomic consequences of revenues and expenditures?
- What is the impact on equity of sources and levels of revenues?

Guidance for preparation

1. Introduction

- · Objectives of the PER.
 - To examine the flow of funds within the public sector and with a public policy focus.
 - To examine the performance of the system in ensuring and financing the provision of care and improving welfare.
 - o To examine some specific aspect of sector performance.



- Objectives of the health system: goals of the government and the ministry.
 - In general and for specific target groups (such as children or expectant mothers).

- o For preventive and curative care.
- o Equity.
- o Cost containment.
- o The relevance of these goals, given resources and risks.
- National context.
- o Income, income distribution and poverty.



2. Health status and health risks

- · Health status indicators.
 - o Over time.
 - Growth and the macroeconomic environment.
 - Associated economic policies (HIPC, PRSP). In comparison with other countries.
 - o Incidence among population—by region, ethnic group and so on.



- · Health risks.
 - o Demographic, environmental, behavioral.
 - o Communicable diseases such as HIV/AIDS.
 - o Noncommunicable diseases such as hypertension and heart disease.



• Emerging concerns—what factors will become more important in the short and medium term.

3. Public resource mobilization and sources of finance

- Public funds.
 - o In total.
 - o By ministry and level of government.



- Public funds—sources.
 - o General and earmarked revenues.
 - o Specific mandatory and voluntary contributions.
 - o Debt (including arrears).
 - o Donor contributions—bilateral, multilateral, NGO.
 - · General budget support.

- · Specific (such as project) expenditure.
- · Sustainability of donor funding
- · Off-budget funds.
 - o Domestic (such as national health insurance funds).
 - o Foreign—debt, donors and NGOs.
- Public revenues from private sources.
 - Out-of-pocket:
 - · Fee-for-service.
 - · Informal payments for public services.
 - Formal co-payments and insurance premiums (such as social insurance).
 - Sickness funds.



- Fiscal and macroeconomic impact of different sources of finance.
 - o Taxes.
 - o Debt.
 - o Donors.
- Equity and welfare impact of different sources of public finance.
 - o Taxes.
 - o Debt.
 - o Donors.
 - o Out-of-pocket.

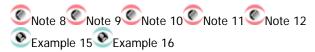


Note 13 Note 14



4. Health expenditure

- Total expenditure on health services.
 - o Public expenditure:
 - In total.
 - · By ministry/agency and level of government, including local.
 - · On- and off-budget expenditure.
 - · Direct expenditure by donors (not through budget).
 - Arrears.



- o Private expenditure:
 - Employers.
 - · Households (including out-of-pocket, catastrophic).
- o Other.



- Functional allocation of expenditures.
 - o By level and type of care:
 - Primary.
 - Secondary.
 - · Tertiary and higher.
 - Public health interventions (such as aerial spraying, information and education campaigns).
 - o By output, cost center or broad DRG.



- Economic allocation.
 - o Capital (investment) expenditures.
 - o Recurrent expenditures.



- Direct allocations to consumers.
 - Vouchers.
 - Tax credits to employers and consumers.
- Inventory of resources—manpower, inpatient beds and the like, if available.
 - o Distribution—by region, level of service and so on.
 - Public sector:
 - Ministry of health.
 - Other ministries/agencies.
 - · District and local governments
 - Private sector.
- Incidence of expenditure and resource allocation (such as doctors per capita), across regions, income classes and the like.
 - o Public expenditure.
 - Private expenditure.
 - · Incidence of "catastrophic" expenses.
 - · Household use of savings, transfers and so on.

Measures of distribution and incidence.



5. Health system coverage and outputs

- · Volume and mix of services delivered.
 - Type of care (immunizations, supervised deliveries, antenatal care, outpatient visits, inpatient days).
 - By whom (central ministry, districts, other agencies, private sector, donors).
- Note 19 Example 23
- Distribution of services—by region, urban or rural residence, income class, ethnic group, sex.
- Example 24
- Who is covered by public services (number and characteristics of beneficiaries)?
 - o Insurance (general population).
 - Social security (define eligible groups).
 - Civil service coverage (nature and extent of programs).
- Who is covered by private services (number and characteristics of beneficiaries)?
 - o Formal, employment-based insurance.
 - Other private formal insurance.
 - o Informal insurance (such as cooperatives).
 - o Medical savings plans.
 - o Community financing.
 - o Prepayment schemes and sickness funds.
- Incidence and equity of coverage.



• Moral hazard—differences in behavior of those covered and not covered

6. Health sector policy, budgeting and management

• Budget management.

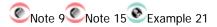
- o What is the budget process?
- o How are levels of expenditure determined?
- o How is the allocation of expenditures determined?
- o How are the sources of revenue determined?
- o How are fees established?
- o Cost containment policies and practices.



- · Payment mechanisms to facilities.
 - o Direct budget allocation.
 - o Fee-for-service.
 - Capitation.
 - o DRGs.
 - o Other.
- · Payment mechanisms to individual providers.
 - o Direct payment of wages.
 - o Fee-for-service.
 - o Capitation.
 - o DRGs.
 - o Other.
- Institutions and stakeholders.
 - o Who are they?
 - · Government (central or local).
 - Provider associations.
 - · Consumers.
 - What role do they play and how much influence do they have in policy formation?



- Governance.
 - o Indicators of management effectiveness.
 - · Inefficiency, incentives and principal-agent problems.
 - Mismanagement and corruption (informal payments, missing expenditure, absenteeism).



- Contracting for service provision
 - o Public contracts for private providers.
 - o Public contracts for public providers.

 Terms and conditions of contracts (such as performance-related payments).



- Training and medical education.
 - o Who pays?
 - o Who provides training (Ministry of Health, Ministry of Education, other)?
 - o Number and specialization of students.
- Public research and development investment

7. Recommendations

- Summarize the evidence
 - o What are the goals of the health system?
 - o What are the major obstacles to meeting these goals?
 - Supply-side constraints (insufficient supplies, poor management, etc.).
 - Demand-side constraints (poverty, high prices, travel times, etc.).
- Recommendations for changes to improve policy, programs and actions.



- Assess short-run and long-run costs and other implications of recommendations (possible unintended consequences).
- Establish priorities.



- · Suggest indicators for monitoring.
- Counterfactual—what is likely to happen in the absence of reforms?



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Note 1. PERs and National Health Accounts

PERs and NHAs are highly complementary. NHAs provide the data for analysis, and they can be an essential component of a PER. The purpose of NHA is the "systematic, comprehensive and consistent monitoring of the resource flows in a country's health system" (Poullier and others 2002). This includes all flows of resources within the health system: resource mobilization, pooling, allocation and distribution.

NHAs are primarily an accounting tool—a sequence of identities—in which total revenue is required to equal total expenditure, which equals consumption plus investment. These accounting identities are usually presented as a series of tables that include and classify all agents and transactions within the sector, and that can be used to trace the flows of resources from source to final use. This is analogous to general national income accounting, or more precisely to input-output matrices. NHA tables are often sufficiently disaggregated to provide data for benefit incidence analysis; and they may include inventories and outputs, as well as revenue and expenditure. As part of an effort to expand and codify NHA, the OECD and WHO have devised a system of classification for health-related activities (WHO 2003), which should be used if the data permit. These define categories of services provided, financing sources and providers. WHO's Guide to Producing National Health Accounts with special applications for low-income and middle income countries is available http://www.who.int/nha/docs/English_PG.pdf

Note 2. Goals of the PER

The PER in health can follow three complementary tracks: it can study the flow of funds; it can focus on the institutions that make and execute public budgets; or it can examine sector performance.

- The first track resembles a National Health Accounts exercise. But even this should include outputs—that is, what you get for the money—as well as the flow of funds.
- The second track is now commonly referred to as a Public Expenditure and Institutional Review. This focuses more attention on the process of policy formation and implementation—that is, the stakeholders and the institutions that determine how the money is raised and spent. But it should still describe the flow of funds.
- The third track is potentially broader and more ambitious, perhaps beyond the scope of the PER. A 1998 review of the impact of PERs argues that overly comprehensive reports take longer, are more expensive and may be "less

persuasive and less useful to groups interested in specific expenditure problems" (World Bank 1998:10).

The comprehensive checklist presented here does not imply that such a broad review is possible or necessary in all cases. In planning the PER, the team should review previous research, policy documents and existing data to determine what aspects of the sector deserve a more thorough examination. These guidance notes should be used to help select the issues appropriate to the national context. The 1998 review also reported that "the objectives and design of PERs have not been clearly defined to meet the needs of any well-defined set of end users. ... If it is not designed to meet the needs of specific users, a PER is not likely to have an impact on the behavior of client governments or external participants" (World Bank 1998:5).

Note 3. Goals of the health system

The health care system is attempting to achieve many diverse and often contradictory goals: better health status, social equity, cost containment, efficiency of service delivery and consumer satisfaction with service and care. Clearly, better health is the key goal, especially in developing economies. But the other goals are important for their overall social and economic implications (also on health, beyond medical care). The relative importance of these goals varies across countries and over time within one country.

Note 4. Health status and health risks

This section should be brief, no more than a few figures or tables and the related discussion. Its purpose is to describe in summary the health status of the population—to provide a picture of the system's performance, in terms of outcomes—over time and in relationship to other "comparable" systems. This section should portray the system's performance along multiple dimensions, though it may be necessary or desirable to restrict the discussion to a few key characteristics. Trends and comparisons should highlight the system's potential and priorities relative to other cases (but see Note 5).

People and health systems differ in their environments, behavioral factors and risks. An understanding of these characteristics is necessary to establish the priorities of the system and the modes of intervention. This section should provide an overview of risk factors or causes of morbidity and mortality. More important, it should provide evidence of issues that might become important in the near future—such as HIV/AIDS—that will have implications for the fiscal and budget management of the sector.

Note 5. Comparators

Nations are commonly compared with other nations of the same level of GDP per capita. But other comparisons should be considered. For example, a nation can be compared with its geographical neighbors, with nations that share its political history (former Soviet Union), with political or economic allies (EU or OECD), with countries that represent ideals in the sector or with those that share other characteristics (small island states).

Note that the choice of comparison countries is arbitrary. Much of what makes countries different, invisible to the casual observer, can be elicited only with more careful analysis. Simple comparisons with other "similar" countries are perfunctory and superficial, not explanatory. Casual comparisons cannot tell you how a country "should" or even "could" be performing. Some apparently obvious comparator countries are too similar to be of much use (Belarus and Ukraine): they share the same constraints and problems, and the performance of one should not be used to judge the potential of the other. Conversely, some countries are too different (Botswana and Malawi): it is difficult to imagine that one would be like the other if only the policies were changed.

Comparisons are useful, however, to situate the country in context, to illustrate potential problems (relative to other countries) and to see whether the country is outside the range of other, similar countries. The table below compares health outcomes in Asia. Although some of these countries are similar in many respects, there is significant variation in health outcomes. For instance, why is life expectancy lower and infant mortality higher in Indonesia than in its neighbor Malaysia? Why does Indonesia have the lowest measles vaccination rate in the region? This comparison should not be used to form policy but rather to motivate further analysis.

Table 4.1. Regional comparison of health outcomes, 2004

	GNP per capita (US\$)	Life	Crude death rate	IMR	U5MR	DPT rate	Measles	MMR	Births attended by skilled health staff
Indonesia	906	67.4	7.3	34.7*	45.7*	70	72	307*	72
Cambodia	350	56.6	11	95*	124.4*	85	80	437*	31.8*
Malaysia	4,290	73.5	4.7	10.2	12.4	99	95	20**	97
Vietnam	502	70.3	6.1	23.6*	66.7*	96	97	95	90
Thailand	2,356	70.5	7.2	18.2	21.2	98	96	36	Na
Philippines	1,085	70.8	5	28.7*	39.9*	79	80	172**	60
India	538	63.5	8.3	61.6	85.2	64	56	540	Na
China	1,323	71.4	6.4	26	31	91	84	50	96
East Asia	1,254	70.3	6.6	29.2	36.8	86.6	82.5	Na	86.1

Source: WDI, UNDP and DHS.

Note: IMR: Infant Mortality Rate; Under Five Mortality Rate; and MMR: Maternal Mortality Rate. for estimates with * the data source is DHS. for estimates with ** data source is UNDP. The most recent MMR data available are for 2003 (World Bank, 2006g) and the most recent available data on birth attended by skilled health staff are for 2003 and 2004.

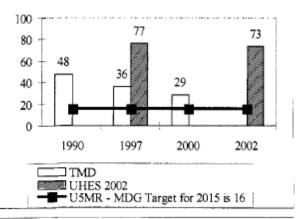
Source: Indonesia Public Expenditure Review 2007, Report No 38772.

Note 6. Discrepancies in survey and administrative data on health status

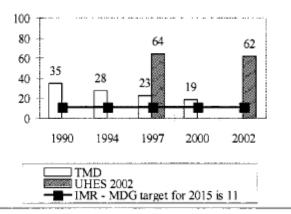
There are sometimes notable differences in administrative and survey data on health status and it is important to be aware and mention these where relevant. If both types of data are available it is useful to compare to detect any differences and their magnitude.

An example of how large differences due to the data source used can be is evident in the figures showing health status and trends in Uzbekistan based on survey and administrative data respectively. In this particular case, the infant morality rate (IMR) estimated by national-level surveys was 2-3 times as high as that reported by the Ministry of Health.

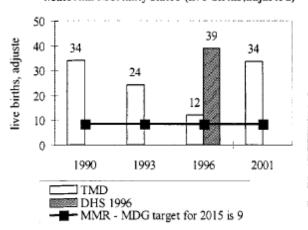
Under 5 Mortality Rate (per 1000 live births)



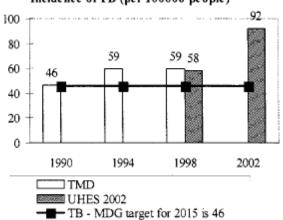
Infant Mortality Rate (per 1000 live births)







Incidence of TB (per 100000 people)



Note: TMD is Transmonee Database, DHS is Demographic Health Survey, UHES is Uzbekistan Health Examination Survey.

Source: Republic of Uzbekistan Public Expenditure Review 2005, Report No Report No. 31014-UZ.

Note 7. Public resource mobilization and sources of finance

Examine all resources and revenues accruing to the public sector, including private expenditure for public services (out-of-pocket and insurance contributions). This section does not include private expenditure on private services, which are dealt with in section 5. Nor does it include allocation, expenditure or the services purchased by the public sector. It should focus only on public funds.

The section covers both the levels and sources of funding available to the health system. Funding for health care may come from general or earmarked national government revenues, local public sources, private sources and external sources. Different sources of revenue have different consequences for system performance, equity and for the economy. Ideally, this would take

advantage of National Health Accounts, if available.

Public funds may include mandatory contributions into social health insurance schemes. Often considered "off-budget," these are not channeled through central or local state budgets. Private finance comprises funds from private (voluntary) insurance schemes as well as out-of-pocket expenses, both are forms of direct payments to providers. These may include co-insurance and co-payments in conjunction with private insurance as well as public finance. Also include discussions of deficits and arrears in funding, of particular concern in transition countries.

Deal with donor financing, which can be quite large in low-income countries—equal to or greater than domestic public finance—and is not always included in government budgets. Allocation of donor funds may or may not be coordinated with government priorities or decided in consultation with the national government. There may also be activities that are funded primarily by donors, especially if donors focus on project lending rather than general budget support. Donor involvement can have two related problems. First, the sustainability and continuity of expenditure are not under the domestic government's control, complicating policymaking. Second, donor activities can alter the incentives facing governments and private actors. They may "crowd out" domestic priorities and activities, or crowd them in, creating potential problems in either case.

Different sources of revenue have different consequences for the macroeconomy: for example, donor funding could have Dutch-disease effects if the flows are very large, or expenditures may be financed by domestic debt often arrears, or foreign debt. The consequences for equity may also differ, and this should be reflected in benefit-incidence analysis.

Note 8. Decentralization

For a useful discussion of decentralization in a federal system see World Bank (2007) Brazil. Governance in Brazil's Unified Health System (SUS). Raising the Quality of Public Spending and Resource Management", available at http://go.worldbank.org/EV3AU2E511. Also see World Bank (2007) Indonesia Public Expenditure Review. Spending for Development. Making the Most of Indonesia's New Opportunities, Report No. 38722.

Note 9. Diversion of funds

In some countries a large share of health funding never reaches its destination.

This has important implications for the analysis of the effectiveness of public health expenditures. Once fund diversions are accounted for the relationship between public health expenditures and health outcomes can change from there being no (or even a negative) relationship, to a positive one (Gauthier and Wayne 2007).

Public Expenditure Tracking Surveys (PETs) document diversion of funds and can be used to pinpoint the cause and location of the diversion and help reduce it (Savedoff 2008). The figure displays potential fund diversion points in the health system.

Level and Recorded Information **Potential Diversion Budgeted Policy Changes** Level 1 **Authorized** Diversion, Theft, Administration Disbursed Diversion Inflow Diversion, Theft, Administration Level 2 Outflow Diversion Inflow Level 3 Diversion, Theft, Administration Outflow Diversion Inflow Absenteeism, Theft Facility Outputs

Figure 1: Representation of Potential Diversion Points

Source: Savedoff (2008).

Note 10. Health expenditure

This section is the heart of the PER: total expenditure for health care and the inputs used to provide care, including manpower, facilities and high-technology equipment. Although the PER should focus on public expenditure, this section should include private expenditure (for both public and private services) as well, especially since the latter is the majority of total expenditure in many countries. As with section 3, this could rely on a system of National Health Accounts. Discuss both recurrent expenditure and investment in human and physical

capital. How efficiently and equitably does the system uses available resources, and how well does it prepare for the future? The first involves the allocation of expenditure to regions, programs and populations.

The second involves funding of investments. Do not deal with management and institutional issues, covered separately in section 7.

Discuss public expenditures at all levels of government (where possible) and by all agencies that either provide or purchase health services. This includes line ministries other than the Ministry of Health (such as the military), and expenditures by regional and local governments. Local public health expenditures are not likely to be included in the budget of the central Health Ministry. Data on local expenditures may be difficult to obtain, but these activities should be acknowledged in the report.

Also include private expenditures as well as expenditures of NGOs and donor agencies. In many countries, expenditures by donors and NGOs can exceed that of the domestic public sector. This has serious implications for budget discipline, as well as possible adverse consequences in terms of crowding out and Dutch-disease shifts in incentives.

Note 11. Differences between planned and actual public health expenditures

In many countries there are significant differences between planned and actual health expenditures therefore it is important to work with executed budgets when available. When they are not the best option is to use the latest planned budget (see Example 10).

Note 12. Health expenditure trends are sensitive to the choice of deflator

Health expenditure trends can be sensitive to what deflator is used, for example, a standard price deflator compared to a wage deflator. If possible, it is useful to use both to detect any potential differences in expenditure trends due to the choice of deflator. The example for Ecuador shows that when using a weighted price deflator the trend in real per capita health expenditures was positive after 2000. However, using a nominal wage deflator there was no increase in real health expenditure per capita over the same period.

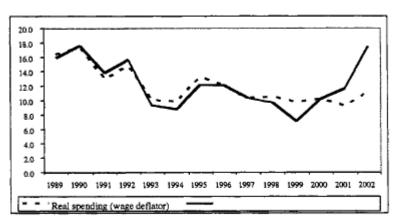


Figure 4.11. Real Health Spending per Capita, Using Alternative Deflators, 1982-2002 (in constant price dollars of 2000)

Source: Data series used in Vos e al. (2003) and updated for 2001-2 from Ministry of Economy –UNICEF fiscal data base. Deflators are from the Central Bank's national accounts (NA deflators and the INEC Urban Household Surveys (for the average wage of public employees).

Source: Creating Fiscal Space for Poverty Reduction. A Fiscal Management and Public Expenditure Review 2004, Vol. 2, Report No. 28911-EC.

Note 13. Health seeking behavior

Many household surveys contain data on health seeking behavior. These data can be very useful for examining behavior by different groups, for instance, by income, age, or ethnicity, which has implications for the targeting and size of public health expenditures. Targeting groups with a specific, costly behavior may reduce public health expenditures in the long run. It can also be used to reallocate health expenditures to services used by the poor to improve the equity of public healthcare provision. The tables show household health seeking behavior by income quintile for Honduras. It is clear that behavior varies by income group, and also by rural and urban setting.

Even more important is the use of multiple sources of health service, both public and private. The sequence of use can be important for policy and to help better targets needs.

Table 6.17 . Household health seeking behavior in Honduras during previous month, 2004

previous month, 20	Consulted	Got Ill	Consulted	Facility Consulted When Ill							
	last month but not Ill	Last Month	When Ill	MOH Hospital	IHSS Hospital	CESAMO	CESAR	Private Facility	Other		
Income Quintile											
Lowest income (Q1)	0.8	30.2	29.2	10.3	0.2	39.2	29.9	6.5	14		
Q2	1.2	31.0	41.1	19.1	1.4	42.7	17.3	13.9	5.5		
Q3	2.6	30.7	48.1	21.1	6.1	34.1	13.3	19.2	6.2		
Q4	4.7	33.3	52.7	20.5	9.4	27	5.2	31.8	6.1		
Highest income Q5	8.5	31.4	65.5	19.9	10.2	10.1	1	54.8	4.1		
Location											
Urban	2.4	27.2	55.3	22.9	10.5	22.6	1.1	38.0	4.9		
Rurai	4.8	35.2	41.9	15.3	2.7	33.0	19.7	21.5	7.8		
All	3.6	31.3	47.5	19.0	6.5	27.9	10.7	29.5	6.4		

Source: WB 2006 based on ENCOVI 2004

Table 6.18. Reasons for not seeking care among those who said they were ill. 2004

Reasons	Not	Home	No	Not	Too	Just ill	Clinic	Other
reasons	Necessary	remedy	money	serious	far	oust III	closed	Other
Income quintile								
Poorest Q1	24.5	19	26.9	9.7	7.2	3.1	2.5	7.1
Q2	24.3	26.9	24.2	11.7	2.6	2	1.7	6.6
Q3	31.6	26	18.7	12.9	1.8	3.5	0.6	4.9
Q4	36.6	23.7	15.6	16.1	0.8	2.1	0.8	4.3
Q5	40.2	25.5	9	16.1	0.9	2.5	1	4.8
Location								
Urban	40.3	18.4	16.4	15.4	0.5	2.6	0.6	5.8
Rural	24.6	26.8	22.3	11.5	4.5	2.7	1.9	5.7
All	30.2	23.8	20.2	12.9	3.1	2.7	1.4	5.7

Source: ENCOVI data cited in WB Poverty Assessment (2006) appendix tables.

Source: Honduras Public Expenditure Review 2007, Vol. 2, Report No. 39251-HO.

Note 14. Assessing severity of out-of-pocket health expenditure

A useful overview of how to assess the severity of out-of-pocket health expenditures is provided in Box A.1. (Gottret, Schieber, and Waters 2008). It discusses the catastrophic payment headcount, which measures incidence, and the mean positive gap, which measures the severity of out-of-pocket payments. For a more detailed account of how to compute these measures see Wagstaff and van Doorslaer (2003) and van Doorslaer et al. (2007). See Example 20 for an application to Tunisia. For further country examples see Wagstaff (2007) on Vietnam and Lindelöw and Wagstaff (2005) on China.

BOX 1 Definition of Catastrophic Health Spending Indicators

There are a number of ways to measure the incidence and the severity of OOP health payments on households, in terms of the catastrophic impact (Wagstaff and van Doorslaer 2003; van Doorslaer et al. 2007).

Catastrophic payment headcount is one measure often used to express the extent of OOP payments. It is the number or share of households with OOP payments exceeding some pre-specified threshold of total, nonfood, or non-subsistence consumption, expenditure, or income. Various thresholds for the budget share of OOP payments are often used (van Doorslaer et al. 2007). Some analysts consider OOP payments catastrophic when exceeding a 10 percent threshold of total expenditure (Pradhan and Prescott 2002); Wagstaff and van Doorslaer 2003; Ranson 2002). On the other hand, Xu et al. (2003) label as catastrophic spending OOP payments exceeding 40 percent of a household's non-subsistence spending, basing subsistence spending on a foodbased poverty line relative to the survey.

A limitation of simply measuring the incidence of such spending is that the statistic does not reflect the severity of OOP payments (Wagstaff and van Doorslaer 2003).

Mean positive gap or overshoot is used to identify how excessive OOP payments are. It is the product of the share of households passing the predetermined threshold and the average amount by which the threshold is exceeded.

Additionally, a normalized gap measures the size of this gap compared with multiples of household income.

The combination of both of these measures expresses both the incidence and the intensity of OOP payments through the mean catastrophic payment gap or overshoot. This is the product of the share of the population with catastrophic spending and the mean positive gap.

To reflect normative concerns over the distribution of catastrophic payments among rich and poor households (i.e., it may be more socially acceptable for a rich household to exceed 40 percent of total spending than for a poor household to do so), both the headcount and mean positive gap can be weighted by the complement of their corresponding concentration index (Wagstaff and van Doorslaer 2003). This effectively uses a weight equal to 2 for the poorest individual and 0 for the richest, with weights declining linearly in between. By weighting based on the household's rank in income distribution, the rank-weighted headcount and rank-weighted overshoot or gap account for whether it is the poor or rich who generally incur catastrophic spending. Since a negative concentration index indicates a disproportionate distribution among the poor, this will increase the value of the headcount or gap. On the other hand, a positive concentration index will reduce the associated value and make the headcount or gap look less

Note 15. Informal payments

Informal payments in health are charges for health services or supplies that are meant to be provided for free, or paid "under-the-table" directly to public officials or providers. These are generally measured as the fraction of survey respondents reporting that they made payments to a public health entity for services intended to be free of charge. Household surveys and perception surveys of citizens and public officials are the most common sources of information. More detailed surveys may also include the average value of payments made, to whom they were paid, and for what specific service. Types of informal payments include but

are not restricted to payments for upgraded services; to reduce waiting times; as "insurance" for potential future visits; or simply for basic diagnostics and treatment at "free" public hospitals or clinics. Data on informal payments in health are increasingly being collected but household surveys vary in whether, and how well, they measure informal payments (Lewis and Pettersson 2009). See Example 21.

Note 16. Contracting

How hospitals and clinics are paid offers a powerful incentive for providers to improve targeting, quality, and efficiency of health care delivery. For an overview of various contracting arrangements see Lewis and Pettersson (2009). For an excellent, in-depth description of contracting of public hospitals in São Paulo, Brazil see La Forgia and Couttolenc (2008).

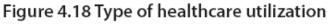
Note 17. Benefit incidence and distribution

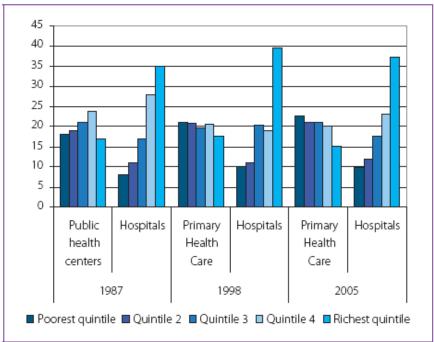
The benefit incidence may be computed for any characteristic that is distributed among the population, including (but not limited to) the allocation or consumption of health services. The analysis may be presented by income class, ethnic group, region, age and so on, as appropriate. There are a number of different methods for computing the incidence of benefit or burden. The most common method is to examine the benefit incidence directly. This involves classifying individuals (or households) according to a comparable welfare measure, such as total per capita expenditure, and then examining the benefit received from public services for each individual or class along the welfare rank. Examples are presented in the figures below. In Indonesia, benefit incidence of public spending on primary healthcare is neutrally distributed among income quintiles. However, most of the benefits of public spending on secondary healthcare accrue to the richer income quintiles.

400 71.7% 350 □ Private spending ☐ Public spending in hospital care 300 ■ Public spending in primary care Per capita Spending in health 250 (Rp. 000 2003 prices) 55.5% 200 53.5% 46.2% 150 39.7% 31.0% 100 50. 0 2 3 TOTAL 1 (Poor) 4 5

Figure 4.17 Private/public healthcare utilization

Source: Susenas 2005.





Source: World Bank, 2006f, updated with Susenas, 2005. Source: Indonesia Public Expenditure Review 2007, Report No 38772.

As in the discussion of comparators (see Note 5), this figure provokes questions. Why are the poor not utilizing public secondary healthcare facilities? Is it a question

of location, lack of information, and/or cost, for example, if formal and/or informal payments are required for services? What are the potential implications of the huge differences in private health spending on health outcomes?

Alternatively, one can calculate the concentration index (CI), a summary measure describing benefit incidence (see Example 24). The advantage of the CI is that one can also easily compute standard errors, which permit robust comparisons of statistically significant differences across classes of individuals or households. Excellent instructions on how to compute the CI, and benefit incidence analysis are provided in O'Donnell, van Doorslaer, Wagstaff, and Lindelow (2007) *Analyzing Health Equity Using Household Survey Data. A Guide to Techniques and Their Implementation*, available at http://go.worldbank.org/LVSSZJX9O0

Electronic versions of the chapters can be downloaded and customizable "do" files for use in Stata, a Stata "ado" file for dominance checking, and an Excel file for computing concentration indices and standard errors of the concentration index with grouped data are also downloadable.

Note 18. Net benefit incidence

Analysis of the equity of health care must account for the distribution and incidence of expenditures on health services, as well as the value of services consumed. Evaluation of the incidence of health care finance requires examination of all sources of health sector funding, not only the direct payments that are made exclusively for health care. In addition to out-of-pocket payments, health insurance contributions and earmarked health taxes, the distributional burden of all direct and indirect taxes can be examined where these make up a significant part of total health sector revenue. They can be examined in the same way as benefits.

Expenditures paid and benefits received may be combined in an effort to understand net benefits incidence. In health the net benefit is the value of the good or service (transfer) after accounting for user fees and any other payments. The figure shows that the net incidence of public health expenditure is more progressive than the gross incidence. Once the burden of tax payments is accounted for, the poorest receive about 16 percent of health expenditures, while the wealthiest actually pay more in taxes than they receive in benefits.

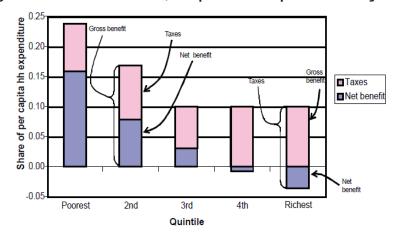


Figure. Distribution of net benefits, total public health expenditure—Mongolia

Source: Taken from Filmer, Hammer and Pritchett, 1997, Table 9.

Note 19. Health system outputs

Here you answer the question: What do you get for the money? This means asking what goods and services the health system produces. This should be an inventory of the volume of services provided, and the type of care, such as the number of child immunizations, outpatient visits and hospital admissions. The level of disaggregation (clinical, administrative and geographical) should be determined by the country context. For instance, certain diseases and related interventions (malaria) may be important in only some regions of a country.

As for expenditures, take care to include services provided by agencies outside the central Health Ministry. In many countries the military is a significant provider of health services to soldiers and their dependents. And many countries have decentralized provision, so that health services are under the control of local departments or districts. These will often be under the supervision (and in the budget) of the Ministry of Local Government rather than the Health Ministry.

Again, even though the focus should remain on outputs of the domestic public sector, other actors provide significant volumes of services, which have an impact on the health of the population and their demand for public services. The private sector provides the majority of services in many countries. NGOs and donor agencies often directly provide services. This is increasingly the case for HIV/AIDS interventions, such as antiretroviral therapy (ART), which are considered too expensive for national governments in client countries.

Note 20. Resource pooling and risk pooling

Briefly describe the incidence of public and private insurance and how risks are spread among communities. This section differs from those before and after in

that the unit of analysis is people rather than money. How do individuals gain access to care? What is the structure of resource-pooling and risk-pooling? Who has access to public insurance, and who to private insurance? Are some services or types of coverage restricted to specific individuals or groups? Coverage and access to health care can be obtained through private purchases in the marketplace, as an entitlement, or as most common, a combination of the two.

Note 21. Health sector policy, budgeting and management

The public budgeting process, including raising public funds, is the basic mechanism to facilitate the functions listed in the previous section. It involves the pertinent decisionmaking structure (decentralization, hierarchy and so on). This process is guided by and involves legislation and regulation that also guide contracts and public-private relationships. Identify stakeholders who play a role in determining and implementing policy—and who will be directly affected by any changes.

Describe the regulatory frameworks, the budgetary process and the political economy guiding the different elements of finance as listed in the section outline. These are also manifest in contracting arrangements involving public (and possibly private) funds. Changes that may be ultimately called for to improve the performance of the system will involve changes in the budgeting process and related decisionmaking processes and regulations.

Note 22. Recommendations

A common failing of PERs and other policy papers is that they often do not derive recommendations from evidence but from some presupposed or idealized model of health care policy. These a priori recommendations include the idea that a country "should" spend X percent of its GDP on health and "should" provide more to primary care and less to tertiary care. These recommendations may actually apply, but they must be based on a solid analytical foundation. This will also ensure that the recommendations are specific and relevant, not general.

Another problem of PERs is that they provide an impossibly large set of recommendations for policy. The review of PER impact referred to a 1998 World Bank report that PERs have on average 100 recommendations. Limit yourself to a small set of suggestions and focus on those that will be most realistically implemented. You must also provide some guidance for the implementation of these suggestions. This will ensure that the recommendations remain in the realm of the possible, rather than the improbable ideal. You must, in addition, suggest indicators for monitoring the success of the policies recommended. If

the recommendations are adopted, how can the government, the Bank and civil society track the progress of implementation?

Finally, the PER must also provide some discussion of the assumptions underlying the recommendations. What circumstances or other factors must prevail in order for the recommendations to succeed? More important, what is the counterfactual?

That is, what might happen if the recommendations are not implemented successfully, or if they are poorly or partly implemented? This requires acknowledging the risks involved in both the analysis and the policy process.

Data sources

- · Official data.
 - National accounts.
 - National Health Accounts.
 - Government budget documents.
 - · Central government consolidated accounts.
 - · Line ministries (MoH, Social Security, etc.).
 - State or provincial governments, if separate from consolidated government accounts.
- Annual reports from line ministries.
- · Tax reports.
- · Trade statistics.
- · Census data and reports.
- WB and IMF data and documents.
 - o Country economic memoranda.
 - Medium-term economic frameworks.
 - o PRSP and PRGF documents.
 - o HIPC assessments.
 - o Poverty assessments.
 - o Previous project and loan documents.
- · Country-specific survey data.
 - o Public Expenditure Tracking Surveys (PETS).
 - o Quantitative Service Delivery Surveys (QSDS).
 - o Household surveys (e.g. LSMS).
 - o Demographic and Health Survey (DHS) data and equivalents.
 - Marketing and social marketing surveys.
 - o Firm (provider) and sector surveys.
- · Other country-specific sources.

- o Insurance industry reports and records.
- o Providers' (such as physicians') association reports.
- o Provider records.
- Other international sources.
 - o Reports from donor countries and agencies.
 - o International agencies (OECD, WHO, PAHO, etc.).
 - o Academic studies.
 - o NGO reports.



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Example 1. Impact of data limitations on PER scope

Source: Niger Public Expenditure and Financial Management Review 2004, Report No 29752-NE.

Scope of Analysis and Data Constraints

72. A number of data constraints have limited the scope and depth of the PER, the most important ones being:

- A new budget classification system was introduced with the 2003 budget (see Part I11 for more details) and it is difficult to analyze budgetary allocations and outcomes using the pre-2003 budget classification system. A complicated reclassification exercise had to be conducted in order to convert the administrative classification into a functional classification and to make it comparable with the new budget classification. Even after reclassification, certain data could not be extracted, i.e., expenditure by region. The new classification has corrected many of these limitations, using software that facilitates compilation of budgetary data by sector, type, and location of expenditure items.
- Incompatibility between the old budget classification and the chart of accounts has made it difficult to reconcile accrual data (budgetary accounts) with cash data at the payment stage (treasury accounts). The analysis of budget execution in this PER is based on payment order (ordonnancement) data from the Budget Directorate's electronic database (situation des credits), which is not reconciled with treasury data on payments. The experience of the 2000 budget review law (loi de reglement) exercise shows that there can be considerable discrepancies between budget data at the payment order and thepayment stage.
- The magnitude of directly executed donor projects is probably underestimated. The PER has tried to integrate all externally financed capital expenditures by using data of the Department for Investment Financing (DFI) of the MEF. However, monitoring of extra-budgetary projects is handled manually by DFI and there are doubts about the accuracy and comprehensiveness of these data. In addition, all donor-financed project outlays are recorded as capital expenditure, while a sizeable portion is probably used for recurrent spending.
- With the exception of the education sector, scope and reliability of data on expenditure allocation and use within sectors is weak. Most line ministries do not systematically collect expenditure data. For the purpose of this exercise, the four priority sectors carried out expenditure data searches through their regional offices. The resulting data sets differed greatly from those of Budget Directorate's electronic database. As a consequence, sector PERs are based on

DGB data. The data collection and analysis capacity of line ministries will need to be strengthened in support of future PER exercises.

Example 2. Objectives of the health sector PER

Source: Turkey Public Expenditure and Institutional Review 2001: Reforming Budgetary Institutions for Effective Government, Report No. 22530-TU.

Public Expenditure on health

Principles and perspectives

- 4.1 This chapter and the following chapter on education undertake a dual task: a conventional analysis of the efficiency and equity effects of public expenditure in these sectors as well as an assessment of how "policy" is determined in these sectors and whether it is meaningful in determining budget allocations. While the bulk of this chapter is devoted to the former assignment, the chapter does provide specific glimpses into the formulation and implementation of policies which is the concern of the larger report and which is further discussed in chapter 6.
- 4.2 Public expenditures on health should eventually be justified either on the grounds that they contribute to a more effective and efficient functioning of the health system or that they contribute to poverty alleviation and redistribution of income.
- 4.3 The efficiency justification is often based on public and merit goods arguments. Common examples of public goods in health are vector control, sanitation, mass education, programs to provide clean water, etc. According to economic theory, private production will not be forthcoming for such goods and services, and it is socially optimal for governments to finance and possibly provide these goods. Similarly, many health goods are merit goods, and create large positive spillover effects (such as vaccination), produce greater social benefit than private benefit (such as family planning) or possess significant interpersonal utility values (like medical services for the vulnerable segments of the population, emergency services for trauma patients, etc.). These and other market failures in health care and health financing (like those resulting from incomplete information, incomplete capital markets) mean that government intervention can raise welfare by improving the way those markets function.
- 4.4 A government role in health can also be justified on equity grounds. Since the poor cannot always afford health care, the government can play an important role in promoting equitable access to health care that would improve their productivity and well-being.

4.5 While governments worldwide have played an important role in achieving improved health status of their citizens, there is nevertheless widespread evidence of misallocation of public resources, inefficiency of government expenditures and the general inability of governments to address equity issues effectively. Public funds are often spent on health interventions with low relative cost-effectiveness, such as surgery for most cancers, while highly cost-effective and often most critical interventions, such as treatment of tuberculosis, remain underfunded. Government expenditures tend to be inefficient and wasteful: health workers are badly deployed and supervised, hospital beds are underutilized, expensive equipment is purchased but poorly maintained and much of the money spent on drugs is on brand-name pharmaceuticals when generic drugs could inexpensively substitute. Studies in many countries show that government spending for health often goes disproportionately to the affluent, in the form of subsidies to sophisticated public tertiary care hospitals, while the poor lack access to basic health services and receive low-quality care.

4.6 It is against this broad conceptual backdrop that this chapter examines public expenditures in the health sector in Turkey. The chain of reasoning starts with an examination of government policies toward health, and continues through the translation of policies into budgetary allocations and expenditures of public funds, in the process evaluating the efficiency of allocations and impact on health outcomes. The following questions motivate the chapter:

- What are the government priorities in the health sector, either in terms of stated or implicitly established policy?
- How do budgetary allocations and public expenditures in health support the strategic priorities in the sector?
- How efficient and effective is the use of public funds in achieving the desired outcomes?

Example 3. Changes since the last PER

Source: Honduras Public Expenditure Review 2007, Vol. 2. Report No. 39251-HO.

Evolution of key sector outcomes

6.5 Since the PER (2001), Honduras has continued to make notable progress in its key health, nutrition, and population indicators. Table 6.1 highlights a number of these achievements including: a significant reduction in under-five mortality (U5M) from 44 from 1996-2001 to 30 in 2001-2005; a decline in the infant mortality rate (IMR) from 34 in 1996-2001 to 23 in 2001-2005, as well as a 7 percentage point drop in neonatal mortality (first 28 days after birth) from 21 to

14 during the same period—after being stagnant from the late 80s to early 2000. Prenatal care coverage increased from 83 percent to 92 percent, while the number of women who received postnatal care has more than doubled from 34 percent to 73 percent. Chronic malnutrition for children below 5 years of age has also declined from 29 percent to 24.7 percent. These improvements can be attributed largely to the following factors: the continued expansion of prevention, promotion, and health care programs and services with an emphasis on Maternal and Child Health Programs, as well as the use of alternative models of service provision with increased participation of communities; improvements in access to potable water; and higher educational levels of Honduran women (ENDESA 2005-06).

Table 6.1: Health Outcomes and Outputs, 2001 and 2005/06

Indicator*	2001	2005/06
Life Expectancy at birth (years)**	70.7	72.1
Infant Mortality Rate (per 1000 live births)	34 (1996-2001)	23 (2001-2005)
Under 5 Mortality rate (per 1000 live births)	44 (1996-2001)	30 (2001-2005)
Total fertility rate	4.4	3.3
Percent of women using a family planning method	61.8	65.2
Percent of women using a modern contraceptive method	50.8	56.4
Percent of women using a traditional contraceptive method	11	8.9
Prenatal care coverage	83	92
Women who received at least 4 prenatal controls	N.A.	81 (87 - urban and 76 - rural)
Percent of women who received their 1st prenatal visit before 4th month of pregnancy	56	69
Percent of institutional births	52	67
Percent of women who delivered attended by a skilled health professional	-	67 (90 in urban and 50 in rural)
Percent of women who received post natal care	34	73
Children 12-23 months, fully immunized	78	75
Chronic malnutrition (stunting or low height-for-age)	29	25
Underweight (low weight-for-age)	17	11

Sources: ENDESA 2006*, MOH Statistical Bulletin 2005**

6.6 Some indicators, however, have worsened and fluctuated during this period. For example, while immunization rates for young children for most vaccine types remain above 90 percent each, the percentage of fully immunized children 12-23 years of age has slightly decreased from 78 percent to 75 percent (DHS 2005-06). Also, although malaria prevalence significantly decreased from 370 in 2001 to 206 in 2005, malaria prevalence was much lower at 149 in 2003 (WHO, MOH 2006).

6.7 In addition, although the total fertility rate has declined from 4.4 in 2001 to 3.3 in 2005, Honduras is second to Guatemala in terms of having the highest fertility rate in Central America. About 17 percent of women have an unmet need for family planning (8.5 percent of women in a relationship would like to limit the

size of their families and another 8.5 percent would like to space the births of their children).

6.8 AIDS remains an issue, with Honduras having the highest incidence (2.1 percent in 2005) of HIV/AIDS in 6 Central American countries. The reported number of HIV/AIDS cases in the country increased by 37 percent from 2003 to 2005 (UNAIDS 2005), also resulting in a corresponding increase in the number of HIV/AIDS orphans by 25 percent from 2001 to 2005 (UNICEF 2004, UNAIDS 2005).

6.9 Significant gaps persist in terms of access and outcomes between rural and urban areas, regions, and poor and wealthy segments of the population. For example only 50 percent of rural women have had their deliveries assisted by a skilled health professional compared with 90 percent in urban areas; and 32 percent of children in rural areas are stunted relative to only 13.7 percent in urban areas. Regional differentials exist, for example, San Pedro Sula has a chronic stunting rate of only 13.5 while Copan and Lempira have stunting rates of 42 and 49.5, respectively. In terms of differentials based on income levels, only 33 percent of mothers in the lowest income quintile received skilled professional assistance while giving birth compared to 98.5 percent of women in the richest income quintile. Moreover 43 percent of the children in the poorest households are stunted compared to only 5 percent of the children in the wealthiest quintile.

Example 4. Objectives of the health system

Source: Republic of Moldova Improving Public Expenditure Efficiency for Growth and Poverty Reduction. Public Expenditure Review 2007, Report No. 37933-MD.

5.11 The provision of universal health insurance coverage is one of the key objectives of the Moldovan Health Insurance system. With health insurance premiums currently only covering one-fourth of total public health expenditures, the financial sustainability of the health system is threatened by the weak participation rate among productive groups of the population. As of 2005, 74.8 percent of the Moldovan population was covered by mandatory health insurance. While children under 18 years old and pensioners were reported fully covered by health insurance, less than half of the 25 to 44 year age group was affiliated to the MHI. Among the 25 percent of the population that is uninsured, nearly 70 percent (or about 17 percent of all workers) are formally employed (largely in the agricultural sector) with the remainder being unemployed. The larger cities or municipalities have much higher coverage rates due to the higher rate observed in Chisinau, where 85 percent of the population is covered. Differences across the various Rayons are significant. The top 10 Rayons Municipalities have on average 81 percent of their population covered by health

insurance, while the 10 Rayons Municipalities with the lowest rates showed an average rate of 63 percent. Increasing the participation of payroll contributions in total NHIC revenues, thereby lessening dependence from budget transfers, is one of the key challenges of the system in the coming years.

5.12 Access to Care. The evidence provided by different sources suggests that access to health care services in Moldova is satisfactory and that the MHI system has improved access of the insured population. In Moldova, 97.1 percent of households live within five km of the nearest health facility, 93.5 percent of households need less than an hour to reach a health service provider and 87 percent of households are within five km and need less than one hour to reach primary health care facilities. The health insurance "removed or significantly reduced" barriers and allowed insured persons to have better access to care. Evidence from household surveys shows that insured people not only receive higher family doctor (FD) coverage (87 percent of the insured are covered by FD services versus 48 percent of the non-insured) but, as a result, they make more intensive use of FD services (3.2 visits per year to FD versus 2.8 visits among noninsured).

5.13 **Quality of Care.** While access has improved, analysis of quality of health care indicators suggests that the Moldovan healthcare system performs poorly. In-patient mortality rates in Moldovan hospitals grew by 10 percent between 2002-2005. Coverage rates are very low in cholesterol measurement, mammography and flu vaccination, and moderate in blood pressure measurement. For all these quality indicators, Moldova lags behind international benchmarks. Over 80 percent of the Moldovan population believes that the quality of the health care is a problem and that the sector requires considerable changes to improve its performance. Some additional problems persist, such as the absence of clinical management approaches (protocols, integral pathways, etc), an inadequate payment system to promote quality of care and unmet demand for family doctor services in approximately 30 percent of the Rayons.

Table 5.2: Selected Quality and Health Care Indicators

	% Measured Cholesterol in Blood	% Measured Blood Pressure	% received Flu Vaccine in last 2 years	% Mammography in last 2 years
Moldova	8.8	69	16.6	13.3
Benchmark	75	55-90	70	70

5.14 Resource Efficiency. While public health expenditures have increased significantly since 2000, the overall efficiency of the sector has not improved correspondingly (see Table 5.3). Hospital efficiency can be measured from three perspectives. The first deals with productivity, as measured by the number of discharges per doctor. In 2005, Moldovan hospitals reported an average 58 discharges per doctor with little improvement in the last few years. The second measure relates to resource utilization and average length of stay (ALOS). The average occupancy rate in Moldovan hospitals was 66 percent in 2005, considered moderate to low by international standards. Some 44 percent of hospitals have excess bed availability. While the average length of stay has declined in the last few years, they are some 17 percent higher than in the EU. The existing payment mechanism has increased incentives towards longer hospital stays. A final measure considers the perspective of cost-containment, measured by cost per discharge. Over the last few years, the cost per discharge has been increasing, the result of increasing budgets and declining discharges. On balance, poor performance is observed in productivity and cost-containment indicators. There have been little incremental gains in productivity while all costrelated indicators have increased over time due to the combination of increased budgets with reduced number of beds and hospital activity.

Table 5.3: Efficiency Indicators of the Moldovan Hospital Sector

Productivity	Discharges per physician	Small progress; productivity rates increased around 1 percent in 2003-2005. Unequal performance by hospital category and by Rayon.
Hospital Occupancy	Occupancy rate	Moderate-to-low average rate (66 percent) but declining trend in 2002-2004; small recovery in 2005. Wide dispersion of occupancy rates among Republican hospitals. Occupancy rates in Moldova among the lowest in Europe.
Intensity of use of hospital beds	Bed turnover rate (BTR)	Increasing trend in the BTR from 25 to 27 patients per bed per year. Using LASSO analysis, 40 percent of the hospitals perform well and 44 percent of the hospitals have excess bed availability. Among hospitals not performing well, 43 percent have excess beds due to lack of demand for their services while the remaining 57 percent have problems with excess hospitalizations.
Cost-containment	Cost per discharge Cost per bed-day	Costs per discharge and costs per bed- day (and variations, like costs of food per bed-day) increased in real terms as a result of combining increasing budgets with decreasing beds. Significant variations exist by hospital type in any of the cost categories evaluated.
Length	Average Length of Stay (ALOS)	Declining trend in 2002-2005 (ALOS fell 14 percent), although small increase in 2005. ALOS in Moldova still higher than EU average.

- 5.15 There is a wide range of areas where efficiency gains can be achieved by implementing specific cost-control policies. Some key areas are:
- 1. **Utility management:** utilities represent around 8 percent of total hospital expenditures. In best-practice systems, utilities represent around 5 percent of the budget.
- 2. **Ambulatory surgery:** international practices suggest that countries should increase ambulatory surgeries as a way to reduce overall costs. In some countries, such as the USA and Canada, ambulatory surgeries now represent more than 50 percent of total surgeries.
- 3. Consolidation of central services like sterilization and laundry: hospitals can move from the current practice of supplying services like laundry and security to outsource them by contracting private firms.

4. **Hospital consolidation:** consolidating hospitals represents a significant source of savings by reducing fixed costs, especially infrastructure-related ones. Some estimates suggest that in Chisinau area alone, 1000-1250 hospital beds (13% of current) could be closed by improved management procedures without affecting level of services provided. This would enable the closing of 4 hospital buildings, with associated saving in infrastructure related costs such as utilities.

Example 5. Health outcomes in regional perspective

Source: Georgia Public Expenditure Review 2002, Report No. 22913-GE.

5.5 Available data indicates that Georgia's health outcomes measured in terms of life expectancy at birth, infant and under-five mortality rate and maternal mortality rate compare favorably with other CIS countries (table 5.1). However, it should be noted that Georgia's health indicators have worsened significantly over the past decade. The infant mortality rate (IMR) has increased from 9 deaths per 1000 live births in 1991 to 24 in 2000. Similarly, the maternal mortality rate (MMR) in Georgia is 51 per 100,000 live births which, while low in comparison to other developing countries, is way up from the MMR of 32.4 reported in 1993. The majority of maternal deaths in Georgia (38 percent) occur from bleeding, one of the causes of which is anemia which typically needs to be diagnosed and addressed during the prenatal stage. This is yet another indication of poor health system performance.

5.6 Similarly, incidence rates of infectious and parasitic diseases in Georgia have increased in the last decade. For example, there has been a huge increase in the number of new tuberculosis cases, from 1,531 in 1991 to 4,515 in 1999. Also, while the number of diphtheria cases has declined from 425 cases in 1995 to 60, it is still considerably higher than 1992 (when 3 cases were reported). The situation in noncommunicable diseases has also worsened. Overall, circulatory system diseases cause about 71 percent of all deaths in Georgia, followed by neoplasms (11 percent). Other social illnesses, particularly cases of drug addiction, are on the rise (from 1,347 in 1984 to 4,873 in 1996).

Countries	GNP per capita (US\$95)	Life expectancy (years)	Crude death rate (per 1,00 live births)	Maternal mortality rate (per 100,000 live births)	Infant mortality rate (per 1,000 live births)	Children mortality rate (under 5, per 1,000 live births)
Georgia	620	73	8	51	24	29
Other FSC Countries						
Armenia	490	74	6	35	25	30
Azerbaijan	460	71	6	43	74	105
Kazakhstan	1,250	65	10	70	60	75
Kyrgyz Republic	300	67	8	65	53	63
Tajikistan	280	69	5	65	54	73
Uzbekistan	720	70	6	21	51	67
ECA	1,190	68	_	_	20	26
Low-income countries	420	59	_	_	77	116

13. Data on health outcomes is Georgia are not very reliable since disease surveillance is rather

Example 6. Geographic distribution of health outcomes

weak.

Source: Indonesia Public Expenditure Review 2007. Spending for Development. Making the Most of Indonesia's New Opportunities, Report No. 38772.

National data hide wide variations in health outcomes within Indonesia

National data hide wide variations within the country. For instance, the poorer provinces of Gorontalo and West Nusa Tenggara have post-neonatal mortality rates that are five times higher than in the best performing provinces in Indonesia. Similar regional discrepancies are shown in under-five mortality rates (infant and child). While most provinces are below, or only slightly above, the 40 deaths for every 1,000 live births mark, nine provinces have rates of over 60. The rates for West Nusa Tenggara, Southeast Sulawesi and Gorontalo are as high as 90 or 100 (Figure 4.2).

120 ■ Infant mortality ■ Child mortality Deathsforevery 1000 live births 100 80 60 40 20 Canta ta Inatian Confl. to live line. West Was Jan Bally Bay Hoth Strate AND THE PARTY OF T Lampins Court Charles Central Sulawes Merlan Bengkulu

Figure 4.2 Infant and child mortality rates by province, 2002-03

Source: Indonesian Demographic and Health Survey, 2002-03.

Example 7. Equity of health outcomes

Source: Guatemala Public Expenditure Review 2005, Report No. 32376.

Inequities in health status - Guatemala

4.11 In assessing Guatemala's health indicators it is imperative to take into account the marked inequities that are masked by national averages. Although Guatemala's national health measures are fairly poor to start with, the health indicators of the low income population, the indigenous population and the rural sector are significantly worse.

Table 4.2: Ethnic groups and rural/urban distribution of health indicators

	Fertility Rate	Infant mortality in the 10 years prior to the Survey	Maternal mortality	Prevalence of contraceptive methods	Births delivered by medical or nursing staff	Chronic malnutrition under 5
Urban	3.4	35		56.7	65.6	36.5
Rural	5.2	48		34.7	29.5	55.5
Indigenous	6.1	49	211	23.8	19.1	69.5
Non indigenous	3.7	40	70	52.8	57	35.7

Source: ENSMI 2002.

4.12 Fertility rates are higher among the rural and indigenous population, whereas their access to services and the prevalence of contraceptive methods among them is lower. The proportion of births delivered by medical or nursing staff is 41.4 percent at the national level, but only 29.5 percent in rural areas, compared to 65.6 percent in urban areas. This difference is even greater between the ladino population (57 percent) and the indigenous (19 percent). These differences contribute to the sharp inequities that exist in maternal

mortality, where the rate of 153 per 100,000 at the national level masks a rate of 211 per 100,000 for indigenous women; Figure 4.3.

Figure 4.3: Health-Related MDGs in Guatemala, 2002: The Ethnic Gap

Source: ENSMI, 2002.

4.13 While infant mortality in the metropolitan region is half the national average, it is 50 percent higher in the south-east region. Likewise, infant mortality triples when mothers have a low educational level compared with those with secondary education. Infant mortality is also 25 percent higher among the indigenous population than among the non-indigenous. The levels of chronic malnutrition among children are particularly alarming among the indigenous population, where they reach 70 percent of the children under 5, a figure that appears to have increased in the last 7 years; Figure 4.4.

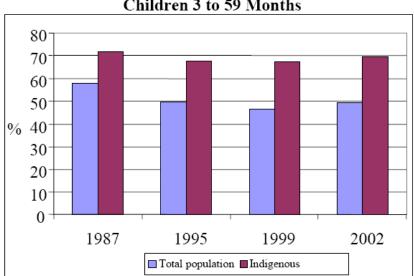


Figure 4.4: Prevalence of Chronic Malnutrition in Children 3 to 59 Months

Source: ENSMI.

4.14 Finally, in addition to the major discrepancies in health status across different groups, the rate at which health indicators have been improving over time also has been highly uneven. Most of the improvements in health indicators in recent years have been largely limited to the non-indigenous population. As Figure 4.5 shows, between 1987 and 2002, the rate of decline in the infant mortality rate among the non-indigenous has been four times faster than among the indigenous. Similarly, the rate of decline in the prevalence of chronic malnutrition among the indigenous has been half that among the non-indigenous. Furthermore, the uneven pace of gains in the fight against malnutrition has left the poor increasingly behind, independent of ethnicity; Figure 4.6.

4.15 The health status measures that exhibit the greatest disparities and those that inhibit long-term human capital formation are the major MDG health measures; namely maternal mortality, infant mortality and childhood nutrition. According to World Bank DEC analysis, the Millennium Development Goal for malnutrition will not be met, and those for maternal and infant mortality are regarded as no more than "possible." Guatemala needs to focus more attention and resources on achieving the MDGs, focusing attention and resources particularly on the indigenous and the poor.

36%

36%

9%

Indigenous

Non-Indigenous

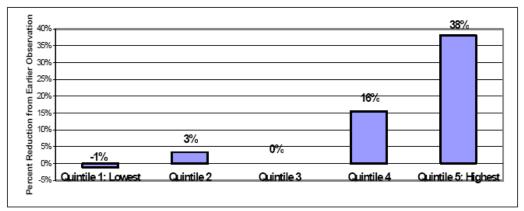
Non-Indigenous

Non-Indigenous

Figure 4.5: Percentage Reductions in the Infant Mortality Rate and Under 5 Malnutrition Prevalence Among Indigenous and Non-Indigenous Peoples in Guatemala, 1987-2001

Source: Calculations based on DHS, 1987, ENSMI, 2002.

Figure 4.6: Rate of Reduction in the Prevalence of Malnutrition in Guatemala from 1995 to 1999, by Household Wealth Quintile



Source: Calculations based on DHS, 1987, ENSMI, 2002.

Example 8. Equity of health outcomes

Source: Mongolia. Consolidating the Gains, Managing Booms and Busts, and Moving to Better Service Delivery. A Public Expenditure and Financial Management Review 2009. Vol. 1, Report No. 43353-MN.

4.5 While Mongolia has made important achievements in reducing mortality, disparities in mortality rates across socio-economic groups and geographic areas remain important (Figure 4.2). For example, mortality rates are five times higher among the poorest 20 percent of the population than the richest 20 percent. Although not unusual by international standards, these disparities point to persistent challenges in reaching vulnerable and high-risk groups with information and services.

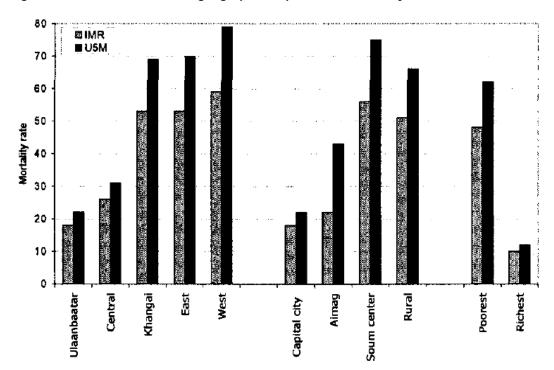


Figure 4.2: Socioeconomic and geographic disparities in mortality

Example 9. Risk factors

Source: Slovak Republic Public Expenditure Review 2008, Background Papers.

Health outcomes are affected by insufficient quality of care

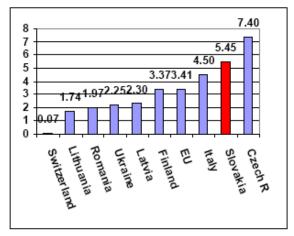
17. Poor health status causes a high rate for work absenteeism. Although Slovakia has more hospitals, beds and PHC units as well as significantly more outpatient visits and average length of stay in hospitals the Slovak health sector produces a lower life expectancy, and higher death rates for circulatory, cerebrovascular, and ischemic heart diseases, as well as a higher infant mortality rate than Slovenia and Czech Republic (Table 19), and a rather high diabetes prevalence rate (Figure 37). These rather poor health outcomes suggest that resources could be redirected within the Slovak health care system from low-efficiency hospitals and PHC units to be invested into modernizing treatment patterns and prevention of high cost disease. Slovakia reports an absenteeism rate for the workforce of 38 days of illness per year per employee, which is four times higher than the European average (Figure 38). This extremely high number indicates a need for revisiting the reliability and validity of statistical data collected in the country.

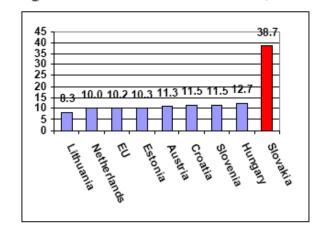
Table 19. Health outcomes in new EU member states, 2005

Country		тв	Standardized causes (2005)	Infant deaths			
	Life Expectancy	Incidence per 100,000	Circulatory System	Cerebro- vascular	Ischemic heart diseases	Smoking Related Causes	per 1000 live births
Slovakia	74	11.92	508.68	74.22	268.32	414.12	7.2
Slovenia	77	12.07	261.2	53.86	68.22	189.38	3.38*
Czech R	76	10.1	419.02	109.43	177.51	359.31	3.39
Hungary	73	21.56	502.43	108.23	261.33	490.5	6.23
Estonia	72	38.69	498.17	122.94	264.18	448.56	5.44
Poland	75	22.72	384.24	87.4	114.43	238.1	6.42
Latvia*	71	65.29	563.92	171.81	279.38	511.09	7.62*
Lithuania	72	61.4	562.81	123.23	354.98	548.07	6.84*
EU-27 average	73.89	9.83	493.09	128.34	182.59	390.12	8.34

Source: WHO, European Health for All Database http://data.euro.who.int/hfadb

Figure 37. Diabetes prevalence, in %, 2006 Figure 38. Absenteeism from work, 2006





Source: WHO. http://data.euro.who.int/hfadb

18. The high smoking related mortality rate is preventable. Slovakia reports high smoking rates. Smokers have a higher risk for diseases with costly treatment such as cancer, contributing to increasing health expenditures. While the excise taxes on cigarettes have been raised resulting in a price increase of 19% beginning in 2008, the Government should support the World Health Organization's long term strategy and decrease tobacco consumption by introducing anti-smoking actions in public places following the example of Italy and the UK.

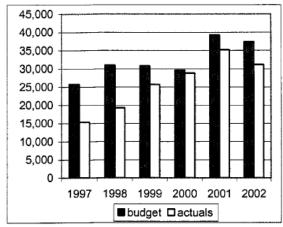
Example 10. Discrepancies in budgeted and executed health expenditures

Source: Benin Enhancing the Effectiveness of Public Spending. A Review of Three Sectors 2004, Report No. 29656-BEN.

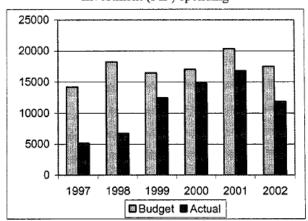
A significant improvement in the budget execution rate [in Benin] occurred between 1997 and 2002. In 1997 and 1998 only 60 percent of the budget was executed, compared to 90 percent in 2000 and 2001 and 83 percent in 2002 (Chart 4.5). Improvement in the execution rate of the PIP expenditures has been the main determining factor, which in turn has been related to better budget forecasts. The execution rate of the recurrent budget was almost always above 90 percent. The execution rate of the investment budget, on the other hand, was merely 35 percent in 1997 and 1998; this has risen to 75 percent or more in the next three years. In 2002, there was a sharp decline in the execution rate of PIP spending despite the fact that the budget for PIP in 2002 was actually lower than in 2001. As noted earlier, PIP expenditures in 2002 were mainly domestically financed and this reduction in the execution rate occurred due to cutbacks in spending imposed to maintain fiscal balance.

Chart 4.5: Budgeted and executed expenditure in the health sector

Recurrent + investment (PIP) spending



Investment (PIP) spending



Source: Direction Génerale du Budget.

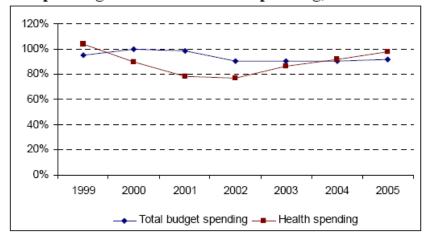
Example 11. Discrepancies in budgeted and executed health expenditures

Source: People's Democratic Republic of Algeria. A Public Expenditure Review 2006. Assuring High Quality Public Investment, Vol. 1, Report No. 36270–DZ.

7.28 Over the past five years the budget execution ratio in the health sector has lagged behind that of other sectors. This is largely a reflection of poor budget execution for capital expenditures. The sub-optimal execution of the capital budget was due to a combination of factors, including insufficient lead time to carry out and complete tenders for substantial capital investment projects and

poor execution of externally funded projects, with the associated lagging utilization of earmarked counterpart funds (Figure 7.8). Though improving since 2003, much of the improvement is attributed to the devolution of capital spending on primary healthcare to local governments and the rapid execution of projects financed by the supplementary budget at the end of 2004. There are also indications that healthcare providers, in particular hospitals, have incurred arrears to suppliers of medical goods, drugs, and at times civil works contractors. However, no concerted effort has been made to date to assess the extent of the arrears build-up in the health sector. Anecdotal evidence suggests that suppliers often resort to questionable means to move ahead in the claimants' queue. In the medium term this is likely to result in reduced competition and higher costs of supplied products.

Figure 7.8: Budget Execution Ratio: Total Public Sector Spending and Health Sector Spending, 1999-2004



Source: MoH, MoF.

Example 12. Sources of healthcare revenue and financing *Source:* FYR Macedonia Public Expenditure Review 2008, Report No. 42155-MK.

3.10 Payroll taxes (social security contributions) are the main source of HIF revenues. High unemployment and evasion, however, together with relatively low contribution rates (one of the lowest in ECA, see Table 3.3), have made it necessary to utilize additional sources of revenues. These include general budget transfers and out-of-pocket payments. Formal out-of-pocket payments have also been supplemented by informal payments. Table 3.4 presents the key sources of revenue and spending of the HIF

Table 3.3: Social Insurance Financing Mechanisms, EU8 and SEE Countries

Country	Sources of Funds	Contributions (in percent of earnings)	Share of Contributions Paid by Employee
Bulgaria	SHI premiums 1/	6.0	50
Czech Republic	SHI premiums	13.5	35
Estonia	SHI premiums	13.0	0
Hungary	SHI premiums	23.5	25
Latvia	Income tax and other general revenues	N/A	N/A
Lithuania	SHI premiums and income tax	6	N/A - 30% of employee income tax (up to 33% of salary goes to SHI)
Poland	SHI premiums	7.75	100
Slovakia	SHI premiums and income tax	14	28
Slovenia	SHI premiums	13.25	47.3
Croatia	SHI premiums and income tax	16	56
Macedonia	SHI premiums	9	0
Serbia	SHI premiums	11	0

¹⁷ SHI = social health insurance.

Source: CIS 2005, World Bank 2005.

3.11 Health insurance coverage is almost universal, but only a fraction of those covered actually pay contributions. There are 14 categories of insured, with the employed and the self-employed (including in agriculture) contributing at the statutory rate of 9.2 percent of gross wages and allowances, and others at different rates. Although the statutory contribution rate is relatively low (with Albania, Bulgaria, Lithuania and Poland having still lower rates in ECA), a statutory minimum threshold in place renders the effective rate much higher on the margin in FYR Macedonia, especially for those with low wages, poor skills and the young. Such a threshold encourages informality, together with the relatively generous benefits offered the unemployed (including full health benefits, leading many informally employed to register as unemployed).

3.12 The authorities have embarked on reforms to harmonize collection of social security contributions to help reduce administrative complexity and burden of multiple agencies. The intention is for the Pension and Disability Fund (PDF) to begin collecting all contributions, with the Public Revenue Office (PRO) ultimately taking responsibility for collecting both contributions and taxes. As an added advantage of these reforms, the HIF will be free to focus on strategic management of health resources, a function that is crucial for improving the efficiency and cost-effectiveness of health expenditures. Similar collection reforms were undertaken in Slovenia and Croatia, resulting in substantial improvement of contribution collection.

Table 3.4: Macedonia: Revenues and Spending of the Extrabudgetary Health Fund

(In millions of denars unless indicated otherwise)

	2005	2005	2005	2006
	Budget	Outturn	Budget	Outturn
Revenues	15,724	15,083	15,820	15,697
(In percent of GDP)	5.5	5.3	5.2	5.2
Contributions from employers	9,257	8,982	9,276	9,506
Contributions from the Pension Fund	3,547	3,417	3,637	3,583
Contributions from the Employment Fund	2,080	2,062	2,143	2,145
Contribution from the Ministry of Labor	64	64	46	56
Transfers from the central budget	68	46	66	42
For programs	64	44	41	40
For health insurance for disabled persons	4	2	25	2
Revenues from co-payment	600	434	573	241
Other revenues	108	79	79	124
Expenditures	15,724	15,206	16,615	16,308
(In percent of GDP)	5.5	5.4	5.5	5.4
Healthcare at home	13,764	13,440	14,732	14,387
Medical treatment abroad	130	151	155	164
Other treatment (compensation)	1,050	1,062	1,200	1,145
Administration	317	276	418	373
Wages and allowances	193	163	194	149
Goods and services	124	113	224	224
Capital expenditures	220	106	110	57
Other expenditures, including interest	63	0	0	0
Balance	0.0	-123	-795	-611
(In percent of GDP)	0.0	0.0	-0.3	-0.2

Sources: Ministry of Finance and Health Insurance Fund; and staff calculations.

Example 13. Private payments to providers

Source: Georgia Public Expenditure Review 2002, Report No. 22913-GE.

Private expenditures on health care

5.27 Private spending consists of out-of-pocket payments in the form of official co-payments, fee-for-service payments and informal payments. Reliable estimates of private expenditures on health are not available for each year. One of the first assessments was made in 1998 based on a 1995 UNICEF household survey, which estimated private expenditure on health to be almost GEL272.7 million. Since then, several national household surveys have been conducted, especially in recent years. Results of these surveys vary, and it is difficult to say with certainty how much is spent out-of-pocket on health care. Different sources of data on out-of-pocket spend¬ing indicate different figures for out-of-pocket spending, ranging from 66–87 percent of total health spending. For example, a recent study by the Department of Statistics, Georgia (SDS) found that out-of-pocket pay¬ments were approximately \$28 per capita, or 73 percent of total

health expenditures. In 2000, according to the Tbilisi Household Survey and the Quarterly Survey of Georgian Households, total out-of-pocket expendintures amounted to GEL132 million, or about 66 percent of total spending on health. Most of the out-of-pocket payments go toward the purchase of drugs (53 percent), followed by hospitalization (23 percent) and out-patient services (17 percent). In addition to formal co-payments and fee-for-service payments, informal payments are probably significant and are very much part of the system. Private health insurance in Georgia is not significant, and amounts to less than GEL.5 million per year.

Example 14. Impact of different sources of finance on equity *Source:* Public Expenditures for Poverty Alleviation in Northeast Brazil: Promoting Growth and Improving Services 2001, Report No. 22425-BR.

- 3.27 Regardless of the direct effect on health status, how does the health subsidy look in terms of redistribution to the poor? This depends on who is paying.
- 3.28 Figure 16 shows the usage of public facilities in the northeast by consumption decile. The deciles used are based on the national distribution of consumption. Note that there are very few people in the highest deciles that use public facilities. This is because there are very few people in the northeast who are in these deciles. The usage pattern is very progressive from this perspective. To the extent that usage of public facilities can be translated into subsidies (discussed below), very little of the public subsidy goes to people who are wealthy relative to the Brazilian population, and over 50 percent of these subsidies accrues to people in the poorest 30 percent of the consumption distribution (the lowest 30 percent corresponds roughly to those in poverty). If the budget for health were paid from federal sources, i.e., from taxes collected from people on average richer than those in the northeast, it would be an excellent means of redistributing income.

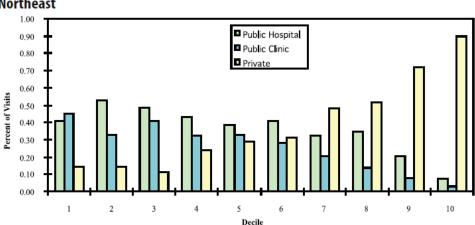


Figure 16. From the National Perspective: The Distribution of Health Care in the Northeast

3.29 However, if funding were to switch to the states themselves, the distributional impact becomes less clear. Figure 17 shows the proportion of visits to facilities from people in different deciles of the consumption distribution defined within the northeast. That is, people in the lowest decile in figure 17 are the poorest 10 percent of the northeast population not the poorest 10 percent of the national population who live in the northeast.

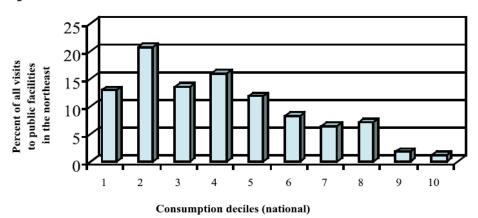


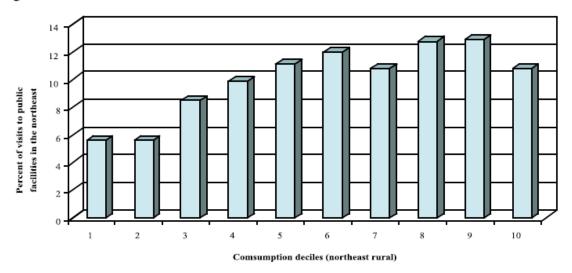
Figure 17. Within the Rural Northeast: Distribution of Health Care Benefits

3.30 If visits correspond to use of public money and if the money needs to be generated within local communities, then the pattern of use in figure 17 represents the beneficiaries of subsidies relative to the population paying for them. In this case, the distributional impact is not nearly so progressive. It is not the poorest of the poor in the northeast who use health services disproportionately, but the well-off relative to others in the region, though not relative to the country as a whole. If the people in the northeast have to support health services from their own tax revenues, these services will lose

their ability to serve a redistributive function.

- 3.31 Since the data in figures 16 and 17 are visits and not money, it is not possible to assess the incidence of subsidies. Should it be the case that richer people can bargain for better and costlier services, figure 16 would be flatter and figure 17 would be steeper. If the government is successful in targeting its subsidies and gives better (or at least more expensive) services to the poor, then the reverse is true and using health as a redistributive device is even better than it looks here. International experience suggests things are worse than they look.
- 3.32 The distributional effect still depends sensitively on whether money is coming from within the region or from the federal government. The states can choose to add to federal transfers to different degrees. Ceará, for example, added about US\$23 per capita to its budget on top of its federal transfer of US\$43 whereas Bahia added US\$16 to its allocation of US\$32 (World Bank 1998). The distribution of income of beneficiaries relative to the taxpayers footing the bill can differ substantially.
- 3.33 Health services do not appear to make much difference in terms of mortality and, if paid for from local sources, may not be a very good vehicle for redistribution. On the other hand the poor don't have much choice. Figure 18 shows the use of different services by consumption group (going back to national definitions). Less than 15 percent of visits to health-care providers by the poorest 30 percent are to private facilities, leaving the large majority to rely on public services. This leaves us with a cruel dilemma. The services may not be very good and they may not go primarily to the poor, but the poor have no alternative. This is another manifestation of the extreme skewness of the consumption distribution. So little of the expense in aggregate terms helps the poor, but that small amount represents a large contribution relative to the poor's resources.

Figure 18



Example 15. Total health expenditures by source

Source: Kosovo Public Expenditure Review 2006, Vol. 1, Report No. 32624-XK.

E. Sources and flows of health finances

4.21 Public financing for health primarily consists of funds channeled through the general budget generated by Kosovo's own budgetary resources, donors' direct budget support and designated donor-grants. In addition, public health facilities receive revenue from off-budget donor funds (direct project support) and from fees paid by patients for drugs and services. Budgetary resources are spent by the Ministry of Health at the central level and distributed to municipalities for primary health care by way of the health grant.

4.22 It is estimated that in total, including out-of-pocket expenditures, at least 81 per person was spent on health in 2004 (see Table 4.3). In terms of GDP, total health spending in 2004 amounts to 6.2 percent, which is at the lower end of the range reported by neighboring countries in 2001, including: Croatia (9 percent), Serbia and Montenegro (8.2 percent), Bosnia Herzegovina (7.5 percent), and Former Yugoslav Republic of Macedonia (6.8 percent). It is considerably more as a percentage of GDP than in Albania (3.7 percent of GDP).

Table 4.3: Health Financing, Main Indicators 2001 – 2004

		2001	2002	2003	2004
Population, estimates		1,820,000	1,867,700	1,900,000	1,932,300
GDP at cu	rrent prices (□Million)	2,423	2,482	2,496	2,542
Total PISG	Expenditures (including DDGs) (□Million)	289.35	429.21	558.67	767.7
Total Heal	th Expenditures (□Million)	160.16	117.43	116.11	157.43
0	PISG Spending (own sources + DDG)	88.6	55.0	55.2	87.9
0	Private out-of-pocket spending, estimates	43.3	46.2	47.9	62.3
0	Donor Spending (off-budget), estimates	28.2	16.2	13.0	7.2
Per Capita	al Health Expenditures (□)	88.0	62.9	61.1	81.5
0	PISG	48.7	29.5	29.1	45.5
0	Private out-of-pocket	23.8	24.8	25.2	32.3
0	Donors	15.5	8.7	6.8	3.7
Annual Cl	nange Total Health Expenditures (percent)	40	-27	-1	36
0	PISG	35	-38	0	59
0	Private out-of-pocket	53	7	4	30
0	Donors	38	-43	-20	-45
Total Heal	th Expenditures (percent of GDP)	6.6%	4.7%	4.7%	6.2%
0	PISG	3.7%	2.2%	2.2%	3.5%
0	Private out-of-pocket	1.8%	1.9%	1.9%	2.5%
0	Donors	1.2%	0.7%	0.5%	0.3%
Public Spe	ending on Health (percent of PISG Exp)	30.63	12.82	9.89	11.45

Sources: MEF, LSMS 2000, HBS 2002

4.23 Donor project support has declined, contributing only 11 percent of total health finances in 2003 and about 4.6 percent in 2004 (Table 4.3). In 2003, donor funds were used to supplement resources for the public health sector, and financed the MOH administrative costs at the central level (64 percent), the Institute of Public Health (26 percent); and the provision of care in public health facilities (10 percent). Decreasing donor support has been compensated by increasing contributions from households and the Kosovo PISG. While the PISG is the main financer of health care, contributing about half of total health finances, estimated private contributions from households have been constantly rising, and are almost as high as Provisional Institutions of Self-Government (PISG) spending. Declining donor commitment is related to several factors, including donors' attention and resources being increasingly drawn to other regions of the world (e.g. Afghanistan and Iraq), and arguably most of the reconstruction work being completed by 2001 and hence the bulk of capital expenditures had already been spent on completing the necessary reconstruction and rehabilitation.

Example 16. Total health expenditures by agency

Source: Honduras Public Expenditure Review 2007, Vol. 2, Report No. 39251-HO.

6.21 Among the four main government agencies involved in health, the MOH invests the most on health, its spending share averaging 77 percent of total public health expenditures from 1999 to 2005 (Table 6.8). Since 2002, and mainly as an aftermath of the social security reform of 2001, IHSS has progressively increased its share of total public health expenditures from 17 percent in 1999 to 30 percent by 2005.

6.22 The government has consistently been the main source of public health funds contributing, on average, about 86 percent while external sources provided 14 percent. In real terms, the former has increased fairly consistently while loans and grants tended to fluctuate from 1999 to 2005 (Figure 6.3).

Table 6.8 Health Expenditures and Shares by Government Institutions, 1999 - 2005

Total Health Expenditures by Government Institution (in constant 1995 lps)							
Year	мон	IHSS	PRAF	FHIS	Total		
1999	962,529.18	204,843.75	10,067.5	20,545.9	1,197,986.5		
2000	1,140,292.2	244,196.0	11,175.7	17,538.5	1,413,202.3		
2001	1,325,580.0	234,063.2	11,397.3	45,928.7	1,616,969.2		
2002	1,301,371.1	328,510.8	10,878.1	17,489.2	1,658,249.3		
2003	1,519,175.1	409,397.0	10,952.0	10,729.9	1,950,254.1		
2004	1,477,150.4	488,959.5	17,312.4	6,395.7	1,989,818.1		
2005	1,570,121.7	687,759.8	23,024.3	11,615.4	2,292,521.1		

	Health Expenditures Shares by Institution (%)								
Year	МОН	IHSS	PRAF	FHIS	Total				
1999	80	17	1	2	100				
2000	81	17	1	1	100				
2001	82	14	1	3	100				
2002	78	20	1	1	100				
2003	78	21	1	1	100				
2004	74	25	1	0	100				
2005	68	30	1	1	100				

Source: MOF and author's calculations

Example 17. Classification of expenditures by function

Source: Indonesia Public Expenditure Review 2007. Spending for Development. Making the Most of Indonesia's New Opportunities, Report No. 38772.

In terms of the functional allocation of health expenditures, the programs that constitute the majority of the budget are the 'public health' and 'individual or personal health' programs. These categories cover the central government's main health programs but there is little detailed information on what these programs are. Generally, it appears that the 'public health' program is focused on the provision of public health centers and their networks, including community health centers (Puskesmas), mobile public health centers and village midwives, whereas the 'personal health program' is focused on providing hospital care in particular. These two categories together constitute 50 percent of the central government's

health programs. Other substantial categories are related to management and administration. Prevention only makes up about 12 percent, and hygiene and sanitation only 3.2 percent of the budget. Nutrition and medicine supply comprise a mere 4 percent of the central government's health budget.

Table 4.6 Functional allocation of the central government health budget, 2006

Rp billion

Program	Curative	Preventive	Operational	Total	%
Health Promotion & Community Empowerment		132		132	1
Hygiene & Sanitation		433		433	3
Public Health		2,465		2,465	18
Individual Health	2,649	1,697		4,346	32
Prevention & Disease Control		1,620		1,620	12
Nutrition		582		582	4
Health Resources			906	906	7
Medicine & Medicine Supply			628	628	5
Health Management & Policy			1,126	1,126	8
Research & Development			1,74	174	1
Improving and Monitoring Accountability			43	43	0
Managing Human Resources			27	27	0
Administration			1,026	1,026	8
Training			15	15	0
Total	2,649	6,928	3,946	13,524	100
%	20	51	29	100	

Source: Bappenas, 2006.

Example 18. Economic classification of expenditures

Source: Guatemala Public Expenditure Review 2005, Report No. 32376.

Economic Composition of MSPAS Expenditures

4.39 Ministry of Health (MSPAS) operations expenditures have averaged 97 percent of total expenditures during 1998 through 2003; Table 4.6. Throughout this period there has been little variation in the proportion of expenditures accounted for by operations or in the proportion that is devoted to personnel. As shown in Table 4.7, personnel expenditures have been averaging 50 percent of total expenditures, a substantially smaller share than the 70 percent share found in neighboring El Salvador (Marques 2004) and Honduras (Fiedler 2004). One would expect the share of personnel in Guatemala to be substantially smaller compared to its neighbors because of the much more important role that contracting NGOs to provide coverage has played in Guatemala. With that explanation, however, one would expect to find the share of personnel costs to have declined after 1997, when the rapid expansion of coverage began via the PEC. Such a decline, however, did not occur, suggesting that salaries of MSPAS personnel have increased in real terms.

Table 4.6: Composition of MSPAS Expenditures: Operating versus Capital

	1998	1999	2000	2001	2002	2003	2004*	2005**
A. Millions of Current US\$								
Operations Expenditures	143.9	158.7	156.1	179.8	192.5	208.0	218.1	228.9
Capital Expenditures	4.8	4.4	4.8	14.0	4.8	4.5	8.9	7.5
TOTAL	148.6	163.2	160.8	193.7	197.4	212.6	226.9	236.4
B. Annual Percentages								
Operations Expenditures	97%	97%	97%	93%	98%	98%	96%	97%
Capital Expenditures	3%	3%	3%	7%	2%	2%	4%	3%
TOTAL	100%	100%	100%	100%	100%	100%	100%	100%

* Adjusted budget. ** Initial assigned budget

Source: Adapted from Chinchilla, 2005 and MEFIN website, March 31, 2005.

Table 4.7: Economic Composition of MSPAS Expenditures

	1998	1999	2000	2001	2002	2003	2004*	2005**
A. Millions of Current US\$								
Wages and Salaries	72	75	78	96	100	106	111	111
Medical and Lab Equipment	8	9	10	17	8	12	9	10
Construction	3	3	2	4	4	4	7	6
Medicines	16	17	17	17	16	20	16	28
Transfers	23	33	27	33	45	43	40	48
Other	26	26	27	27	25	29	45	33
TOTAL	149	163	161	194	197	213	227	236
B. Annual Percentages								
Wages and Salaries	49%	46%	49%	50%	50%	50%	49%	47%
Medical and Lab Equipment	6%	6%	6%	9%	4%	6%	4%	4%
Construction	2%	2%	1%	2%	2%	2%	3%	2%
Medicines	11%	10%	10%	9%	8%	9%	7%	12%
Transfers	16%	20%	17%	17%	23%	20%	18%	20%
Other	17%	16%	17%	14%	12%	14%	20%	14%
TOTAL	100%	100%	100%	100%	100%	100%	100%	100%

*2004: adjusted; **2005 initial assigned.

Sources: Adapted from Chinchilla, 2005 and MEFIN website, March 31, 2005.

4.40 While annual fluctuations in the shares of the economic expenditure categories have been relatively minor, there are some discernable trends: the shares of Medicines and the residual category (Other) have been declining modestly, while the share of Transfers has edged upward. The decline in the share of medicines reflects the near constant absolute level of nominal expenditures on medicines from 1998 through 2004. Given that the CPI's health component has increased annually by 7 percent since 2000, this suggests that the availability of medicines declined. For 2005, the medicine budget calls for an overdue increase of 20 percent.

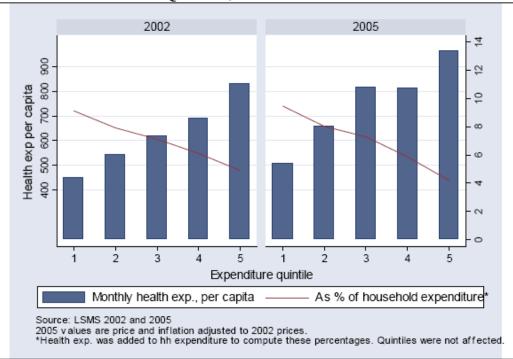
Example 19. Equity implications of out-of pocket payments

 $\it Source: Albania Public Expenditure and Institutional Review 2006, Vol. 2, Report No. 36453–AL.$

7.6 Furthermore, the existing health financing system offers limited protection against catastrophic illness or injury and allows for little redistribution of resources to protect the most vulnerable groups from impoverishing health care expenditures. LSMS household survey data show that lower income groups spend

a significantly higher share of their household budget on health care than upper income groups, although in absolute terms the lowest income quintile spends only about half as much on health as the top quintile (Figure 7.2).

Figure 7.2. Out of Pocket Spending on Health by Expenditure Quintile, 2002 and 2005



7.7 The Albania Poverty Assessment has shown that health expenditures have a strong impact on poverty, with the poverty incidence increasing from 25 to 34 percent if out-of-pocket health expenditure is subtracted from household income. Outpatient care expenditures have a greater impact on poverty than hospital expenditures, owing to their more frequent occurrence (Figure 7.3).

7.8 However, when low income households have to face hospitalization, the income shock is catastrophic, with the average hospital payment amounting to over four times the monthly per capita income of the lowest expenditure quintile. Lower income households also have a significantly higher likelihood of incurring catastrophic health care expenditures than better off households, as even relatively modest outpatient care expenditures can amount to an excessively high share of a household's budget. The average out-of-pocket expenditures for one episode of outpatient care amount to 50 percent of the average monthly per capita expenditure of the lowest consumption quintile, suggesting that even the need for a simple outpatient care visit can result in catastrophic expenditures for the lowest income groups.

poverty 25% headcount index 20% before and after 15% health spending 10% 5% 0%

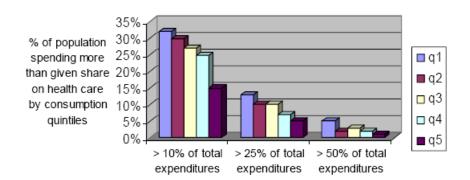
hospital

expenditures

Figure 7.3 Poverty Impact of Health Expenditures

All health

expenditures



Example 20. Catastrophic impacts of out-of-pocket expenditures

Source: Gottret, Paul, George J. Schieber, and Hugh R. Waters (Eds.) (2008). Good Practices in Health Financing. Lessons from Reforms in Low- and Middle-Income Countries. Washington, DC: World Bank. Available at http://siteresources.worldbank.org/INTHSD/Resources/376278-1202320704235/GoodPracticesHealthFinancing.pdf

The following example illustrates the catastrophic effect of OOP payments in Tunisia. The data used are from the 2003 World Health Survey, in Tunisia (WHO 2003a). However, that survey has only a limited number of questions on household expenditure and does not impute the rental equivalent of housing or durable goods. Data necessary to construct a consumption aggregate, the preferred measure of living standards (Deaton and Zaidi 2002), were not available, and the use of limited expenditure data almost certainly results in measurement error. The results are therefore meant only to be illustrative and should be interpreted with caution. Data on OOP payments include expenditures on inpatient care, outpatient care, care by traditional healers, dentists, medication or drugs, health care products such as prescription glasses, hearing aids, prosthetic devices, etc, laboratory tests, and any other health care payments. The recall period for both total

expenditure and OOP health expenditure is one month.

[A] detailed analysis of the catastrophic impact of OOP payments appears in table A.1. The headcount statistics indicate a sizeable number of households spending large shares of total and nonfood expenditure on OOP payments. The severity of these payments, as measured by the overshoots, is also strikingly high. Moreover, above the 25 and 40 percent thresholds, the poorer households incur catastrophic spending for both total and nonfood spending. The rank-weighted headcounts, which are accordingly larger than the unweighted headcounts, indicate the increasingly higher concentrations among the poor as the threshold rises.

In terms of total expenditure, the severity of OOP payments is also concentrated among the poor for all thresholds; however, for the two highest thresholds of nonfood spending, the rich account for most of the excessiveness of OOP payments. In this case, more poor households surpass the thresholds, but the rich spend disproportionately more of their discretionary spending on OOP payments.

Table A.1 Catastrophic Impact of OOP Payments in Threshold Expenditure Shares in Tunisia, 2003

	Percent of total expenditure			Percent of nonfood expenditure			
Measure	10	25	40	10	25	40	
Catastrophic headcount	33.2%	13.6%	5.9%	49.8%	37.7%	27.2%	
Concentration index	0.023	-0.077	-0.126	0.014	-0.043	-0.112	
Rank-weighted catastrophic headcount	32.4%	14.7%	6.6%	49.1%	39.3%	30.2%	
Mean positive overshoot	17.5%	17.6%	17.2%	36.8%	32.0%	27.5%	
concentration index	-0.047	-0.091	-0.071	-0.072	0.530	0.060	
Mean catastrophic payment overshoot	5.8%	2.4%	1.0%	18.3%	12.1%	7.5%	
Rank-weighted mean catastrophic payment overshoot	6.1%	2.6%	1.1%	19.7%	5.7%	7.0%	

Source: Authors

Example 21. Informal payments

Source: Lewis, Maureen, A. and Gunilla Pettersson (2009) "Governance in Health Care Delivery: Measuring Performance", Draft. World Bank, Washington, D.C.

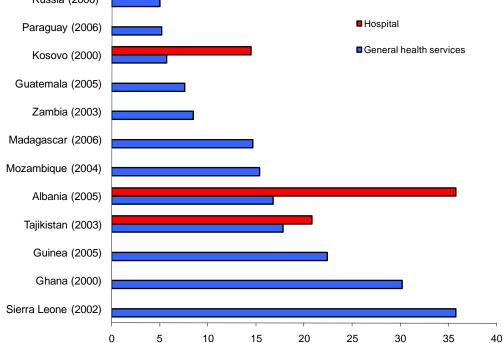
How widespread are informal payments?

A major challenge is differentiating among formal, informal, and gratitude payments in the presence of official co-payments and voluntary gift-giving by grateful patients. Where all fees have been banned any payment by households is clearly unofficial but in many countries formal fees do exist and blur the dichotomy. It then becomes the amount of payment, the nature of the transaction, and its timing that determine whether the payment is informal or not (Lewis 2006). For example, in the Kyrgyz Republic in 2001, 95 percent of those who paid for services did not receive a receipt while only 3 percent reported giving a gift to the health personnel at the time of service (Falkingham 2002).

Figure 6. shows the percentage of survey respondents who recently used public health facilities and reported making informal payments. The data are for 12 countries for which recent World Bank data are available. More than 35 percent of respondents in Sierra Leone and 30 percent in Ghana reported making informal payments. In Russia and Paraguay by contrast, "only" five percent did. A breakdown of informal payments for hospital and general health services show that without exception, a larger share of households reported making informal payments for hospitalizations.

Russia (2000) ■ Hospital Paraguay (2006) Kosovo (2000) Guatemala (2005)

Figure 6. Percentage of users reporting informal payments in selected countries, 2000-2006



Sources: World Bank Country Diagnostic Surveys (various years) and LSMS (various years).

TABLE 14. presents additional country data on informal payments, which provide a sense not only of their frequency but also their size in these countries. The share of households that report having made informal payment for health services is highly variable across countries, ranging from 3 percent in Peru to 22 percent in Guinea. In all countries informal payments make up a large share of half-monthly per capita income, from 15 percent in Paraguay to 113 percent in Madagascar. These data clearly show how informal payments in health care can constitute a major burden on household resources.

TABLE 14. Incidence and magnitude of informal payments for health in selected countries, 2001-2006

	Informal payment for general health services as % of half-monthly per capita	Share of households that report making informal payments (%)
Benin (2006)	53	4
Guatemala (2005)	23	16
Guinea (2005)	43	22
Madagascar (2006)	113	15
Paraguay (2006)	15	5
Peru (2001)	20	3

Source: World Bank Country Diagnostic Survey (various years).

Example 22. Geographic distribution of resource allocation

Source: Uzbekistan Public Expenditure Review 2005, Report No. 31014-UZ.

2.13 Public expenditures do not redress inequities. Regions with a higher incidence of poverty spend less per capita on health care than richer regions (Figure 2.2). Syrdarya for example receives a per capita allocation that is almost twice that of Samarkand despite the fact that the incidence of poverty is one-third of Samarkand's. Kashkadarya has one of the highest incidences of poverty yet one of the lowest per capita allocations for health care. This regressive budget allocation probably reflects the fact that current budgeting perpetuates historical patterns of expenditure, maintaining existing health infrastructure, and not adjusting for population need. Similar variations exist in per capita allocations between rayons within an oblast, and oblast administrations have limited ability to redistribute revenues from richer to poorer rayons.

9 ■ Health expenditure per capita unable to meet basic needs 8 Incidence of poverty (right-hand scale) thousand soums 7 6 5 Navoi Djizzak Karakalpakstan Syrdarya Kashkadarya Surkhandarya Namangan Tashkent Fashkent city Samarkand Khorezm Ferghana Bukhara

Figure 2.2: Poorest Regions Get a Smaller Share of Public Expenditures on Health Care

Sources: Uzbek authorities; Living Standards Assessment, World Bank (2003)

2.14 The budget continues to favor inpatient care, which benefits the rich and urban population more. More than two-thirds of the health budget is still spent on hospitals, compared with an average of 38 percent spent on in-patient care in OECD countries in 2001 (OECD Health Data, 2003). This also perpetuates inequities due to the imbalance between health resources consumed by urban and rural populations as rural population seeks care in the first instance in outpatient settings rather than hospitals (57 percent vs. 26 percent) and urban populations seek care in the first instance in polyclinics and hospitals (World Bank, 2003). This general pattern of use of services by rich and poor is further reinforced by results from a benefit-incidence analysis for hospital services from the household budget survey (Figure 2.3).

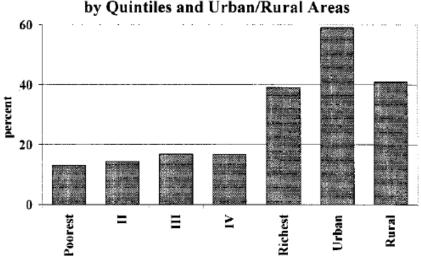


Figure 2.3: Distribution of Public Expenditures on In-patient Hospital Visits, by Quintiles and Urban/Rural Areas

Example 23. Health services delivered by other agencies *Source:* Maldives Public Expenditure Review 2002, Report No. 24238-MV.

Sources: Living Standards Assessment, World Bank (2003)

4.60 It is possible that the expenditure and budget numbers used here actually underestimate the Government's commitment to the health sector in the Maldives. This is due to the fact that, in addition to the Ministry of Health, a number of the other line ministries have budget items related to health sector spending. Figure 4.4 presents a flow of funds diagram covering public spending on health. While the bulk of spending on health goes through the Ministry of Health, a complete public spending picture includes:

- Ministry of Women's Affairs and Social Security (MOWASS) provides financial
 aid for Maldivians needing care outside the Maldives as well as to Maldivians
 receiving treatment in Malé (primarily at IGMH). In 2000, for example,
 MOWASS provided financial aid of more than Rf 8.5 million to 589
 individuals receiving treatment abroad and 1485 individuals receiving
 treatment within the country.
- The Presidential Palace. The Presidential Palace also provides aid to individuals that receive treatment abroad.
- Ministry of Defense and National Security. Some spending takes place on health services for staff and their families.
- Cost Recovery. IGMH, some regional hospitals, the Ministry of Health, the Water and Sanitation Authorities, and Department of Public Health charge

for a variety of services. Revenues are not retained or recycled at facilities—they are remitted to the Treasury.

Intermediation Source 5 4 1 <u>Use</u>s Ministry of Health Water and Sanitation verseas Tertiary Care Public Budget Affairs and Social Security **IGMH** Presidential Palace External Assistance Regional Hospitals Ministry of Defense Health Clinics Household Spending Cost-Recovery

Figure 4.4: Sources and Uses (Public Sector Flow of Funds)

Source: PER Mission discussions with government officials.

4.61 The flow of public funds depicted in figure 4.4 and the difficulty of finding disaggregated expenditure and budget information for all the intermediaries highlight the need for a well-functioning financial information system and National Health Accounts. The inability to track sectoral expenditures from sources to intermediaries to uses makes it difficult for policy makers to ensure that resources are allocated and used in effective and efficient ways and that priority activities are receiving appropriate funding.

Example 24. Geographic distribution of health services

Source: People's Democratic Republic of Algeria. A Public Expenditure Review. Assuring High Quality Public Investment 2007, Vol. 1, Report No. 36270–DZ.

8.60 Access to care is still subject to major inequalities by geographic zone. Algerian authorities have made significant efforts to equip the entire country with health infrastructure. Thus, the ratio of beds per 1,000 inhabitants is higher than the national average in the Southwest region and close to the national average in the Southeast region (Table 8.10). However, there are still considerable variations from one wilaya to the other. For example, in the central region, Algiers has 2.89 beds per 1,000 inhabitants, while Medea has only 40 percent as many (1.17). Moreover, while rates in the South are broadly satisfactory, they mask the fact that people often live too far from health centers, most of which lack adequate transportation to bring treatment to the countryside. Finally, most of the new private clinics are located in the wealthier wilayas, which exacerbates hospitalization access inequality.

Table 8.10 Geographic Distribution of Health Care by Regions, 2004

	Population	Number of beds ^a	Number of physicians ^b	Beds/1,000	Physicians/ 1,000
Center	10,624,293	18,543	16,164	1.75	1.52
East	9,616,633	15,214	14,177	1.58	1.47
West	7,477,354	6,561	8,413	0.88	1.13
Southeast	2,610,160	3,431	2,102	1.31	0.81
Southwest	898,901	1,998	839	2.22	0.93
Total	31,227,341	45,747	41,695	1.46	1.34

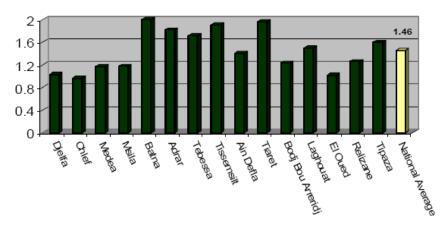
Source: Health Map.

b Public and private sector physicians.

8.61 The most glaring inequalities occur, however, in the distribution of health professionals. There are sharp discrepancies among regions: from 0.81 physicians per 1,000 inhabitants in the Southeast to 1.52, or nearly twice as many, in the Center. These gaps reflect physicians' reluctance to serve in rural or isolated regions, particularly in the South, and their preference to reside and tendency to be concentrated in the major cities. Even public sector physicians resist assignments in the South or Western regions. To address this situation, the Ministry of Health announced that it would not post positions in the northern part of the country for physicians graduating in 2005 who must fulfill their national service obligations. Nonetheless, and despite the reduced period of compulsory service and the supplementary bonuses being offered, many physicians, women in particular, have given up their practices rather than leave the big coastal cities. Correlating access to health care with the 2001 Health Map confirms that public health facilities (beds) are now present in the poorest wilayas (Figure 8.8), but very few physicians choose to practice in them (Figure 8.9).

a Includes public-sector beds only; the number of private-sector beds, likely still low, is unknown.

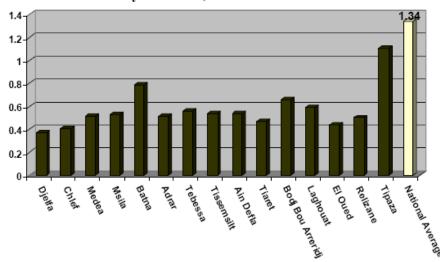
Figure 8.8 Number of Beds/1,000 Inhabitants in the "Poorest Wilayas," 2004



Source: MOL (Health Map), ONS (Poverty Map 2001).

Note: From left to right, in decreasing order (from the poorest to the "richest").

Figure 8.9 Number of Physicians/1,000 Inhabitants in the "Poorest Wilayas," 2004



Source: MOL (Health Map), ONS (Poverty Map 2001).

Example 25. Equity of health services

Source: Lao PDR Public Expenditure Review and Fiduciary Assessment 2007, Report No 39791-LA.

6.4.1 Geographic and Income Disparities

193. The majority of the poor in Lao are ethnic minorities living in remote mountainous areas. A special approach is necessary to deliver health services to these groups. The GOL has identified 47 highest priority districts and has solicited donor support for targeted interventions. Although commendable, this approach does not cover the poor who live in other districts.

194. Per capita government health spending varies considerably across provinces

and districts. In 2001-03, it ranged from US\$1.5 per capita in Vientiane and Bolikhamxay Provinces to US\$7.5 in Luang Prabang. Moreover, GOL health spending is not statistically related to factors such as income, poverty, or health need. Therefore, it is necessary to develop a transparent need-based formula to ensure that adequate allocations are made for recurrent health expenditures across all provinces. This formula would apply to donor financing as well. An official formula is particularly important given that, because of the high level of decentralization in Lao PDR, the central government has little control over local resource allocation decisions and implementation. Sub-national administrations have the core responsibility for delivering primary and secondary health care services.

195. Government health spending is biased toward the central level. Resources available at the district level are extremely limited. After adjusting for types of expenditures that actually benefit front-line health services (such as centrally procured drugs), the central level absorbs at least 27 percent of government health expenditures. Total government health spending at the district level in FY 2002-03 was below US\$1 per capita (including only \$0.50 government-own-financed recurrent expenditure) in the Health System Improvement Project. This means that the GOL spent only one-fifth of total health expenditures on district health facilities and health centers, which should play the key role in delivering essential health services to the population, especially to the poor. Differences in recurrent health expenditures among provinces are significant. For example, while Bolikhamxay Province spends 7,215 Kip per capita, Sekong spends 22,990. Average expenditure is 11,040 Kip per capita, with a standard deviation of 4,466.39

196. Although the average Lao household makes a modest payment for health care, catastrophic health expenditures pose a poverty risk. On average, household health expenditures constitute 2.1 percent of total annual household consumption, or 6.6 percent of household non-food expenditure (LECS 111). The currently relatively low prevalence of catastrophic out-of-pocket (OOP) payments in Lao is due partially to the extremely low use of professional health services. However, for those in the poorest quintile who are hospitalized, the OOP for care and transport amounts to 14 percent of their annual consumption expenditure. In actuality, the poor have no protection against catastrophic health care expenditure.

197. There is a lack of effective mechanisms to protect the poor from unaffordable health care costs. The 2006 Poverty Assessment points out that some of the key health service indicators, such as use of health facilities when

sick and childbirths at health centers, had *declined* in the 47 priority districts in 2002-03 compared with 1992-93. More analysis is necessary on why geographic targeting has not produced better outcomes.

198. The poor in urban and lowland areas also need to be targeted, as 6 of 10 poor people live outside high-priority districts. The Drug Revolving Funds can charge 25 percent over cost, but there is no guideline on whether and how this surcharge can subsidize the poor patients who cannot pay for drugs. Pilot Integrated Community Health Centers supported by the World-Bank-funded Health Services Improvement Project (HSIP) plan to cross-subsidize the poorest to a limit of up to 10 percent of the population and 10 percent of revenues. However, even these fall far short of need in Lao PDR, where the overall poverty rate is 33.5 percent and even higher in the rural areas.

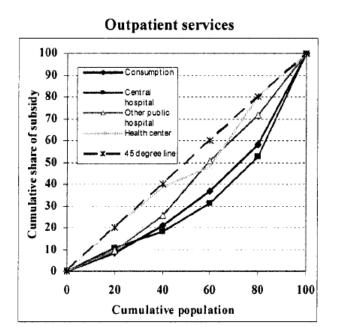
199. The GOL is developing health insurance plans to subsidize health care for certain groups, but most of these groups are not poor. The GOL is promoting Community-based Social Health Insurance, but, although it may improve risk pooling for private expenditures, it is unlikely that the poor will be able to afford to participate. In two locations, donors have supported NGOs in operating equity funds to cover user fees for the poor, and the HSIP plans to support more. These field experiences need to be used to develop effective mechanisms to ensure that the poor have access to essential health services. A combination of measures may be needed, including better geographic targeting (such as poverty mapping) and linking budget allocations with socioeconomic indicators, working with communities to identify the poor, and exploring the possibility of getting equity funds to provide community-based health insurance.

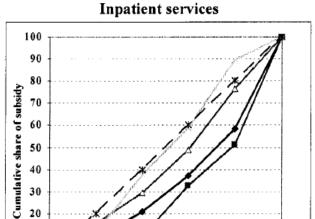
200. Public subsidies tend to favor the upper-income quintiles. The richest quintile captures 27 percent of public subsidies for health services, compared with 13 percent for the poorest. In particular, public subsidies to central hospitals are heavily biased in favor of the richest quintile. This group alone gets nearly one-half of total subsidies for central hospitals, whereas the poorest group gets only 7 percent. Even in the case of the health centers, the top 40 percent of the population receives more subsidy than the poorest (Figure 22). These data prove that GOL health expenditures fail to ensure access to essential health care for the poor. Given that health subsidies at the central level favor the upper income quintiles and the government's potential capacity to generate revenue from user fees, there is scope for directing the additional subsidies from these extra user fees to the lower quintiles. This increase would require changes in the resource allocation mechanisms that are currently based on existing facilities and staff, which are concentrated in urban areas.

Figure 22. Concentration Curves of Consumption and Health Care Subsidies

20

10





40

20

60

Cumulative population

80

100

Source: Estimated from LECS III 2002.

Example 26. Equity of health services

Source: Indonesia Public Expenditure Review 2007. Spending for Development. Making the Most of Indonesia's New Opportunities, Report No. 38772.

Inequality in public health expenditures

There are major regional differentials in per capita public health expenditures at the local level, illustrating local disparities and inequalities. Average per capita public expenditures on health are similar across most provinces, with Papua, Gorontalo, and East and Central Kalimantan being the main exceptions. However, disparities within provinces and across districts are more common, as there are wide variations around the mean.

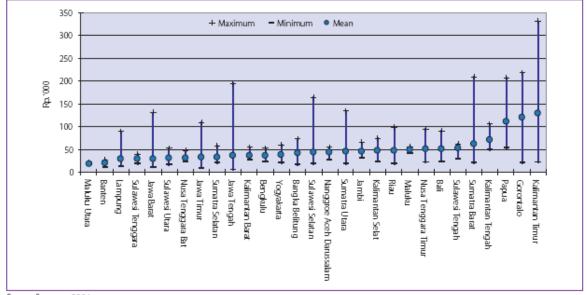


Figure 4.16 Per capita public expenditure on health by province, maximum, minimum and mean

Source: Susenas, 2004.

At the district level, there is considerable inequity in public spending, driven in particular by regressively targeted deconcentrated central government expenditures. Health expenditures from the central government in the form of deconcentrated spending are ineff ective in terms of targeting poorer districts. This is especially important as these public transfers constitute nearly half of central government development expenditures and are therefore crucial resources for policy interventions. Also, in 2004, deconcentrated health expenditures made up about 29 percent of total national health expenditures. Public health expenditures made through the sub-national budget (APDB), at the province as well as the district level, are also higher for richer local authorities than for poorer ones. This is partly explained by the fact that these expenditures are determined not only by DAU allocations, but also by own source revenues, which tend to be higher in districts with higher per capita expenditures. DAK contributions at the district level are at present not used as a pro-poor tool to improve health service delivery in lagging districts, shown by the weak response of DAK per capita spending or access to health facilities (USAID, 2006).

Benefit incidence of public health spending and utilization of services

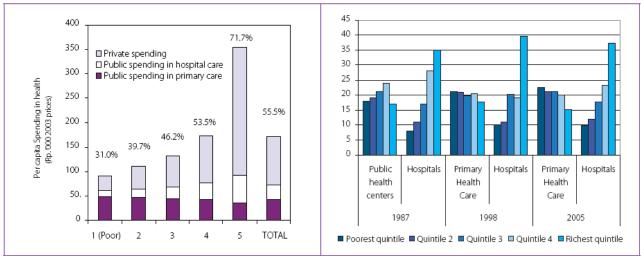
Currently, public health spending generally benefits richer income groups more than the poor through regressive subsidies for secondary care. The benefit incidence of public spending on primary healthcare is not propoor but neutrally distributed among quintiles. However, spending on secondary healthcare is certainly not propoor, with most of the benefits accruing to the richer quintiles. While the public health services most utilized by the poor are

basic healthcare facilities, Indonesia spends about 40 percent of public healthcare resources on regressively targeted subsidies to public hospitals. (World Bank, 2006g).

The poor have very little access to public hospitals and, hence, do not make use of the vast majority of the spending that is channeled into secondary care. Of the funding that is spent on hospital care, the benefits that accrue to the poorest quintile of the population are about 10 percent, while those that accrue to the richest quintile are about 38 percent. Spending on secondary care is a highly regressive way of allocating limited resources in healthcare at a time when Indonesia is struggling to meet its medium-term development targets in health.

Figure 4.17 Private/public healthcare utilization

Figure 4.18 Type of healthcare utilization



Source: Susenas 2005.

Source: World Bank, 2006f, updated with Susenas, 2005.

Government efforts to improve the utilization of health services by the poor and their capture of health spending have had little effect since 1998. The fuel subsidy reduction compensation healthcare program (PKPSBBM) is aimed at increasing access to both basic and secondary healthcare for the poor in a targeted way. This program, if effectively targeted and implemented, could be the key in expanding health services for the poor (see Box 4.3 on PKPS-BBM below). Nevertheless, for the poor to be able to utilize private healthcare facilities through the program, incentives need to be provided for these providers in order to enable them to participate.

Private traditional care

Private paramedic

Private Doctor

Private Hospital

Private Hospital

Public Hospital

Public Puskesmas

Figure 4.19 Utilization of outpatient care, 2005

Source: Susenas, 2005.

When the poor seek treatment, they choose private providers in 43 percent of cases. Of those private providers, the poor make most use of private paramedics (nurses, midwives etc) and doctors. With increasing income there is a move away from paramedics towards doctors. The average-odds ratio of participation is highest for the poor in public Puskesmas, private doctors and private paramedics (nurses, midwives etc). This means that investments in these areas, if participation rates remain the same across quintiles, are more likely to benefit the poor than the richer quintiles. In contrast, investments in public and private hospitals are among the most pro-rich investments in Indonesia given the underlying utilization rates for health services (World Bank 2006f). They will remain so unless investments are targeted to make these services more accessible to the poor. The high utilization of private providers by the poor also calls for improvements in stewardship (regulation, accreditation, licensing) of the private health sector in order to control quality and improve equity.

Example 27. Insurance and entitlement to care

Source: Albania A Public Expenditure and Institutional Review 2006, Vol. 2, Report No. 36453–AL.

7.19 Effective coverage by the Health Insurance Institute (HII) is limited and only about one third of the active work force make contributions. Household survey data show that only about forty percent of the population is effectively covered by HII, mainly concentrated in urban areas and the upper income quintiles, with significant regional variations (Figure 2.5).

7.20 Contribution incentives for the active labor force are overall weak, as the scheme provides limited benefits, covering only primary care (outside polyclinics), reimbursement of prescription drugs of varying

degrees, and certain high end diagnostics procedures. Outpatient care in polyclinics and hospitals, and inpatient care, are financed by general revenues and in principle free of charge if a patient has been referred by the primary care physician.

7.21 Household surveys show that the vast majority seeking care at these levels nevertheless incur significant out-of-pocket payments, irrespective of insurance coverage. Similarly, household survey data also show that the possession of a health insurance booklet does not significantly lower the amount of out-of-pocket expenditures for outpatient care nor does it affect the likelihood of having to pay for care, particularly outside of Tirana. Overall, the incentives to pay health insurance contributions are limited. Furthermore, anecdotal evidence suggests that a significant share of the population have limited knowledge of health insurance benefits. Thus it is likely that some of those who are in principal covered through the state do not know about and make use of their rights.

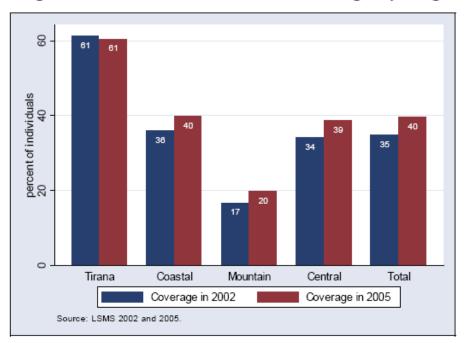


Figure 7.5. Health Insurance Coverage by Region

Example 28. Insurance and entitlement to care

Source: Guatemala Public Expenditure Review 2005, Report No. 32376.

Access to Insurance Coverage

4.56 The vast majority of Guatemalans have little financial protection from the adverse consequences of poor health. Fifty-two percent of total

health expenditures are private expenditures and 45 percent of total health expenditures are financed out-of-pocket. According to the 2000 ENCOVI, the Social Security Institute (IGSS) covers only 8 percent of the population, while another 2 percent is covered through private insurance schemes. This represents one of the lowest coverage rates of a social security institute in all of Latin America. The poor, in particular, are at great risk for lack of insurance: 71 percent of the persons enrolled in IGSS health program are from the richest 40 percent of the population. The proportion of the population without health insurance is inversely related to the household consumption quintile, and ranges from 97 percent among the poorest quintile to 73 percent among the richest; Table 4.13.

Table 4.13: Proportion of Individuals with Health Insurance Coverage

		House	Residence					
	Total	Poorest	Q2	Q3	Q4	Richest	Urban	Rural
Private Ins.	2%	0%	0%	1%	2%	9%	6%	1%
IGSS	8%	3%	3%	6%	12%	18%	15%	5%
None	90%	97%	96%	92%	86%	73%	81%	94%

Source: Adapted from Gragnolati & Marini, 2003.

4.57 The majority of persons who obtain care from IGSS hospitals are not IGSS affiliates. This widespread practice probably reflects inadequate control of persons who are treated at these facilities. This is essentially a management problem that—given the magnitude of this phenomenon—adds substantially to the costs of operating IGSS hospitals. At the same time, a larger proportion of IGSS affiliates use private hospitals rather than IGSS hospital, reflecting, at least in part, their dissatisfaction with the availability and/or quality of IGSS hospital care. Five percent of persons with private insurance and 6 percent of IGSS affiliates attend MSPAS hospitals. It is not known if they are among the patients who pay user fees.

User Fees, Coverage and Availability of Services

4.58 User fees discourage access to and use of care. Despite the fact that only one-third of Guatemalans pay MSPAS user fees, a 2000 national survey found that 59 percent of persons who did not seek care they felt they needed cited their lack of money as the reason they had not sought care (World Bank, 2004: 121). The 2000 ENCOVI found that MSPAS provided care to only about one-third of persons who reported obtaining care in the month prior to being interviewed. Private sector clinics and hospitals were (quantitatively) the most important source of care, covering 40 percent.

Table 4.14: Use of Health Facilities by Health Insurance Status

Indidual Insurance Status	Public Hospital	Private Hospital	IGSS Hospital	Health Post or Health Center	All Others	Total
Private Insurance	5%	17%	53%	8%	17%	100%
IGSS	6%	39%	37%	5%	14%	100%
No Insurance	10%	1%	40%	27%	22%	100%

Source: Adapted from Gragnolati & Marini, 2003.

4.59 Access to MSPAS is constrained by both demand-side and supply-side barriers. A recent World Bank analysis of the communities of persons who did not use health facilities found that physical availability (supply-side constraint) was an important explanatory factor, but that demand side constraints and mixed (demand and supply) constraints were the more important ones.

Table 4.15: Coverage: Sources of Health Care Services (Persons with a Visit in the Month Prior to Being Interviewed)

	Househo	Household Consumption Quintiles						
	Lowest	Q2	Q3	Q4	Q5	All	Indigenous	Non- Indigenous
Public Hospital	9%	11%	10%	12%	7%	9%	8%	10%
IGSS Hospital	2%	3%	6%	8%	9%	7%	4%	8%
Private Hospital or Center	13%	25%	27%	40%	63%	40%	30%	45%
Health Post or Center	40%	36%	34%	23%	6%	23%	30%	19%
Community Center	5%	2%	2%	2%	1%	2%	3%	1%
All Others	31%	24%	21%	15%	15%	19%	25%	16%
All Facilities	100%	100%	100%	100%	100%	100%	100%	100%

Source: Gragnolati & Marini, 2003.

4.60 Using the World Health Organization's metric for assessing access—namely, being within one hour of a source of care—the ENCOVI survey reveals that only 11 percent of the population has access to care, and that there is a direct relationship between household consumption quintile and level of access.

Table 4.17: Access to Health Facilities: Proportion of Adults

Travel Time Less than 60 Minutes						
Q1: Lowest	5%					
Q2	7%					
Q3	10%					
Q4	12%					
Q5: Highest	19%					
All Households	11%					
Indigenous	9%					
Non-Indigenous	12%					

Source: Gragnolati & Marini, 2003.

Example 29. Insurance and entitlement to care

Source: Public Expenditures for Poverty Alleviation in Northeast Brazil 2001: Promoting Growth and Improving Services, Report No. 22425-BR.

3.36 A further benefit of medical services to the poor also relates to insurance. Very few poor people have formal insurance (figure 19). For these people, the prospect of free or heavily subsidized care through public facilities serves a function similar to insurance. It frees them from worry about financial vulnerability. How much this is worth can be approximated by calculating the "risk premium" associated with assurances against financial loss. Appendix 4C presents a description of this concept and its calculation. Figures 20 and 21 show the size of this benefit as a fraction of the costs associated with providing the services themselves as a function of the cost of services and of the income of the recipient.

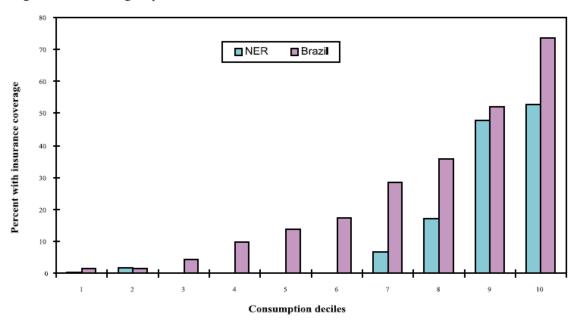


Figure 19. Coverage by Health Insurance

3.37 Several points are noteworthy. First, the insurance value of providing free service can be a very high fraction of the cost of the services themselves. Second, the value of this benefit goes up with the cost of the service. It is more valuable to insure against expensive procedures rather than relatively cheap ones. This implies that the role of primary health centers as a source of referrals to hospital treatment may be more important than its role in providing free care. People may be willing and able to pay for routine curative care and subsidies at that level may not be worth much. Finally, the insurance benefit of the services is higher for poor people than for rich at every level of expense. Therefore, this could offer an important means of helping the poor relative to the rich. 3.38 However, there is an important caveat to this conclusion. Free hospital services for the poor, will require that access to the services be based either on income itself or on medical need. Since the determination of a person's income is often difficult, the better prospect is to assure that the referral system operate fairly. If the poor had the same probability of receiving care once sick as other people, their higher disease incidence would be enough to make the system pro-poor. In conjunction with the higher insurance benefit per unit lost to poor people than rich from expensive hospital care, the potential is very large. The reality depends on how referrals are administered.

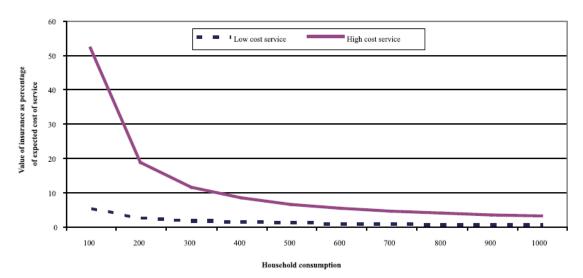
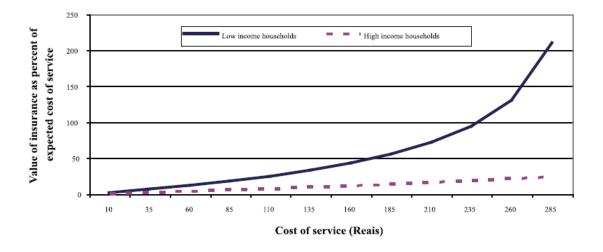


Figure 20. Value of Insurance by Household Per Capita Consumption

Figure 21. Value of Insurance by Cost of Insured Service



Example 30. The budget process

Source: Angola Public Expenditure Review 2007, Vol. 2, Report No. 39710-AO.

C. The Budget Cycle in the Health Sector

198. The budget preparation process is led by the MOF. It begins in June and ends in September. The first step is the updating of the country's macroeconomic framework and the preparation of government revenue projections. This exercise is carried out by the MOF and by the Ministry of Planning (MOP). They establish budget ceilings for provinces and sectors, an exercise that determines the overall allocation of resources for the sector.

199. The steps for determining current expenditures, including personnel and goods and services, are as follows:

- i. The process begins when budgetary units (BUs) receive guidelines from the MOF, placed on its website (www.minfin.gv.ao). The guidelines include application forms to be filled in by BU managers and submitted to the National Budget Directorate.
- ii. The BUs and their dependent units (DUs) have 3-4 weeks to prepare budget proposals, using the program budgeting methodology. The government does not take full advantage of this approach because budget preparation is not usually preceded by an explicit planning exercise (with definition of priority activities and costing). Programs are defined by the MOF, without prior work with the sectors, taking as a basis the programs included in the government Plan of Action. Monitoring indicators are not required and there are conceptual errors in the proposals.
- iii. Budget proposals are adjusted to the ceilings defined for each BU and DU. Ceilings for the DUs are prepared by the responsible BUs. Provincial governments decide the budget ceilings for all sectors in the province, except for provincial hospitals, which are BUs and have their ceiling determined directly by the MOF. During the last two years, the process was made easier in the provinces with access to the internet and where the SIGFE functions on-line.
- iv. Once the proposals are received by the National Budget Directorate (NBD), via the Provincial Finance Directorate, the technical staff consolidates them and corrects possible errors. There is no real negotiation between BUs and the NBD, as shown by the fact that budget ceilings are rarely altered.
- 200. Investment planning and budgeting are made in parallel. This process is led by the MOP which deals directly with the ministries' planning departments, and provinces. The investment budget preparation process lacks technical instruments. In the health sector, there is no map of health services to guide investment requirements as a function of the population and the epidemiological profile. Nor is there a national investment plan that would define medium term interventions for the national, regional and provincial level units. Such a plan would normally be followed by provincial plans which would design interventions at municipal and communal level. These plans would include current expenditure projections, principally human resources and drugs required for the new infrastructure. The absence of these instruments puts at risk the coherence and sustainability of the government's ongoing investments.
- 201. The institutions taking part in the allocation process for goods and services are the MOH, the NBD, and the MOF which set the budgetary ceilings jointly. In the provinces, the ceilings for provincial hospitals are provided by the NBD and the MOF, so far without the participation of the MOH. Provincial governments

define the ceilings for their dependent units, namely the Provincial Health Directorate (PHD) and municipal hospitals. Regarding personnel, resource allocation in the short term is semi-automatic, and resources are put where the employees are based. In the case of goods and services, there is much more flexibility. As for investments, given that commitments are made for multi-annual investments, flexibility in allocation is not as high as for goods and services. The allocation of resources for investment is made by the MOP, the MOF, the MOH and the provincial governments.

202. The micro-planning process is led by the MOF. Over the last decade the MOH did not lead the strategic planning process, as it should as sector leader. There have been attempts since 1995 to prepare a medium term strategic plan and the MOH is currently reviewing the National Health Policy. However, to date the sector remains characterized by the absence of planning documents and regulation for the 1992 law, which substitutes for the National Health Policy in many aspects.

203. With respect to macro planning, the budget preparation is the only time apart from budget execution when health institutions undertake a planning exercise for their activities. Officially, program budgeting is used, which links resources to specific programs, with objectives, targets, indicators, and detailed costs. However, as this methodology is not well implemented, there is no link between inputs, outputs, and outcomes. A major concern is that budgeting is made by administrative staff, with little involvement of key managers.

204. Another problem is the absence of connection between the planning at the central and provincial levels. Generally, health programs at the national level plan their activities without knowing the needs at the provincial level. Since provinces need the central level to finance the most expensive resources such as drugs or information, education and communication materials, the lack of coordination results in a deficient implementation of program activities. In some provinces the only public health activities are those receiving support from international partners.

205. The National Assembly exerts limited oversight on the budget. When the 2006 budget proposal was submitted by the government, deputies only scrutinized some visible aspects such as the proportion of health spending in the total budget or expenditures for endemic disease control programs. To reinforce its role as controller of government finances, the National Assembly should train deputies in budgetary analytical skills and use comparative data from countries in the region.

206. State financial management is characterized by a single account system with payments made through bank transfers between sub-accounts of the Single Treasury Account and suppliers. First, each BU submits a cash plan for the following quarter to the MOF and to the Provincial Directorate of Finance. Budget execution starts when BUs and DUs receive financial quotas (FQs), i.e. the financial limit they must execute during a certain period, generally a month. At that point, units verify whether the expenditure to be made is covered in the budget and available at that moment. This allows them to start issuing cash drawing orders as payment documents to suppliers. Since 2004, in some provinces with access to the internet state budget execution is made on-line. Purchases using state funds can only be made from licensed suppliers with a taxpayer card and, in some provinces, following public tenders at the provincial level. All informal suppliers are excluded from the process.

207. In practice, managers do not consider that the budget is a rigorous exercise that serves to plan activities for the year. They perceive that another planning exercise must be undertaken when FQs are received. At the beginning of the execution process, a micro-planning exercise is carried out to decide the activities to be financed with the financial quota for each period, generally on a monthly basis.

Table 3.3: Budget execution rate for goods and services in municipal,

provincial and national nospitals							
	2002	2003	2004	2005			
Municipal (DU) ^a	78%	77%	33%	82%			
Provincial (BU)	88%	76%	59%	90%			
National (BU)	93%	91%	83%	95%			

Source: Ministry of Health.

208. There are significant differences between budget execution rates at the central, provincial, and municipal levels (see Table 3.3). One of the determining factors seems to be the financial decentralization statute. The execution rate for goods and services is significantly higher for national and provincial hospitals than for municipal hospitals. This can result from the financial limits, which are lower in municipal hospitals and from the execution periods, which are substantially longer at this level. This is because municipal hospitals depend on the budgetary unit "provincial government". For example, the dependent units of the municipality of Andulo, in Bié, may need up to one month to make a payment because it must be authorized by four institutions: the health unit, the municipal administration, the PHD, and the provincial government. According to the technical staff of the MOH, the same procedure takes only 2-3 days at the

central level.

Table 3. 4: Budget execution rate by economic category

			v			
	2000	2001	2002	2003	2004	2005
Personnel	79 %	80 %	88 %	73 %	62 %	69 %
Goods and services	55 %	70 %	86 %	81 %	71 %	88 %
Transfers	79 %	89 %	92 %	90 %		
Investment	74 %	68 %	87 %	59 %	46 %	43 %
Total budget	70 %	76 %	87 %	75 %	62 %	67 %

Source: Ministry of Finance.

209. Table 3.4 presents the execution rate for different economic categories between 2002 and 2005. Until 2002, the execution rate for personnel was higher than for goods and services, but since 2003, it has been systematically lower. This may be the result of generous provisions made by the state budget for personnel, foreseeing an immediate introduction of new staff or a generalized salary increase. Another possibility is inadequate planning. Although the MOF provides a large volume of resources for personnel, the determinants of payment are the wage sheets controlled by the Ministry of Public Administration, Employment and Social Security (MPA). This problem can be easily solved through a better coordination of data between the MPA and the MOF.

210. The budget execution rate for investment is lower than for other categories, and it has decreased over the last three years. A factor that can explain this trend is the allocation in just one year of the whole amount for some investments that need to be executed over several years.

211. Managers do not have the appropriate academic level and profile. Many health units are led by paramedical staff with no basic accounting skills. Weaknesses at both hospital and peripheral levels are shown by the difficulty in gathering basic statistical data. There is a lack of management instruments such as accounting programs, budget classifiers, and guidelines. Materials for the training of managers are imported and not adapted to the day-to-day situation in Angola.

212. The responsibility for the financial management of investments rests with the MOF, which deals with the BUs, i.e. the MOH and the provincial governments. The MOF negotiates and manages external funding for investments. Given the enormous volume of resources from the new credit lines of the government, the MOH has created a Technical Support Office in charge of supervising investments made with external funding. The establishment of this office, which works closely with the MOH's Planning Department, has improved government capacity, but the technical ability to manage investments remains

weak.

213. Financial management procedures and instruments have been developed, but less has been done regarding tools for accounting and monitoring and evaluation. Much attention is given to the publication of budgets approved by the National Assembly. However, information about budget revision and execution is not taken as seriously and it is not well publicized. The main accounting instruments are produced by SIGFE, but they do not allow for an adequate monitoring of the health sector. This results from the fact that the economic category classifier is common for all sectors. Categories are too broad and do not attend to the particular needs of a sector.

214. The Health Information System (HIS) was not designed to interface with SIGFE or SINGERH (the MPA data base for the management of public employees), and there is not much rigor in expenditure classification. It is common practice to use the "other services" category for the purchase of all kinds of goods. This makes it impossible to monitor the performance of the sector on a regular basis, and as a result, when an analysis of the sector is necessary, special studies need to be conducted. Although the Tribunal of Accounts has begun to play a disciplinary role in the management of public funds, irregularities are common, notably in public tenders.

Example 31. Institutional framework

Source: People's Democratic Republic of Algeria. A Public Expenditure Review 2007. Assuring High Quality Public Investment, Vol. 1, Report No. 36270–DZ.

C. INSTITUTIONAL FRAMEWORK AND SECTOR STRATEGY

The present institutional framework does not allow a good management of the health system.

8.18 The lack of coordination among central government services affects system management. Several ministries run the health care system. Chief among these are the Ministry of Health, which provides overall guidance and management for the system; the Ministry of Labor and Social Security, which takes care of the Caisses d'Assurance Maladie; the Ministry of Finance which, together with the Ministry of Health, negotiates public sector health budgeting; and the Ministry of Higher Education, which is primarily responsible for the

training of physicians. For the system to function properly, these institutions must satisfactorily cooperate. In fact, interministerial cooperation is very limited. In addition, the relationship between the Ministry of Health and the Ministry of Labor and Social Security is particularly strained, in part because of the unresolved issue of how to share the operational expenses of public health

facilities. The Ministry of Higher Education establishes the content of the teaching program at medical faculties—though with negligible input from the Ministry of Health, which in principle is best placed to assess training needs.

8.19 Coordination is also insufficient among the main ministerial departments. In the Ministry of Health, for example, the setting of public health priorities is not reconciled with the financial resources that are actually available. There is ample room for strengthening contacts and the sharing of information among institutions that are responsible for these matters.

8.20 Another source of difficulties is the separation between the bodies responsible for investment and those responsible for operations (recurrent) outlays in public health institutions. The Ministry of Health mirrors the institutional budget separation within the Ministry of Finance. Two separate sections of the budget office deal with capital and recurrent expenditures respectively. Similarly, budget negotiations over investments and recurrent credits take place separately. Often, the recurrent charges necessary to keep an investment project running smoothly are not provided for during the fiscal year in which the investment component is completed, with negative consequences for the utilization of the new health centers or facilities financed. Moreover, there is no sector specialization within the Ministry of Finance. Each investment and recurrent expenditure officer monitors a large number of health districts, but covers only a portion of each. Officers thus have little detailed familiarity with the great number of files for which they are responsible.

8.21 Current efforts by the Ministry of Finance to develop program budgeting and budgeting-by-objectives may help to improve coordination. Efficient system management is undermined by institutional fragmentation

8.22 The lack of a strong local player harms the management of the system (see Annex T). Algeria has five health regions (Center, East, West, Southeast, and Southwest). Each has had a Regional Health Council since 1997. These bodies represent the principal stakeholders in the system—the state, the social security funds, physicians, associations, and so forth. The health councils are supposed to coordinate activities and promote consensus-building in the field. In practice however, their role is essentially advisory; and their operational responsibilities are limited. Each of the 48 wilayas has a Direction de la santé et de la population (DSP) representing the Ministry of Health at the deconcentrated level. The Decree of July 14, 1997, governs their organization and operations and gives them a broad mandate—planning and coordination of public health activities, prioritization of health care, distribution of funding among health institutions;

evaluation and supervision of their activities; monitoring of investments; and training programs among others. In reality, they have sufficient resources neither to properly carry out these tasks nor to serve as an effective interface with the Ministry of Health at the local level. Moreover, the wilaya health authorities do not have the critical reach to deal with the broader challenges related to geographical distribution and coordination among health care providers.

8.23 Decentralization of the health system is very limited. As a result, the central government is not able to fulfill what should be its key role, overall stewardship for the system.

8.24 The management of hospitals is excessively rigid. Hospitals belong to the category of public institutions called établissements publics administratifs (EPA). The EPAs operate along the lines of a traditional state bureaucracy, applying standard rules of public accounting and public service statutes for personnel management. When it comes to budgeting, managers have next to no autonomy. In the case of recurrent expenditures, for example, a hospital manager who wants to transfer funds from one budget category to another must obtain central approval through a ministerial order. In the case of personnel expenditure, modifications cannot be made at all.

8.25 Relations are unsatisfactory between hospitals and the central government. Because of the public administrative status of hospitals, managers can be subject to suffocating oversight. Numerous controls a priori limit a manager's capacity to take initiative. At the same time, the government has set no precise objectives to guide actions. There are no contractual arrangements between the DSPs (or the Ministry of Health) and the hospitals that might otherwise help to define expected outcomes and ensure the minimum resources (inputs) necessary for achieving them. Finally, the activities and performance of hospitals is subject to no evaluation whatsoever.

8.26 The budgetary process does not respond to a strategic orientation. As a consequence of institutional segmentation, the recurrent budget is prepared in an inertial way. It has little to do with a hospital's real needs.

- Hospitals receive very little guidance from the DSPs or the central government in preparing their budget forecasts. There are no indications concerning the pace of expenditure increases, priority activities, and so forth.
- Hospital budgets are essentially based on the previous year with a small increase.
- DSPs receive the hospital budget requests and transmit them to the Ministry

- of Health without major amendments.
- The Ministry of Health negotiates with the Ministry of Finance based on these budget proposals.

8.27 For the investment budget, a distinction must be made between centrally managed and decentralized investment projects. Only investments relating to the centres hospitalo-universitaires (CHU) and certain specialized hospital facilities are managed at the central level. For this type of investments, the decisionmaking process is relatively simple: The Ministry of Health selects the projects that it likes based on available information and its own priorities. Common issues in the management of these investments are not related to the budget procedure, so much as to other factors—gaps in the health map, lack of accurate information on institutional performance, or simply capacity in project preparation. On the contrary, at the deconcentrated level (DSP and wilayas), there are different kinds of inadequacies in the budgeting procedures for investments. For example:

- Hospitals submit their needs to the DSP and the wali. The wali makes the
 decision, with the DSP consigned to the role of technical advisor. Not
 surprisingly, projects that are selected are often shaped as much by the
 local political context as by technical considerations.
- After reaching the Ministry of Health, the proposed investment project is merely transmitted to the Ministry of Finance.
- Investment appropriations are allocated to the wilayas in lump sums.

Example 32. Recommendations for reform

Source: Albania. A Public Expenditure and Institutional Review 2006, Vol. 2, Report No. 36453–AL.

G. CONCLUSION AND RECOMMENDATIONS

7.44 Albania's health financing system is afflicted by several key shortcomings. Among them are: (i) the high share of out of pocket payments for health care and the ensuing failure of the health finance system's ability to protect low income groups from health induced poverty shocks, (ii) regional inequities in resource allocation, (iii) fragmentation in public sector financing with ensuing in inefficiencies, lack of accountability and uncertainties,. (iv) limited Government ability to properly exercise its sectoral stewardship function due to the high share of out-of-pocket spending outside an overall financing framework, (iv) and a provider payment system which fails to harbor incentives to improve efficiency and accountability for performance.

7.45 At the same time, there are indications that Albania is beginning to face

some of the same health sector expenditure pressures that have been widely observed in more developed health systems, including the recent EU accession countries. Aside from the already witnessed rapid increase in expenditures on prescription drugs, the maintenance of a sub-optimal hospital infrastructure, proliferation of costly medical technology, the increasing incidence of non-communicable diseases and growing health personnel salary pressures156 are likely to place a greater burden on the fiscal sustainability of Albania's health system in the coming years. Countering these pressures, while also ensuring adequate protection of the population from impoverishing effects of health expenditures will require fundamental changes in the way health care is produced, financed, delivered, organized and managed.

7.46 Recommended priority actions pertaining to the health financing system are listed below. It must be noted that these actions constitute fundamental changes to the health finance system that should be gradually introduced over the coming three to five years. It is important that all areas of the health finance system, including resource mobilization, resource allocation and the provider payment system be changed in a synchronized fashion.

Resource Mobilization

- Eliminate the payroll tax based health insurance contribution and replace it with general taxation.
- Define the package of services which will be provided with public funds and formalize out-of-pocket payments for services by expanding co-payments to a wider range of services, including in-patient care.
- Establish a system of lower co-payments and concurrent higher budgetary payments for

clearly defined low income target groups.

• Combine the introduction of broader co-payments with aggressive efforts to root out informal payments. Allow providers to keep a substantially larger share of collected user fees under well defined conditions.

Resource Utilization

- Increase resource allocated to public health, including health promotion, health information and preventive care in view of reducing high cost diseases
- Develop a master plan for the hospital sector and regional primary health care plans as a basis of decision making for further capital investments, and base investment decisions on a through analysis of the current and expected utilization of facilities and aspired efficiency improvements.

Changing the Provider Payments System

- Eliminate the fragmentation of health care financing and separate financing from the procision of health care, by channeling all public sector resources for health care through one financing agency (HII) which will pool these funds, allocate them and act as an agent to purchase a well defined package of health care services on behalf of the population from health care providers
- Change the provider payment system from an input-based system to an output and performance-based system, and gradually grant health care providers increased autonomy over resource use. Introduce this change gradually, by first concentrating on direct contracting of primary care providers, then expanding to hospital care.
- Revise the reimbursement policy for prescription drugs, maintain the recently introduced copayment for all HII beneficiaries and tightening the positive list of reimbursable drugs. Limit reimbursement to the price of the lowest available alternative among therapeutic groups with similar molecules or therapeutic principles. Further revise whole and retail margins for drugs, by either making them more degressive or paying pharmacies a flat fee per prescription.

Example 33. Priorities and Recommendations

Source: Mauritania Focusing Public Expenditure on Growth and Poverty Reduction. Public Expenditure Review 2004, Report No. 29167-MAU.

Policy Priorities

- 4.35 Based on the analysis presented, the strategy of fight against poverty in the health sector should focus around three main axes: (i) Improve health outcomes for the poor; (ii) Secure sustainable health financing and limit the impact of health expenditure on the revenues of poor households; and (iii) strengthen health sector management and governance.
- 4.36 Improve Health Outcomes for the poor. Scale up priority interventions and make them accessible to the poor. The still relatively high levels of infant and child mortality and maternal mortality underline the importance of paying attention to preventing and curing infectious diseases, often the main cause of mortality. Taking into account the main risk factors, improvement of health indicators calls for the provision at facilities level of an integrative package for transmittable diseases, child and maternal health and nutrition. Efforts to improve child and maternal health outcomes should go beyond the health sector and be supported through cross-sectoral interventions that include improvements in access to clean water and in mother's education, improvements of family food intake and change in breastfeeding practices. A new emphasis should be put on

IEC and social mobilization involving other sectors, particularly local authorities and effective inter-sectoral coordination mechanisms at various levels.

4.37 Improve health care utilization by the poor and vulnerable group. Paying special attention to gender issues, behaviour change, communication and social marketing can boost the demand for services. Improve Access to Health Service. To ensure access to the integrative package of health services referred to above, there is a need to pursue the development of PHC network based upon a revised infrastructure development plan targeted on rural and underserved areas. The aim is to ensure, before 2010, that 90 percent of the population has access to well functioning health structures (basic services) within 5km from the domicile. Community outreach services should be also expended.

4.38 Improve the Quality of Health Care:

- (i) Improve the availability, management and motivation of health personnel is needed. Equity in the distribution of health staff and their efficiency will set the pace for scaling up of interventions and pave the way for the achievement of the MDGs. This implies improving the Human Resource Directorate; adopting the staffing norms for all levels of care; better targeting deployment of staff to critical geographical areas coupled with decentralization of personnel administration and management to regional levels; designing a more attractive package of incentives with the full involvement of local authorities and communities; and relying more on private providers particularly in urban areas. The quality and relevance of the medical education also need to be improved. There is a need to decentralize nurse schools and involve local government in their management and the selection of the students.
- (ii) Increase the availability, quality and affordability of essential drugs and consumables. The Government is updating its pharmaceutical policy and will set up drug registration mechanisms and a quality control system. The CAMEC and regional pharmaceutical stores (DPR) will be restructures.
- (iii) Improve the Management of health service provision. The referral system should be made operational between PHC facilities and hospitals. To consolidate the results achieved so far it is necessary to: adopting the hospital reform policy; improve the management of hospitals; win the loyalty of specialized staff moved to regional hospitals (surgeons, obstetricians, specialized nurses, etc.); establish quality monitoring activities; and improve maintenance of equipment. All hospitals, especially at tertiary level, should draft a medium to long-term improvement plan for both their management and quality of care provided to users. The Government should also develop with health facilities managers

performance-based contracts devised as a means of holding them to outputs and to apply rewards and sanctions. Measures should be taken aiming at increasing involvement of the users of services in the management of health facilities. Supervision activities must be intensified.

- (iv) Promote maintenance activities. There is a need to design a long-term maintenance strategy. A feasibility study should be carried-out by 2005 to establish agency. All health facilities should be provided with funds for maintenance. Procurement documents should be improved allowing for standardization of equipment, for after-sales services and training of users.
- 4.39 Secure Sustainable Financing and Limit the Impact of Health Expenditures on the Revenues of the Poor. Maintain a balance recurrent and investment expenditures. In order to ensure long-term sustainability, reviewing the recurrent cost implications of all proposed investments should be enforced. Redirect health spending towards under served areas. More effort remains to be done, to better redirect MSAS recurrent expenditures toward the regions with the highest incidence of poverty.
- 4.40 Speed up ongoing reforms of the cost recovery system and promote risk-sharing mechanisms. The process should be speeded up ensuring that some medications and consumable supplies will be free of charge (tuberculosis drugs, vaccines, vitamin A, etc.), or delivered at a reduced price (impregnated mosquito nets; services for children under five and pregnant women). A harmonized tariff system for drugs and cost recovery for health services should be applied and a special fund should be established (from government and local communities budgets and from cost recovery proceeds) for covering the costs of specific health services and/or of indigents. Additionally, pilot experiments being conducted in Nouakchott (obstetric flat fee) and in the two Hodhs (indigence project) to convert cost recovery for services into pre-payment arrangements, should be scaled up in order to reduce the impact of health expenditure on the poorest. The tracking of cost recovery funds should be made regularly available.
- 4.41 Setting up a Financing Strategy. The government should design a financing strategy responding to the following characteristics: global, realistic, rigorous and flexible. There is also a need to assess the contributions of all stakeholders in the financing of the health sector and to systematize the elaboration of PER, benefit incidence studies and public expenditures tracking surveys. The institutional framework of the financing strategy should be strengthened and the "Direction des Affaires Sociales" should be entitled to follow up on all health financing issues including cost recovery now embedded in the "Direction de la Protection

Sanitaire". Improving budget management procedures and capacity. See Chapter 3 above.

4.42 **Strengthen Sector Management and Governance**. Strengthen sector management and administrative capacity. An assessment of the organizational structure of the MSAS is underway. Its results will serve to restructure the ministry and its decentralized units. The MSAS should improve accountability among its staff and managers by extending to all levels result-based management system to promote a culture of result and increase efficiency and equity in the sector spending. The financial management system should be strengthened at central level and in DRPSS, CSM and hospitals. Capacity for data collection, analysis and dissemination should continue to improve by strengthening the information system.

4.43 Increase decentralization. The decentralization process is just starting. Strengthening of capacity in the "Directions régionales" and in the "Circonscription sanitaires des moughatas" must be considered as pre requisite for the successful implementation of sector reforms especially the implementation of the result-based management. The links between the central level and the decentralized levels should be clarified in order to avoid duplication of responsibilities. The government should speed up the reorientation of community participation in order to increase the participation of local communities in the management of health services and protect the access of the poor by adopting regulation that defines mandate and composition of community health committees.

4.44 Modernize the Regulation of the Private Sector. Given the deep involvement of public health workers in private practices, the low quality of the services provided by the private sector and its outdated regulation, and the volume of private health spending, regulation and enforcement of quality and standards have become essential to ensure the effectiveness of private spending. Contracts to regulate the collaboration between the public and the notfor- profit private sector have to be developed and the involvement of the private for-profit health sector to be increased.



Suggested PERs

World Bank. 2007. People's Democratic Republic of Algeria. A Public Expenditure Review. Assuring High Quality Public Investment, Report No. 36270– DZ, Vol. 1 and Vol. 2.

World Bank. 2007. "Indonesia Public Expenditure Review. Spending for Development. Making the Most of Indonesia's New Opportunities." Report No. 38772.

World Bank. 2006. Albania Public Expenditure and Institutional Review, Report No. 36453– AL, Vol. 2.

World Bank. 2005. Guatemala Public Expenditure Review, Report No. 32376.

World Bank. 2001. Zambia Public Expenditure Review—Public Expenditure, Growth and Poverty: A Synthesis, Report 22543-ZA.

References

Castro-Leal, Florencia. 1999. "The Impact of Public Health Spending on Poverty and Inequality in South Africa." Country Department I, Africa Region. Washington, DC: World Bank.

FUNSALUD / SIDALAC. 2001. *Technical Handbook for Estimating the National Accounts on HIV/AIDS.* México DF, Fundación Mexicana para la Salud / Regional AIDS Initiative for Latin America and the Caribbean.

Gottret, Pablo, George J. Schieber, and Hugh R. Waters (Eds.) .2008. *Good Practices in Health Financing. Lessons from Reforms in Low- and Middle-Income Countries.* World Bank. Washington, DC: World Bank.

Gottret, Pablo and George Shieber. 2006. *Health Financing Revisited. A Practioner's Guide.* Washington, DC: World Bank.

La Forgia, Gerard M. and Bernard F. Couttolenc. 2008. *Hospital Performance in Brazil: The Search for Excellence*. Washington, DC: World Bank.

Lewis, Maureen, A. and Gunilla Pettersson (2009) "Governance in Health Care Delivery: Measuring Performance", Draft. Washington, DC: World Bank.

Lindelöw, Magnus and Adam Wagstaff. 2005. "Health Shocks in China: Are the Poor and Uninsured Less Protected?" World Bank Policy Research Working Paper 3740. Washington, DC: World Bank.

O'Donnell, Owen, Eddy van Doorslaer, Adam Wagstaff, and Magnus Lindelöw (2007) *Analyzing Health Equity Using Household Survey Data. A Guide to Techniques and Their Implementation*. Washington, DC: World Bank.

Picazo, Oscar F. 2002. "Better Health Outcomes from Limited Resources: Focusing on Priority Services in Malawi." Africa Region Human Development Working Paper. Washington, DC: World Bank.

Poullier, J.P., P. Hernandez and K. Kawabata. 2002. "National Health Accounts: Concepts, Data Sources, and Methodology." Evidence and Information for Policy Cluster Discussion Paper WHO/EIP/02.47. Geneva: World Health Organisation.

Pradhan, Sanjay. 1996. "Evaluating Public Spending," Discussion Paper 323. Washington, DC: World Bank.

Savedoff, William, D. 2008. "Public Expenditure Tracking Surveys: Planning, Implementation and Uses", Draft. Washington, DC: World Bank.

Swamy, Gurushri and Richard Ketley. 1999. "Review of Public Expenditures: Efficiency and

Poverty Focus." Washington, DC: World Bank.

van de Walle, Dominique and Kimberly Nead, eds. 1995. *Public Spending and the Poor.* Baltimore: Johns Hopkins University Press.

van Doorslaer, Eddy, Owen O'Donnell, Ravindra P. Rannan-Eliya, Aparnaa Somanathan, Shiva Raj Adhikari, Charu C. Garg, Deni Harbianto, Alejandro N. Herrin, Mohammed Nazmul Huq, Shamsia Ibragimova, Anup Karan, Tae-Jin Lee, Gabriel M. Leung, Jui-Fen Rachel Lu, Chiu Wan Ng, Badri Raj Pande, Rachel Racelis, Sihai Tao, Keith Tin, Kanjana Tisayaticom, Laksono Trisnantoro, Chitpranee Vasavid, Yuxin Zhao. 2007. "Catastrophic Payments for Health Care in Asia." *Health Economics* 16(11): 1159-84.

Wane, Waly and Gauthier, Bernard. 2007. "Leakage of Public Resources in the Health Sector: An Empirical Investigation of Chad." World Bank Policy Research Working Paper 4351. Washington, DC: World Bank.

Wagstaff, Adam. 2007. "The Economic Consequences of Health Shocks: Evidence from Vietnam." *Journal of Health Economics* 26: 82–100.

WHO. 2008. *Guide to Producing Regional Health Accounts Within the National Health Accounts Framework*. Geneva: World Health Organization.

WHO. 2003. *Guide to Producing National Health Accounts With Special Applications for Low-Income and Middle-Income Countries*. Geneva: World Health Organization.

World Bank. 2009. "Mongolia. Consolidating the Gains, Managing Booms and Busts, and Moving to Better Service Delivery. A Public Expenditure and Financial Management Review. Vol. 1, Report No. 43353-MN. Washington, DC: World Bank.

World Bank. 2008. "FYR Macedonia Public Expenditure Review." Report No. 42155-MK. Washington, DC: World Bank.

World Bank. 2008. "Slovak Republic Public Expenditure Review." Background Papers. Washington, DC: World Bank.

World Bank. 2007. "Angola Public Expenditure Review." Report No. 39710-AO. Washington, DC: World Bank.

World Bank. 2007. "People's Democratic Republic of Algeria. A Public Expenditure Review. Assuring High Quality Public Investment, Report No. 36270– DZ. Washington, DC: World Bank.

World Bank. 2007. "Benin Enhancing the Effectiveness of Public Spending. A Review of Three Sectors." Report No. 29656-BEN. Washington, DC: World Bank.

World Bank. 2007. "Brazil. Governance in Brazil's Unified Health System (SUS). Raising the Quality of Public Spending and Resource Management." Brazil Country Management Unit, Human Development Sector Management Unit, Poverty Reduction and Economic Management Unit, Latin American and the Caribbean Region, World Bank, Washington, D.C.

World Bank. 2007. "Honduras Public Expenditure Review." Report No. 39251-HO. Washington, DC: World Bank.

World Bank. 2007. "Indonesia Public Expenditure Review. Spending for Development. Making the Most of Indonesia's New Opportunities." Report No. 38772. Washington, DC: World Bank.

World Bank. 2007. "Eritrea Public Expenditure Review." Report No. AAA22-ER. Washington, DC: World Bank.

World Bank. 2007. "Lao PDR Public Expenditure Review and Fiduciary Assessment." Report No 39791-LA. Washington, DC: World Bank.

World Bank. 2007. 'Republic of Moldova Improving Public Expenditure Efficiency for Growth and Poverty Reduction. Public Expenditure Review." Report No. 37933-MD. Washington, DC: World Bank.

World Bank. 2006. "Albania Public Expenditure and Institutional Review." Report No. 36453–AL. Washington, DC: World Bank.

World Bank. 2006. "Kosovo Public Expenditure Review." Report No. 32624-XK. Washington, DC: World Bank.

World Bank. 2005. "Ethiopia. A Country Status Report on Health and Poverty." Vol. 2, Main Report. World Bank, DC: World Bank.

World Bank. 2005. "Georgia Public Expenditure Review." Report No. 22913-GE. Washington, DC: World Bank.

World Bank. 2005. "Guatemala Public Expenditure Review." Report No. 32376. Washington, DC: World Bank.

World Bank. 2005. "Uzbekistan Public Expenditure Review." Report No. 31014-UZ. Washington, DC: World Bank.

World Bank. 2004. "Mauritania Focusing Public Expenditure on Growth and Poverty Reduction. Public Expenditure Review." Report No. 29167-MAU. Washington, DC: World Bank

World Bank. 2004. "Niger Public Expenditure and Financial Management Review." Report No. 29752-NE. World Bank, DC: World Bank.

World Bank. 2003. "Poland: Towards Fiscal Stability and Growth—A Public Expenditure and Institutional Review." Report 25033-POL, ND. World Bank, DC: World Bank.

World Bank. 2003. "Cambodia: Enhancing Service Delivery through Improved Resource Allocation and Institutional Reform, Integrated Fiduciary Assessment and Public Expenditure Review." Report 25611-KH. World Bank, DC: World Bank.

World Bank. 2003. "The Republic of Uganda Public Expenditure Review 2003: Supporting Budget Reforms at the Central and Local Government Levels." Report 27135-UG. World Bank, DC: World Bank.

World Bank. 2003. "United Republic of Tanzania Public Expenditure Review FY03: Managing Public Expenditures for Poverty Reduction—Report on Fiscal Developments and Public Expenditure Management Issues." Report 26807 -TA. World Bank, DC: World Bank.

World Bank. 2003. "Decentralizing Indonesia: A Regional Public Expenditure Review, Overview Report." Report 26191-IND. World Bank, DC: World Bank.

World Bank. 2003. "Mexico State-Level Public Expenditure Review: The Case of Veracruz-Llave." Report 25162-ME. World Bank, DC: World Bank.

World Bank. 2002. "Maldives Public Expenditure Review." Report No. 24238-MV. Washington, DC: World Bank.

World Bank. 2001. "Turkey Public Expenditure and Institutional Review: Reforming Budgetary Institutions for Effective Government." Report No. 22530-TU. Washington, DC: World Bank.

World Bank. 1998. "The Impact of Public Expenditure Reviews: An Evaluation." Report 18573. Washington, DC: World Bank, DC: World Bank.

Specific Guidance for

SOCIAL PROTECTION



Preparing PERs



for Human



Development



Preface

These tools for analyzing public expenditures in HD sectors are part of a larger process to improve the treatment of human development issues in PRSCs, PERs, development policy lending and other cross-sectoral or macroeonomic analyses. The specific goal of these interlinked PER guidance notes is to support and spark the imagination of people tasked with analyzing expenditures in HD sectors—to help them learn from better than average examples and to make it easier to use the many resources already available.

The revision of the PER guidance was initiated by Maureen Lewis when she was Interim Chief Economist HD. Gunilla Pettersson undertook the update of the PER guidance. Many thanks to the following people for providing insight into the PER process and useful comments on how to improve the existing guidance: Cristian Aedo, Christian Bodewig, Jim Brumby, Pablo Gottret, Margaret Grosh, Robin Horn, Harry Patrinos, Christine Lao Pena, Stephane Legros, Maureen Lewis, Mattias Lundberg, Cem Mete, Montserrat Pallares-Miralles, Suhas Parandekar, Emilio Porta, Pia Schneider, Lars Sondergaard, Emil Tesliuc, and Erwin Tiongson.

The original PER guidance was launched in 2004 and led by Maureen Lewis, managed by Sue Berryman and carried out by Dina Abu-Ghaida and Sue Berryman (education), Dov Chernichovsky and Mattias Lundberg (health) and Margaret Grosh (social protection).

User's Guide









Checklist

It is important that this Social Protection Guidance checklist be used in conjunction with the Core Guidance checklist. The latter checklist addresses crosscutting issues, such as data sources and the selection and judicious interpretation of comparative data.

The guidance note given here is not to be taken as a minimum list where the authors must tick every sub-box. Every PER must be selective in what it covers, with the selection of topics based on many factors—what is needed to underpin the country dialogue, what is already known and packaged elsewhere, what is manageable to do given constraints on time, data and funding, etc. This guidance note is meant to remind the analyst of the main features that might normally be included in the social protection chapter of a PER. Omissions will often be made, but with some justification in mind. In addition to agreeing in the concept note on the planned coverage of topics, it may be useful to convey to the reader of the full report the reasons for omissions of major themes. Similarly the depth of treatment and number of programs covered in depth will need to be considered, agreed and explained.

Note also that the guidance note is organized as a checklist rather than an outline or table of contents. While a report might be organized along these lines, there are many other outlines that could be effective. One option might be to work around the core PER questions of: Where does the money come from? Where does the money go? What does it buy? How could spending be improved? Another outline might be to present first the situation with all basic analyses, followed in a second section by a discussion of issues and in a third section by options for reform.

Notes

In many places in the checklist the symbol **Note** appears. The text of all the notes follows the checklist itself. Some are short texts that explain further what is meant in the checklist. Often the notes contain references to methodological material or to sources from which international comparators may be drawn.

Examples

In many places in the checklist the symbol **Example** appears. The text of the examples follows the text of the notes. The examples are excerpts of a page, table

or series of pages meant to show at least one interesting case of application of the themes contained in the checklist. In addition to using the varied examples that form some sort of composite "model" PER chapter, it may be useful to the task team to look at a few actual PERs, though of course no single report is exemplary in all ways.

Bibliography

Short references are given in the individual notes and examples. Full references are contained in the unified bibliography. For the majority of documents contained in the bibliography, materials are available via the World Bank website or the internet.



Suggested content for full-scale social protection PERs

Part 1. Sectorwide View

This part of the report would discuss the overall composition of social protection expenditures and address whether the mix of programs and their size is adequate or sensible, given the constraints. It would normally include:



1. Very brief synopsis of poverty, risk and vulnerability



- Poverty headcount, gap, trends.
- Household-level movements in and out of poverty, if known.
- · Sources of risk and vulnerability.
- Pertinent disaggregation of above by region, rural versus urban environment, age, gender, occupation, ethnicity and so on.

2. Overview of budget allocation, trends and processes



- Listing of the main public programs in the country—contributory pensions, noncontributory pensions, unemployment insurance and assistance or active labor market policies, social assistance, other safety nets and so on.
- Description as pertinent of nongovernment programs—private pensions, large NGO programs, unusually large international remittances or local interhousehold transfers
- Public expenditure by program and sector "total" as a share of GDP and total public expenditures—and in absolute values.

• Intergovernmental financing arrangements, including definition and operation of any subvention mechanisms.



- Trend information to show whether program expenditures are countercyclical and whether the balance between programs is changing over time.
- Issues of budget formulation, execution and audit and the incentives conveyed therein that affect the sector or its subsectors.

3. Judgments

- Does the program mix have an appropriate blend of social insurance and social assistance? Of coverage in the formal and informal sectors?
- Is the mix of public and private programs suitable?
- Does the program mix provide an adequate balance of efforts to assist the chronic poor, the transitory poor and special groups who may need aid even if overall poverty is low?
- Given the risk profile, are there big gaps in areas of intervention? Or significant overlap, duplication and fragmentation?
- Is the overall level of effort sensible? Too high? Too low?



4. Recommendations

- · What areas for reform emerge from the analysis?
- Given financial, capacity and political economy constraints, what is a sensible program of action? In the short, medium or long term?



Part 2. Analysis of Individual Programs

For a selection of the most important programs, the PER should assess how well they are working and give guidance on any necessary or contemplated reforms. Such analysis should usually cover elements in each of the following areas:

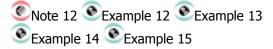


5. Adequacy

 Coverage (may be disaggregated as is pertinent by rural and urban distribution, state, age, gender, formal/informal sector and so on; may include demographic projections for pensions).



 Adequacy of benefit level (benchmarks will vary by program, for example, average pensions could be compared with average wages, the social pension with the poverty line, unemployment insurance with average wages, unemployment assistance with both average wages and the poverty line, social assistance with the poverty line, wages on public works jobs with the market wage for similar work and so on).



6. Equity



- Incidence of benefits received and participation rates and exclusion should always be presented by welfare group (such as consumption quintile) when available.
- Where poverty profiles or program goals indicate or full distributional information is not available, it may be useful to present breakdowns by other pertinent groups (age or gender; urban and rural distribution; covered and uncovered sectors).
- Where pertinent, contrast the incidence of participation and of payments made where benefits are not uniform.
- For pensions, consideration of intergenerational equity and intra-generational equity among participants of different schemes or contribution cohorts should

be addressed



 Where contributions feature, address to the extent possible the incidence of contributions as well of payments.



7. Efficiency

The specific indicators will vary greatly by program—here only a few examples are provided.



- Does program design conform to good international practice? Are relevant parameters in line with benchmarks or international comparators?
- Is the level of administrative costs appropriate (high enough to allow adequate administration, low enough to be efficient)?



 Does the intended budget reach the beneficiaries or are there indications of resources being siphoned off for unintended or illegal uses?



Note 16 Example 19 Example 20 Example 21

- For pensions, what are the procedures for collecting a pension and how long does it take? What are the collection rates for contributions, if they exist?
- What are unit costs? For example, for public works, what is the share of unskilled labor in total costs? For food programs, what is the cost per calorie provided? For training programs, what is the cost per trainee? How do unit costs compare with appropriate local benchmarks or good international practice?

• Does the program have significant effects on labor markets? For example, to what degree do contributions rates for pensions discourage employment in the formal sector? Does the program discourage early withdrawal from the labor force? To what degree do the levels or length of benefit for unemployment programs discourage job search? To what degree do social assistance benefits discourage work effort?

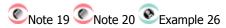


8. Contribution to risk management



 Does the program improve the ability of the household to manage risks by reducing the probability of a shock? Or by providing an income support through insurance payments (risk mitigation) or transfers (risk coping) if it does?

9. Delivery mechanisms



- What are the administrative structures involved? (Governmental agencies and any involvement by the private sector, NGOs or community groups; levels of government—national, state and local; or among different agencies of government.)
- How is the targeting mechanism implemented? How is the delivery of benefits implemented? What are the enforcement mechanisms for collecting contributions in contributory systems?
- Are resources and systems adequate?
- Are incentives appropriate?
- · Are there issues of coordination or overlap between agencies?
- Are there adequate systems for participation, voice and redress?

10. Sustainability

• Is the burden on the budget sustainable? How do any foreseeable trends due to changes in poverty levels or fiscal status affect the answer?



 For pensions systems the answer should be based on actuarial analysis and include treatment of any contingent liabilities from publicly mandated private schemes.



11. Impact



 Any information on relevant outcomes—on changes in poverty, employment, age at retirement, human capital outcomes and so on.

12. Recommendations



What areas for reform emerge from the analysis?

- Given the financial, capacity and political economy constraints, what is a sensible program of action?
- Does the reform program require significant transitional resources of any kind? How are they to be provided?



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Note 1. Traits that distinguish high-quality reports

Irrespective of the specific content, several traits distinguish high-quality reports.

1. Frequent use of pertinent benchmarks

Counterfactual as benchmark

How would an outcome (income, age at retirement, unemployment, poverty and so on) differ without the program?

Choice of comparators

The Armenia report uses OECD, CIS and lower middle-income country averages to creatively show how the country compares with what it aspires to and where it has come from. In contrast, the Nicaragua report uses LAC averages, but given how much poorer the country is than the average LAC country, these aren't obviously sensible aspirations. The choice of comparators is both political and technical—the art is to choose from those countries comparable enough to make technical sense, with the subset politically palatable to the client country.

Choice of benchmark

Both share of GDP and absolute spending should be used to differentiate effort and outcome. Provide benchmarks not just for spending level, but for significant aspects of a program's structure and performance—main design parameters, distributional outcomes and so on.

Presentation of supporting evidence

Conclusions are most credible and palatable when the line of reasoning and evidence that supports them are included to a reasonable degree. While the total length of the report is something of a constraint, several reports reviewed erred on the side of presenting too little of the reasoning and evidence, leaving them unconvincing and preachy.

References to background papers, other analytical work on the country and academic literature can enrich the report and improve its credibility.

2. Good use of editorial devices

In addition to an executive summary, does the report uses other devices to good advantage? Examples include—abstracts for each chapter, within the chapters having the storyline highlighted in headers and bylines, having a summary matrix of recommendations, using of boxes well within the report, preparing crisp tables and so on.

3. Use of complementary data sources

Administrative data should help answer not just basic questions, such as coverage, but also those about many issues of efficiency. Household survey data are required to judge equity. Special surveys may be required to discern impact. Qualitative methods can gauge client satisfaction and cast light on program performance, obstacles and environment

Note 2. Sectorwide view

In many of the reviewed PERs the "Part 1 treatment" is missing. The Social Safety Net Assessments (SSNAs) done in LAC often do a much more comprehensive job of this and are a good source of inspiration, though the level of detail may be greater than can be incorporated in a PER chapter.

Note 3. Synopsis of poverty, risk and vulnerability

The poverty, risk and vulnerability information could be at the beginning of the social protection chapter, though it would be even better to have it as preface to the whole human development section or all sectoral chapters, since public actions in all sectors can help reduce poverty, risk and vulnerability.

The framework that underlies the analysis of sectoral or subsectoral allocation may be the social risk management framework (see Holzmann and Jorgensen 1999; Kozel, Fallavier, and Badiani 2008) and the social protection chapter in Honduras Public Expenditure Review 2007, Vol. 2, Report No. 39251-HO, or the WDR 2000/01 framework for poverty reduction, with the three pillars of opportunity, empowerment and security. The social risk management framework nests well under the security pillar. Sometimes the framework will correspond to one used by the country's government, as in its Poverty Reduction Strategy.

Table 2 in Kozel, Fallavier, and Badiani (2008) gives a useful overview of sources of information, best practice examples, and methods to assess risk and vulnerability. Another good guide to analyzing poverty, risk and vulnerability is Hoogeeven, Tesliuc, Vakis, and Dercon (2004) "A Guide to the Analysis of Risk, Vulnerability and Vulnerable Groups" available at http://go.worldbank.org/D13HO09YV0. Chapter 8 in Grosh, del Ninno, Tesliuc, and Ouerghi (2008) For Protection and Promotion: The Design and Implementation of Effective Social Safety Nets is a very useful resource available at http://go.worldbank.org/K0Z8SB4VJ0.

While social risk management has rarely been the analyzing framework for whole PERs, it has been for a number of reports done in the LAC region—on either the social protection sector as a whole or the social assistance subsector. The Chile report is a particularly good example of a standalone report and the

social protection chapter of the Guatemala Poverty Assessment, of how to nest the analysis in a larger report.

Note 4. Overview of budget allocation, trends and processes

Issues arise about where to draw the boundaries of the analysis for the social protection chapter of the public expenditure review. Holzmann and Jorgensen (1999), in the concept note that underlies the Bank's social protection strategy, put social risk management as the goal. They point out that mechanisms to manage risk are found outside the social protection sector and outside the public sector—and even within the social protection public sector the mechanisms go beyond expenditure. Thus a full analysis of social risk management will be much broader than the social protection chapter of a PER. Here are ways of resolving the contradiction.

Public expenditures important to risk management but outside the social protection sector, these can be treated in other chapters of the PER. The SRM framework can become the framework or a component of the framework for judging all of the sectoral and subsectoral allocations.

For the public-private boundary, understand that PERs, by definition, will not be able to fully cover private sector expenditures, though a full piece of sector work might. Even so the judgments about the adequacy of public expenditure must take into account what part of the problem these other actors have already covered or can or should cover. So at least some information on the size and shape of pertinent private expenditures should be referenced—for example, on remittances as background to the discussion of social assistance, and private savings or pensions in the section on social insurance.

Similarly, an expenditure review may not provide full treatment of regulation and other nonexpenditure means of influencing SP systems, but judgments about the adequacy of the expenditures must recognize the other tools and their uses—so, some minimal description of them may be included

A further data and boundary issue is that social protection activities are quite diverse and do not all fall within a single lead ministry. Budgets for safety-net programs are especially likely to be fragmented within the government bureaucracy, with pieces scattered through the ministries of social welfare, the family, health, education, food supply, agriculture and so on. Pension coverage and adequacy is a composite built from several programs—social pensions (provided as a noncontributory pension either to all elderly or to those in need), formal sector pensions for private sector workers, civil service pensions at the federal, state and municipal levels if disaggregated and other occupational

pension systems provided by companies or purchased by individuals. Some countries also include separate schemes for the self-employed, farmers, fishermen or other work categories. Teachers, police and military also often have separate schemes from other civil servants, with still more schemes for employees of parastatals. Analogous issues for labor and social care often apply (see Box).

Analysts thus have to start with their own list of what to look for and examine program level information from a number of agencies. Time, cost and data constraints may dictate that the treatment not be completely exhaustive. But it is important to understand the approximate range and dimensions of the whole picture. The detailed treatment of specific programs described in Part 2 of the checklist may be reserved for handful of big expenditure items, but it is important to gather enough information in Part 1 to get the big picture.

Eventually, the task team will have to decide where to discuss some programs. For example, should school feeding be covered in the education chapter or the social protection chapter? There is not t a single right answer, but if expenditures on school feeding are large, it is important to ensure that the program is covered in one place or the other. Indeed, some reference should probably be made to it in both chapters, on how it serves the respective sectoral goals.

In a PER the main treatment of budget processes is usually contained in overarching chapters handled by staff specialized in budget systems. But in doing the analysis for the social protection chapter, the social protection team must be aware of what is being done by the other team members and help to supply examples of any issues found. It must verify whether budget processes impede proper functioning of the social protection sector not picked up in the general chapter, either because they are sector or program specific or because the view taken in the general chapter is not wide enough.

Box. Examples of social protection activities

Labor market interventions. Improve the ability of households to provide for themselves through work via the development of efficient and fair labor policies, active and passive labor market programs and pre- and in-service training programs. Examples include but are not limited to unemployment assistance, job search assistance, unemployment insurance, job retraining programs and integrated savings accounts.

Pensions. Help governments take care of their older and aging populations by creating or improving private pension provisions, mandatory savings and public old-age income support schemes. Governments intervene heavily in both regulation and expenditure in this area. Examples include but are not limited to old age insurance, disability insurance, survivors insurance, noncontributory pension programs and the regulatory framework for private pension programs.

Social safety nets. Provide income support and access to basic social services to the poorest population groups or those needing assistance after economic downturns, natural disasters or household-specific adverse events that lower income. Examples include but are not limited to needs-based cash social assistance, conditional cash transfers, food stamps, food rations, child allowances, noncontributory pension programs, food-for-work or laborintensive public works; demand side interventions in the social sectors such as school feeding programs; school fee waivers or scholarships, health care fee waivers; more general supports to welfare such as agricultural input subsidies (prices or vouchers), energy subsidies; food price subsidies and housing subsidies.

Social care services. Institutional or community-based services including family support (respite care, child care, counseling, home visiting, domestic violence counseling, alcohol treatment and rehabilitation), support for people with disabilities (inclusive education, sheltered workshops, rehabilitation, technical aids), help for the elderly (senior citizen centers, home visits) and out-of-home placements for children (foster care, adoption).

Social funds. Agencies channel grant funding to small-scale projects to help poor communities design and implement their own projects to meet their self-defined needs.

Note: This table casts the net quite widely. Often housing, agricultural and energy subsidies might be excluded from such a treatment, though clearly their purpose is alied with that of social assistance.

Source: Adapted from Coudouel and others, 2001a, boxes 1 and 4.

Note 5. Intergovernmental finances

Ideally all analyses will be for a consolidated budget bringing together pertinent information from national, state and local levels. Where the spending by subnational units is derived from transfers from the national government, there are often requirements that the subnational unit report how the money is used and how this consolidated view may be possible. Where the subnational units

have substantial own revenue and thus spending power independent of the national government, such reporting mechanisms may be absent, and the ideal consolidated view unachievable. In the U.S. for example, substantial portions of social assistance are provided by state revenues. Not only is there no consolidation of social assistance expenditures in the official budget process, there is apparently no such consolidation by the extensive analytical or advocacy community, either regularly or in a recent ad hoc study.

The PER team must thus have realistic goals. Certainly it should seek out and report any consolidated information available. In well-funded PERs in federal systems where spending is diversified by level, it may be possible to gather state and local information for a subset of jurisdictions—and to provide an approximation of the federal level in the whole (the planned Brazilian safety net assessment will take this route). In other cases PERs at the state level may be done for their own purposes (India is taking this route). If several are completed, it may then be possible to get a sense of the whole by looking at those parts.

Note 6. Gaps and overlaps

Note that receiving overlapping benefits from programs is not necessarily bad. It may reflect good targeting among separate programs. For example, we would hope that all social assistance programs, or demand-side interventions promoting health and education services, are targeted toward the bottom end of the income distribution. So, to find that a single family receives social assistance, school lunches and free textbooks from three different programs may be optimal. But that depends in part on how the packages of support are dimensioned. If the social assistance payment is generous, one family receiving all benefits may be "too much." In few countries would it actually put the family over the poverty line, the most technical criterion for "too much." But it might be that with relatively few resources and many unserved families, governments would prefer to spread benefits differently.

Fragmentation may show up when many programs are trying to do roughly the same thing (address child malnutrition) or serve the same target group (as when the ministry of education gives education supports to the poor, the social assistance ministry gives social assistance to the poor and the power sector gives power subsidies to the poor). There may be historical and institutional reasons for the diversity of programs, but if each requires a set of overhead administrative functions, this can be inefficient—most acutely when the functions are very similar and the benefit provided by each program low.

If significant gaps in services are found, it is useful to provide some idea of how much it would cost to fill them.

Note 7. Adequacy of spending

There is no agreed method to determine whether spending on social protection is too high or too low. Most analyses make qualitative judgments based on their assessment of the importance of unmet needs in the social protection sector relative to the importance of unmet needs in other sectors and the quality of spending in each. In this, they are sometimes informed by comparisons with the level of spending in various countries.

No worldwide database of social protection expenditures is complete and wholly comparable. The IMF Government Finance Statistics (GFS) has the broadest coverage of countries. But since social protection interventions and especially safety net interventions, can be found in a number of ministries, the GFS (which basically follows ministerial categories) is not a fully accurate and comprehensive source of these numbers.

For pensions, Palacios and Pallarès (2000) contain international comparisons of key pension system parameters, including those for spending, available at http://siteresources.worldbank.org/SOCIALPROTECTION/Resources/SP-

Discussion-papers/Pensions-DP/0009.pdf. The expenditure figures are drawn from a variety of sources, largely cross-country data bases, from the OECD, ILO and IMF. An updated version, Hinz and Pallarès-Miralles (2009) "International Patters of Pensions Provision II. Facts and Figures of the 2000s" will be available on the pensions website: http://go.worldbank.org/QGYOBLFXZO. A database of pension indicators: pension system typologies, design characteristics, environment in which the pension system operates, performance and outcomes, and reforms, will also be available on the pensions website. These sources provide comparators for pensions on many of the themes in this guidance, but are not mentioned separately in each section.

A tabulation of expenditures for safety nets and social protection for 75 countries is available at http://go.worldbank.org/W1S51HRLW0 under "Spending on Social Safety Nets: Comparative Data Compiled from World Bank Analytic Work." There are inevitable issues of noncomparable definitions used by the many individual reports and analysts, but the numbers are likely to be more comprehensive than the IMF GFS. Also, see chapter 3 in Grosh, del Ninno, Tesliuc, and Ouerghi (2008) at http://go.worldbank.org/K0Z8SB4VJ0.

Besley, Burgess and Rasul's "Benchmarking Government Provision of Safety Nets" (2003) might be interesting reading. It reviews briefly the theoretically proper but usually intractable ways of determining how much spending would be appropriate. The paper develops a framework for comparative benchmarking,

controlling for various factors that affect the ability to fund programs. Two sets of factors are examined: structural features captured by regional dummy variables and characteristics of the underlying populations; and quality of government, as reflected in measures of corruption, rule of law, political pressure and others. Analysis is conducted for spending patterns in 63 client countries during 1972–1997. A separate analysis is conducted for states in India, having additional information on macroeconomic factors and institutional features influencing safety-net spending. The paper also presents a summary table of social protection spending for 1972–97 derived from the IMF GFS, with regional averages, which may be a handy comparator, even for those not using the method presented.

Note 8. Recommendations or options

Writing good recommendations is an art form. They must be specific enough to be clear in what they convey, but not so specific as to repel the target reader. They must be complete enough to lead to the desired improvements if followed, but not an overwhelming laundry list. They must be grounded well enough in the analysis to be credible, but the page constraint may mean that the analysis can not be detailed in full in the main chapter. Especially when, as is usual, the big picture options on the sector-wide view and the program specific analysis are combined into a single set, the best presentation of recommendations or options can take some creativity.

Various devices can help solve the problem, at least in part. One is to "nest" the recommendations for different audiences. The central ministries—finance, planning, the presidency—and the cabinet might need only two to five fairly general recommendations such as "improve targeting" or "shifting the balance of resources from program A to B." But the ministries and program staff actually "improving targeting" will benefit from much more specific detail on how this might be done, with one or two layers of nesting below that. Another way of making a long list of recommendations manageable is to sort them by short-, medium- and long-run priorities.

It is often preferable to present options with descriptions and possibly quantifications of pros and cons of each—rather than clear recommendations. This recognizes the strong political element in the choices and informs the government without impinging too much on their decisionmaking.

Note 9. Safety net analysis

A comprehensive resource for the design, implementation, and analysis of social safety nets can be found in Grosh, del Ninno, Tesliuc, and Ouerghi (2008) *For*

Protection & Promotion. The Design and Implementation of Effective Safety Nets, available at http://go.worldbank.org/K0Z8SB4VJ0. The book develops safety net criteria, shows how they apply to social safety net programs, and provides illustrative examples.

Note 10. Automated analysis of impact of SP programs

ADePT SP is an independent-platform program that creates about 20 standardized, publication-ready tables and graphs that examine how equitable, effective, and efficient SP programs are in reducing absolute or relative poverty. The tool tabulates the average, accounting-type of benefit incidence analysis of SP programs. The software optimally uses the information on participation in SP programs from household surveys to generate relevant tables; performs sensitivity analysis with different welfare counterfactuals; generates estimates with corrected standard errors; and produces a number of statistics that allow comparisons between survey and administrative data.

ADePT SP can also be used to simulate the distributional impact of new/restructured programs, or to check program compliance. The tool is part of the ADePT software developed by DECRG, which covers poverty, inequality, labor, gender, education, and health. The SP module was jointly developed with HDNSP. The tool is actively used in the Bank to produce comparable, comprehensive diagnostics of the distributional outcomes of SP programs and proposed reforms, and has for example been used in the ESWs for Belarus, Bosnia-Herzegovina, Ukraine, Russia/Tatarstan, Egypt, and Colombia. To use ADePT SP go to http://go.worldbank.org/HTI7CJXGQ0.

The PovertyNet website at http://go.worldbank.org/KCB8012ZF0 also contains useful tools and references for analyzing poverty and distributional impacts of economic policy changes.

Note 11. Coverage

Where possible, and especially for safety-net analysis, coverage information should be presented not only in aggregate, but by whatever pertinent breakdowns are available. Presentation by welfare quintile is always pertinent if available—if not, rural-urban distribution or regional breakdowns may serve as proxies. Breakdowns by age or gender may be pertinent, and for social insurance programs, by sector of employment.

Pension coverage needs to be defined broadly, looking first at those receiving benefits under each of the several pertinent schemes as well as those paying contributions or otherwise eligible later in life to receive benefits, among the working age population. Coverage may be increasing among the working age population (some LAC countries) and or falling (ECA countries). Working age coverage provides a measure, albeit imperfect, of what percentage of future elderly will be covered under these systems.

Another measure of importance is the covered wage bill as a percentage of GDP. There are countries with high coverage, but with extremely low ceilings on wages subject to contributions, resulting in low effective coverage under the pension system. The specific parameters of each of the systems covered should be fully described, including such issues as contribution rates, retirement ages, years of service required, benefit rates, base wage (on which pension is based) and indexation. Disability and survivor issues should also be covered in addition to providing the share of pension expenditures on each of these additional benefits.

Note 12. Adequacy of benefit level

There is no uniformly adequate pension level for all countries. For each country the appropriate pension level depends on many factors, including tax treatment of pensions, contribution rates to the pension system, the financing of retiree health care, family structure and so on. A comparison of the average post-tax pension relative to average post-tax wage will give a rough idea of whether the pension seems adequate. Taking into account that pensions are usually not taxable and that average contribution rates are 10–15 percent, a ratio of average pension to average wage in the 30–50 percent range is a ballpark estimate of adequacy.

There should be a quick analysis of disability and survivors. Lengthy periods of contribution before eligibility for disability benefits can be unfair for workers who truly become disabled. Conversely, short eligibility periods, particularly coupled with high retirement ages, become an invitation for evading further contributions. Similarly, despite the evidence suggesting that elderly widows are among the poorest of the elderly, countries sometimes do not offer survivor benefits beyond a fixed period of 1–3 years for widows. In other cases, anyone remotely connected to the deceased becomes eligible for a survivor pension.

For social assistance programs, the conceptual benchmark for adequacy would be how well the payment, or combination of benefits from several programs, fills the gap between a household's income and the poverty line. Ideally, the gap would just be filled according to each household's needs. In fact, very few programs customize benefits fully. Most have a uniform benefit level, and a minority have two or three block levels—or a base and an adjustment for each household member or child. Moreover, few programs give benefits big enough to fill the

poverty gap.

Check Grosh, del Ninno, Tesliuc, and Ouerghi (2008) For Protection and Promotion: The Design and Implementation of Effective Social Safety Nets, chapter 5 downloadable at http://go.worldbank.org/K0Z8SB4VJ0 and the website http://go.worldbank.org/IGCNXFLDG0 for more on benefit levels and delivery mechanisms.

Note 13. Incidence analysis for social assistance

The calculation of incidence from primary household survey data is a moderately complicated task, with several methodological choices to be made. Minimum practice is to report average incidence by population quintiles or deciles based on a post-transfer welfare variable. Best practice involves a more sophisticated counterfactual for welfare in the absence of the transfer, and marginal and possibly dynamic incidence analysis to complement the static average. Demery (2003) provides a good basic explanation of some of the issues and concepts in incidence analysis—van de Walle (2003) available at http://go.worldbank.org/IIBYP7LWN1, a more advanced treatment of some of the methodological approaches. Grosh, del Ninno, Tesliuc and Ouerghi (2008) provide an overview of methods, data requirements, caveats, and provide useful examples. The most common methods for incidence analysis are shown in Table 6.9.

TABLE 6.9 Common Targeting Measures

Measure	Definition
Concentration curve	Share of total transfers going to the poorest percentage of the population ranked by household income per person
Share going to the poor	Share of transfers going to those who are initially deemed poor (or other reference group based on income)
Normalized share	Share of transfers going to a the poorest x percent of the population divided by that share; for example, if 30 percent of the transfer goes to the poorest 20 percent of the population, the normalized share is 30/20 = 1.5
Concentration index	Area between the concentration curve and the diagonal along which everyone receives the same amount
Coverage rate	Program participation rate for the poor
Targeting differential	Difference between the coverage rate and the participation rate for the nonpoor
Proportion of type 1 errors	Proportion of program beneficiaries who are not poor
Proportion of type 2 errors	Proportion of the poor who do not benefit from the program

SOURCE: Ravallion 2007.

The first step in incidence analysis is to construct a welfare measure. See Deaton and Zaidi (2002) for a detailed explanation of the issues involved in how to do

this. The programs used to calculate consumption aggregates for two LSMS surveys are available at www.worldbank.org/lsms under "Tools for Using Household Survey Data." They help demonstrate how to implement some of the ideas.

A decision must be made on how to rank households and what to assume about the impact of SP transfers. Much Bank work to date, especially on safety nets where transfers are usually both rare and small, uses a post-transfer welfare variable directly from the survey. This implicitly assumes that the impact of receiving the transfer on welfare is zero. Much other Bank work, especially on pensions, constructs a counterfactual welfare measure by subtracting the value of the transfer. This implicitly assumes that the full transfer is additional. It is clearly more conceptually correct to model what welfare would be in the absence of the transfer, though the techniques for doing so are not yet fully standard and accepted. van de Walle 2003 reviews the issue well. Three good cases of such modeling are:

- van de Walle's 2002 assessment of Viet Nam's safety nets.
- Tesliuc's assessment of the social protection interventions in the Kyrgyz Republic in chapter 8 of the poverty assessment.
- van de Walle, Ravallion and Guatam's 1994 assessment of Hungary's safety net.

Next, deciles or quintiles should be constructed. It is usually preferable to construct these so that they contain the same number of individuals, not households. Results can differ significantly, however, so if the work is to be compared with previous analyses it is important to use the same methods. The impact can be seen in the table.

Table 1. Incidence of Lima's public health care utilization under alternative quintile definitions

	Poorest 1	2	3	4	Richest 5
Per capita household income					
Population quintiles	11	22	25	23	19
Household quintiles	29	18	25	15	13
Household quintiles					
Total household income	22	19	23	20	16
Per capita household income	29	18	25	15	13
Source: Grosh (1994).					

Most incidence work done stops at describing the incidence actually observed in a program—the average incidence. But those who are served or not served if the program is expanded or contracted may not be the same as those served on average. Thus the marginal incidence may be different from the average incidence. For example, networks for power and water often first serve the wealthier parts of a city, and their average incidence may not look very pro-poor. But if they have already achieved fairly wide coverage and expand it to the unserved poor, many of the newly served will be poor, and the marginal incidence much more pro-poor than the average. Again, van de Walle (2003) provides a basic reference and primer on how to compute marginal incidence with a single cross-section, repeated cross-section or panel data set.

"Dynamic incidence" is a term used to describe a case where deciles are based not on a household's current welfare, but on how it has changed over time. It can thus be used to describe whether a program reaches those who have been most affected by an economic shock. An application is contained in the "Kyrgyz Poverty Assessment," chapter 8, also see http://tric.ru/files/2006/01/18/CD-Rom%20Content/pdfs/Papers/English/0408.pdf.

Once the calculations are made for a specific program, it is useful to compare them to benchmarks—either other programs in the same country that might be alternate uses of funds, or to other programs around the world that give some idea of what common or "good" practice might be.

For benchmarking social assistance, Coady, Grosh and Hoddinott (2004) have the most comprehensive compilation of the incidence of targeted transfers—122 programs from 48 countries. Figure 4.3 from Grosh, del Ninno, Tesliuc, and Ouerghi (2008) shows errors of inclusion for selected programs and countries.

United States Food Stamp Program Temporary Assistance for **Needy Families** Latin America & the Caribbean Brazil Chile Jamaica Mexico Argentina **Europe and Central Asia** Romania Bulgaria Lithuania Hungary Estonia Poland Moldova Kyrgyzstan Republic Albania Serbia Armenia Russian Federation Georgia Bosnia & Herzegovina Uzbekistan Macedonia, FYR Azerbaijan Tajikistan 0 20 60 80 100 40 Percentage of beneficiaries in poorest quintile

FIGURE 4.3 Errors of Inclusion, Selected Programs and Countries

SOURCES: United States: Lindert 2005a; Latin America and the Caribbean: Lindert, Skoufias and Shapiro 2006; Europe and Central Asia: Tesliuc and others forthcoming.

NOTE: For Europe and Central Asia, the programs referenced are each country's means-tested or proxy means-tested social assistance of last resort. The programs in Latin America and the Caribbean refer to each country's conditional cash transfer program, except for Argentina, which references the Jefes de Hogar workfare program.

Note 14. Distributional issues for pensions

To the extent that pensions are based on contributions by the covered workers, incidence analysis that emphasizes the distribution of benefits across quintiles may not be the most pertinent yardstick. But distributional issues can be important. It is important to know the number of elderly receiving minimum pensions and to analyze outcomes for individuals of different income levels, different labor histories and different genders to determine their pensions relative to their own final salary when they first retire and relative to the average wage both at retirement and at death. Lack of full indexation often results in pensions that appear high at retirement to disintegrate into nothing as the individual ages and becomes even more vulnerable. Differences across genders

and across income levels need to be noted, particularly those that are regressive. Even benefit formulas that appear fair and progressive can skew toward regressivity due to the greater longevity of higher income individuals and the tendency to base pensions on last wages, with higher income individuals receiving large increases in salary prior to retirement relative to lower income individuals. Internal rates of return are another measure of whether the pension system has been a good deal for the individual. These typically vary by gender and income level.

The Bank (HDNSP) has developed the Pensions Reform Options Simulation Toolkit (PROST) to look at the fiscal sustainability and distributional issues within pension systems. The PROST model requires users to enter parameters and basic data from existing systems and then produces projections, which cover both the short and the long term. PROST can be used to conduct the analysis of distributional issues discussed in the previous paragraph for individuals over time, so the user can see how they change as the macroeconomic environment, longevity and other factors change. An informational flyer on PROST is available at http://siteresources.worldbank.org/INTPENSIONS/Resources/395443-1121194657824/PRPNoteModeling.pdf.

Note 15. Efficiency analysis

Note that information to make fully robust quantitative statements may be lacking. It is often possible, nonetheless, to make qualitative judgments about some aspects of programs that are likely to be grossly inefficient, especially if key design features or parameters of performance are far from accepted international practice.

It is impossible in a brief summary to provide a comprehensive treatment of how to look at efficiency for the wide gamut of programs that fall under SP. There is, however, a large body of work on different sorts of programs that can be referred to, with references below.

Note that most PERs will be selective. They will discuss in any depth the efficiency of only a few programs, focusing on those that meet one or more of the following criteria: those with large budgets, those that seem to be performing better or much worse than average or those that are on the country's agenda for reform at the moment.

 Chapter 7 in Grosh, del Ninno, Tesliuc and Ouerghi (2008) contains an extensive discussion of how to design effective safety nets: http://go.worldbank.org/K0Z8SB4VJ0.

- Technical Note II of the social protection chapter of the PRSP handbook has one-sheet summaries on 26 programs.
- The safety-net primer has papers that describe good design practice for common safety net programs, and the website has referrals to a wide list of other research and analytic materials, Bank lending and ESW and so on: http://go.worldbank.org/IFOHJJAPDO.
- The labor primer similarly provides summary analyses of unemployment benefits, VET, active labor market policies and so on: http://go.worldbank.org/C5XUGVKDS0.
- The pensions primer and notes series provide papers assessing the options and the arguments in different areas of pension policy, pension system design, administrative, regulatory and supervisory issues and a range of country and regional case studies. Finally, the effect of reforms on retirement behavior and household savings are considered, along with subnational public schemes and ways to provide incentives for lower income workers to participate http://go.worldbank.org/RIDQWTX330.
- The disability website contains documents that provide useful input not only into considering SP programs and their ability to reach the disabled, but various other sectors as well—health, education, transport and so on: http://go.worldbank.org/0GWEU0VOY0
- The social fund website has a good deal of information on good design and implementation issues. http://go.worldbank.org/L9RM4DVGP0.

Note 16. Reducing error, fraud and corruption

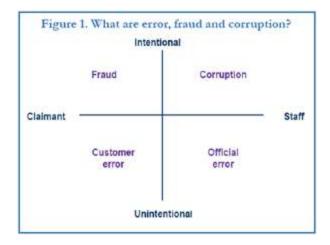
Social Protection programs pay out substantial amounts of public resources to targeted beneficiaries but a fraction of these are lost due to error, fraud or corruption (EFC). To minimize these losses SP programs have to put in place adequate systems that prevent, detect and deter EFC, and monitor and evaluate the success of these interventions.

The definitions and design features outlined below are from the Reducing Error, Fraud & Corruption in Social Protection Programs website: http://go.worldbank.org/AVC5PE8DI0.

- Fraud occurs when an applicant deliberately makes a false statement, conceals or distorts relevant information regarding program eligibility or level of benefits.
- Error is the unintentional violation of program or benefit rules, resulting
 in the wrong benefit amount or payments to an ineligible applicant. One
 can distinguish between official error due to staff mistakes, and
 customer error which occurs when a customer inadvertently provides

incorrect information;

 Corruption commonly involves political manipulation (e.g., registering potential beneficiaries for clientelism purposes to garner political support), bribery of staff to unlawfully obtain program benefits etc.



There are several design and administrative features specific to social assistance programs that can help prevent EFC including:

- Minimize the incentives and opportunities for misuse of funds when designing the program;
- Set up adequate administrative procedures;
- Align institutional responsibilities well;
- Use transparency and communications well.

The Reducing Error, Fraud & Corruption in Social Protection Programs website http://go.worldbank.org/AVC5PE8DI0 also contains a number of resources for assessing EFC and potential measures to reduce them, including social protection primer note 26 "Reducing Error, Fraud and Corruption (EFC) in Social Protection Programs", which introduces the main issues. For more details see Tesliuc and van Stolk (forthcoming).

A toolkit for reducing error, fraud and corruption in social protection programs will be available at the social protection website: http://go.worldbank.org/IFOHJJAPD0.

Note 17. Disincentives to work

This note draws heavily on section 5.2 in Grosh, del Ninno, Tesliuc, and Ouerghi (2008) For Protection and Promotion. The Design and Implementation of Effective Safety Nets, available at http://go.worldbank.org/K0Z8SB4VJ0.

Disincentives to work are a concern when it comes to the design of transfer programs. Some of the main tools to minimize disincentives to work are listed below and see Grosh et al. (2008) for more details and good examples:

- Limit programs to those not expected to work, e.g. children, pensioners, and the disabled. This approach only provides partial coverage but can be complemented by a workfare program.
- Use a targeting mechanism that is not directly tied to earnings in order to maintain work incentives.
- Make benefits for able-bodied beneficiaries conditional on a work test (essentially a workfare program). By combining last resort programs with a work test, programs can set benefits at levels based on poverty reduction criteria without removing incentives to work.
- Set benefits at a level lower than what can be earned by working (e.g. below the minimum wage) to maintain work incentives.
- Use a formula that lowers benefits on a sliding scale with less than one
 unit reduction in benefits for each unit of increased income. This is an
 administratively demanding option and some people above the poverty
 line will receive benefits.
- Link transfers to program components such as job training or education, aimed at moving beneficiaries out of assistance.

Note 18. Risk management

This heading is not traditional in PER treatment, though consideration of risk management is integral to the Bank's social protection strategy paper. Dynamic aspects of programs that reduce or mitigate risks—or enhance the capacity of households to cope with bad outcomes if they materialize—are arguably important to household welfare.

An example of how risk management might be incorporated as a separate element in evaluation is provided by public works programs. When there is a guarantee that work on the scheme (or at least a certain amount of it) will be available on demand, this enables households to take income decisions less driven by considerations of avoiding risk and more by income-maximizing concerns and becomes a benefit in its own right. Argentina's Trabajar program, though it had exceptionally good equity outcomes and apparently satisfactory efficiency outcomes, did not provide a guarantee of employment. Indeed, the jobs provided were many fewer than demanded. In this dimension it was less valuable than a scheme, such as the Maharashtra Employment Guarantee scheme, which did include the guarantee feature in its design.

Entitlement programs that guarantee access to all eligible participants contribute

much better to risk management than those that have rationed entry. But in our client countries, entitlements are the exception rather than the rule. Thus the program will assist those who get in to maintain adequate consumption. But there are many eligible who won't gain entry, and since none can count on the system as a backup in times of need, all must continue to choose risk-averse strategies of livelihood.

In addition to inadequate budgets, targeting criteria and processes responsive to rapid changes in household welfare are also important for good risk management. Self-targeting programs have this flexibility. Means tests should also have it, if they allow households to register and receive benefits in a continually open application process. Targeting according to nutritional status of children should also be responsive in this way. Other methods that can perform well in the static sense are less dynamic. Geographic targeting using poverty maps, for example, is quite static. And proxy means tests that rely on housing location and quality and the ownership of durable goods are very static by design. Moreover, in implementation some have only periodic rather than open registration processes.

Note also that some insurance arrangements cover only those at lower risk, leaving the riskiest cases out of the risk-sharing pool. Rural agricultural workers, for example, are rarely covered by unemployment insurance, even though they find it hard to find employment during the off season or in years of drought or flood.

Note 19. Delivery mechanisms

One of the principal differences between Safety Net Assessments and PERs is that the former go into much more extensive detail on the delivery mechanisms and can therefore signal not only general directions for reform but also specific changes in program design and management. There is no conceptual reason why PERs cannot provide a full treatment of delivery mechanisms, but in practice, resources may constrain their ability to do so. Such detail often remains in sectoral background papers circulated to the most involved agencies rather than to the wider circulation of the multisectoral PER as a whole.

Note 20. Conditional cash transfers

A comprehensive overview and discussion of conditional cash transfers, including the design and implementation of CCT programs, is provided in Fiszbein and Schady with Ferreira, Grosh, Keleher, Olinto, and Skoufias (2009) *Conditional Cash Transfers. Reducing Present and Future Poverty*, available at http://imagebank.worldbank.org/servlet/WDS_IBank_Servlet?pcont=details&men uPK=64154159&searchMenuPK=64154240&theSitePK=501889&eid=000334955

_20090227075314&siteName=IMAGEBANK.

Table 3.1 shows a cost-benefit analysis of the education effects of a conditional cash transfer program, the Bono de Desarrollo Humano Program in Ecuador (Grosh et al. 2008).

TABLE 3.1 Cost-Benefit Estimates of the Education Effects of the Bono de Desarrollo Humano Program, Ecuador

Item	1% growth	3% growth	5% growth
Without conditionality	0.62	0.82	1.13
With conditionality	1.15	1.50	2.05

SOURCE: World Bank 2006l.

Note 21. Financing analysis

In addition to the basic issue of whether the amount of expenditure is sustainable, it is often important to consider the sources of financing and what they imply about the stability of programs and the balance between them. Are some programs financed through earmarked taxes and others through general revenue? Some through national taxes and others through local taxes? How does revenue adequacy, stability and growth differ among the various sources? How do the differences in revenue correspond to the differences in program needs?

It may be particularly important to look at the degree to which funding is countercyclical. For an analysis of seven Latin American countries, it was found that despite the governments' efforts to reallocate spending to targeted programs, the available financing declined, and the number of poor increased during downturns for each 1 percent loss of GDP, the net amount of targeted spending per poor person declined by 2 percent (de Ferranti and others 2000, p. 114).

Snyder and Yackovlev (2000) found that the most resilient programs (those whose allocations were most countercyclical or least cyclical) were those for which earmarking was most strict (such as the U.S. Unemployment Program). Acknowledging that it is hard for governments to resist spending in good times while recognizing the importance of countercyclicality of public spending implies that public finance economists' traditional prejudice against earmarking may need to be tempered for programs that need to be countercyclical, as is true for most in the social protection sector. See also Grosh, del Ninno, Tesliuc, and Ouerghi (2008) For Protection and Promotion: The Design and Implementation of Effective Social Safety Nets, especially chapter 3.

Note 22. Unemployment insurance sustainability

The Bank's unemployment insurance simulation model (UISIM) analyzes the sustainability of unemployment insurance. UISIM can simulate expenditures implied by the introduction of new unemployment insurance systems, changes in expenditures implied by changes of system parameters, revenues generated given predetermined contribution and coverage rates, or contributions rates needed to cover UI system expenditures. See Vodopivec and Fares (2006) "An Introduction to Unemployment Insurance Simulation Model" available at http://info.worldbank.org/etools/docs/library/230130/FaresAfternoon%20II.pdf

Note 23. Pension sustainability

It is of course of importance to look at the cash flow requirements of existing schemes and the extent to which they can be self-financed through contributions and the extent to which they require additional support from the budget. This analysis needs to be combined with the coverage analysis from the previous section. While it might be acceptable to partially finance from the budget a scheme that covers the majority of the elderly, it is much less acceptable for a scheme to require budgetary subsidies when it covers only the high-income five percent of the population. Other measures include the implicit liabilities within the pension system. These can be compared with the explicit liabilities of the government to provide some sense of their magnitude. Two other measures—the annual contribution rates required over time if the system were required to be self-financing and the benefit rates affordable if the system were required to be self-financing—are useful measures of problems within the existing systems.

The Bank's PROST model is designed to conduct such an analysis. An informational flyer on PROST is available at: http://siteresources.worldbank.org/INTPENSIONS/Resources/395443-1121194657824/PRPNoteModeling.pdf.

Note 24. Impact evaluation

Ideally, impact evaluation measures against a counterfactual change attributable to the program. Conducting such evaluation is usually well beyond the scope of a PER, but if such studies exist, they should be referenced. When they do not, some back of the envelope calculations that ignore behavioral change, or assume rather than calculate it, may be useful. For useful overviews, methods, and comparators see:

• Chapter 6 in Grosh, del Ninno, Tesliuc, and Ouerghi (2008) For Protection and Promotion: The Design and Implementation of Effective Social Safety

Nets: http://go.worldbank.org/K0Z8SB4VJ0.

- del Ninno, Milazzo, and Subbarao (2009) "How to Make Public Works Work:

 A Review of the Experiences": http://go.worldbank.org/HGGIYW2RX0
- The PREM Impact Evaluation Database: http://go.worldbank.org/3MAFKA1NJ0



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Example 1. Linking to previous PERs

Source: Nicaragua Public Expenditure Review 2008, Report No. 39807-NI.

Main Findings of Previous Reviews

E.1 The 2001 PER had found that the individual social protection programs are generally well targeted, particularly because beneficiary identification largely relies on targeting mechanisms (geographical targeting as well as meanstesting). But as a group, the programs are fragmented and are not guided by a clear strategy. Clear priorities for social protection are lacking, both in how to best address vulnerabilities and in defining who the priority groups among the vulnerable are. The coverage of ongoing programs was very modest. If there were no overlap in the coverage of different programs, it was estimated that spending by the Ministry of the Family could in principle reach as many as 450,000 children and adolescents. This only represented around one-third of the total poor and extreme poor children aged 0-18. To the extent that there are significant overlaps, which is likely, coverage would be even smaller.

E.2 Given that the largest among the vulnerable population in Nicaragua are children, the focus of the social protection programs was considered appropriate. However, the 2001 PER also recommended that the overall social protection strategy be extended to encompass other important vulnerable groups. One of the most important is poor working-age adults affected by economic instabilities (e.g., coffee price declines), natural shocks (e.g., droughts) or individual shocks (e.g., health shocks), who need programs to protect them from wide income variations. There have been few programs in place that effectively address this group.

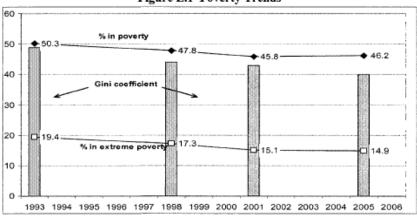


Figure E.1 Poverty Trends

Source: INEC (2006).

Evolution of Key Sector Outcome Indicators since 2001

E.3 Progress in poverty reduction has been disappointing. Indeed, in spite of modest declines during the 1990s, poverty remains high and social indicators

weak in Nicaragua. Recent poverty indicators from the 2005 Living Standards Measurement Survey show that progress in poverty reduction has slowed down further, with a headcount of 46.2 percent for the poor and 14.9 percent for the extremely poor. Nicaragua has experienced a reduction in inequality (from a Gini coefficient of 50.4 in 1993 to 41.0 in 2005) over the past decade, associated with a reduction in the depth of poverty. The poverty depth (measure of the average distance of the poor's consumption to the poverty line) of the very poor has decreased by about 30% between 1998 and 2005. However, the actual number of poor has not shown improvements (even if they are less poor on average). Poverty in its many dimensions is particularly acute in rural areas and the Atlantic coast: in 2001, 62 percent of the live in rural areas among which many are indigenous people.

80 70 60 50 Poverty 40 30 Extreme poverty 20 10 0

Figure E.2 Geographic Distribution of Poverty

Source: INEC (2006).

E.4 In addition, the poor in Nicaragua exhibit a relatively high vulnerability, linked to both the frequency of covariate shocks (including natural disasters and commodity price shocks) and to household level shocks (including health shocks). Coverage mechanisms for these risks are underdeveloped in Nicaragua, leaving many household without means to insure against these risks. For instance, in terms of coverage for health care costs (National Social Security Institute), while 24 and 13 percent of the population in Managua and the Pacific have health insurance, respectively, coverage is only 4 percent in the Center and the Atlantic, only 3.4 percent in rural areas and as little as 2.5 percent for the poorest quintile.

30 25 22.3 20 16.8 16.3 15 10.1 10 3.8 5 g 星 Ē þ 2 Parties Parties Rorest Achest Income quintiles

Figure E.3: Access to health insurance, 2005

Source: Poverty Assessment, on basis of LSMS (2005).

E.5 The high level of poverty and vulnerability is reflected in very poor outcomes in terms of nutrition in the country. Despite improvements, more than one child under the age of 5 out of every five children is chronically malnourished. The situation is particularly dire in rural areas (27 percent prevalence) and amongst the very poor (37 percent amongst the poorest quintile).

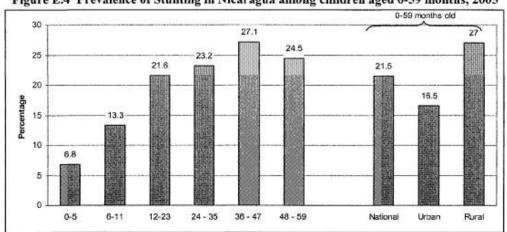


Figure E.4 Prevalence of Stunting in Nicaragua among children aged 0-59 months, 2005

E6 Many social indicators also are strongly correlated with poverty status and vulnerability. For instance, the level of maternal care is lower in rural areas, indigenous areas and among the poorest. The level of preventive health care for the highest quintile is three times higher than the poorest. Similarly, literacy, enrolment, attendance and completion remain low in particular amongst the poor and in rural and Atlantic areas: at age 17 enrollment rates for boys in richest quintile are 4 times larger than for boys in the poorest quintiles; net secondary enrollment in rural areas is half of that in urban areas (28.1 vs. 61.1. percent); and one out of four young people between the ages of 15 and 24 years is illiterate in extremely poor households (vs. 4 percent for the non-poor).

Example 2. Social risks and groups at risk

Source: Honduras Public Expenditure Review 2007. Background Chapters and Annexes, Vol. 2, Report No. 39251-HO.

Vulnerable Group: 0-5 Year Olds

8.12 Chronic malnutrition (height for age) affects over one-third of the children that attend the first grade of primary school (ages 6 to 9 years). According to the Progress Report on the Millennium Development Goals (MDG) of 2003, malnutrition in this cohort had increased slightly from 34.9 percent in 1991 to 36.2 percent in 2001, making it difficult to reach the MDG target of 17.4 percent in 2015. But the problems of malnutrition start earlier. For children under five, estimates based on the ENCOVI indicate that in 2004, chronic malnutrition affected one of every five children (20.8 percent); Table 8.2. That is, about 198,000 children suffered from this condition. As expected, chronic malnutrition is more prevalent in poor children (34.1 percent) and among those living in rural areas (39 percent), though one of every four *poor* children in urban areas also suffers from malnutrition.

Table 8.2 Malnutrition and Diarrhea Among Children Under 5 Years of Age, 2004

	Chronic	No of Children	Diarrhea	
	Malnutrition */	Suffering	(last 15 days)	
	(% incidence)	Malnutrition	(% incidence)	
All	20.8	198,038	17.1	
Extreme Poor	46.6	134,868	17.9	
Moderately Poor	24.3	65,493	20.3	
Poor	34.1	190,597	19.1	
Non-Poor	8.8	34,599	14.3	
Urban	13.1	53,827	15.0	
Rural	33.4	180,766.1	18.7	

Note: a/ Malnutrition -Height for age (stunting).

Source: ENCOVI 2004.

Vulnerable Group: 6-17 Year Olds

8.17 *Deficient primary education.* Although (net) primary enrollments have increased in recent years and now are estimated at 81.5 percent, there are still 200,000 children aged 6-11 years that do not attend school; Table 8.4. Enrollment rates for the extremely poor children are 10 percentage points below those of the non-poor. Efforts to increase coverage (more on this on Section D, below) in rural areas have narrowed the coverage gap between rural and urban areas to about 4 percentage points.

Table 8.4. Net Primary and Secondary Enrollment Rates, 2004

	Primary (6-11 years)	Secondary a/ (12-17 years)	No. of primary age children that do not Attend	No. of secondary age children that do not attend
Total	81.5	35.2	199,805	677,832
Extreme Poor	75.8	7.1	75,549	239,070
Moderately Poor	81.4	22.3	59,645	227,204
Poor	78.6	15.2	135,194	466,275
Non-Poor	85.5	57.4	64,610	211,557
Urban	83.7	52.6	74,294	235,849
Rural	79.8	19.5	125,510	441,981
No. of observations	4770	2387	,	•
Expanded observations	877369.1	368505.9		

Note: W Refers to the third cycle of basic education and "educación media".

Source: ENCOVI 2004

Vulnerable Group: 18-64 Year Olds

8.26 The major risk facing the poor working population in Honduras is that their income is low and variable because they have poorly paid and insecure jobs. Low paid jobs often result from low productivity, which in turn is associated with low educational attainment and lack of skills.

8.27 Low and unstable income. The main income generating asset of the poor is their labor. The rates of unemployment and underemployment are good indicators of the capacity of this cohort to generate income. In 2006, about 96,400 persons (3.5 percent of the labor force) were unemployed and near 800,000 persons (30 percent) were invisibly underemployed, that is they worked more than 36 hours but received less than a minimum salary; Table 8.9. Therefore, having a job in Honduras is no necessarily a ticket to exit poverty.

Table 8.9 Unemployment and Underemployment, 2006

	Total	Urban	Rural	Total	Urban	Rural
	Number (order than 10 years)			% labor force		
Open Unemployment	96,414	71,034	25,381	3.5	5.2	1.8
Invisible Underemployment a/	799270	267215	532055	29.6	20.7	37.8
Visible underemployment by	135845	66772	69073	5.0	5.2	4.9

Notes: a Occupied who work less than 36 hours a week and wish to work more. Worked more than 36 hours a week but received less than minimum salary

Source: XXXII Encuesta Permanente de Hogares, INE, Mayo 2006.

8.29 Overall average education attainment is only 5.6 years; Figure 8.2. It is slightly higher for women (5.8 years) than for men (5.4 years). While the very poor (Q1) have 4 years of schooling on average, the rich (Q5) have more than twice that amount (9.7 years). Average school attainment is lower in rural areas (4.3 years) than in urban areas (7 years).

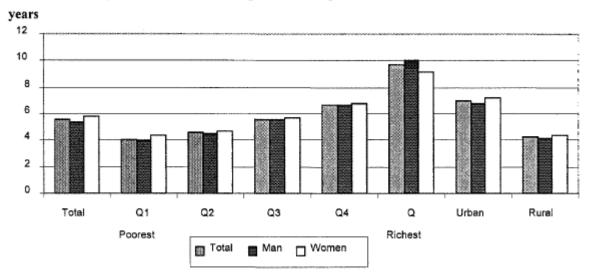


Figure 8.2: Average Years of Schooling for the Population Older than 15 Years, 2006

Source: "XXXII Encuesta Permanente de Hogares". INE, May 2006.

Vulnerable Group: 65+ Year Olds

8.30 The principal risk facing senior citizens is that they reach the retiring age with no pension or medical insurance, and must continue to work or depend on family or charity for their survival.

8.31 Lack of pension and medical insurance. According to the ENCOVI, only 5.2 percent of the population older than 65 years (the age of retirement for men in the Honduran Social Security Institute, IHSS) has a pension, with the poor faring worse (less than one percent) than the nonpoor (8.7 percent). Only 1.6 percent of the seniors that live in the rural areas have a pension compared to 9.5 percent of those that live in urban areas; Table 8.10. The coverage of medical insurance is similarly low. As a result, there are about 280,000 seniors that have no pension. Of this total, 129,000 are poor.

Table 8.10 Population of 65 Years and Older With Pension and Health Insurance, 2004

	With Pension (% cohort)	Number Without Pension	With Medical Insurance	Number Without Medical Insurance
All	5.2	280,366	6.5	276,601
Extreme Poor	0.7	55,193	0.4	55,328
Moderately Poor	0.9	74,202	1.9	73,472
Poor	0.8	129,395	1.3	128,799
Non-Poor	8.7	150,971	10.6	147,802
Urban	9.5	123,168	11.8	120,034
Rural	1.6	157,198	2.0	156,567
No of observations		1,593		1,551
Expanded observations		280,366		276,601

Source: ENCOVI 2004.

Example 3. Shape of sector

Source: Pakistan. Social Protection in Pakistan. Managing Household Risks and Vulnerability 2007, Report No. 35472-PK.

II. PAKISTAN'S SOCIAL PROTECTION SYSTEM: A BRIEF OVERVIEW

3.4 Social protection expenditure levels are low and skewed toward social security. The country spends about 1.4 percent of GDP on social protection (including civil service and military pensions), compared to 4.4 percent in India and 2.9 percent in Sri Lanka (Figure 3.1). Moreover approximately 75 percent of these resources are allocated to public and military sector pensions, compared to 51 percent in India and 62 percent in Sri Lanka. 42 Even Bangladesh, which spends less than Pakistan on social protection (0.9% of GDP), devotes a significantly larger proportion of this budget to safety nets programs (0.6% of GDP) than to social security (0.3% of GDP). This bias in spending has important implications since social security tends to benefit the non-poor and those with access to the formal sector. Pakistan's low spending on safety nets reflects the historically low importance attached to social protection and to the human development sectors generally. The fact that Pakistan spends little resources on these programs may have certain advantages, however. Limited resources prevent programs from growing too fast or excessively in response to reasons not entirely related to their main objective (say, for political reasons), and may contribute to keep program bureaucracy under control. Rather it is the combination of scarce and poorly targeted resources and a large number of programs that significantly undermine the effectiveness of these resources.

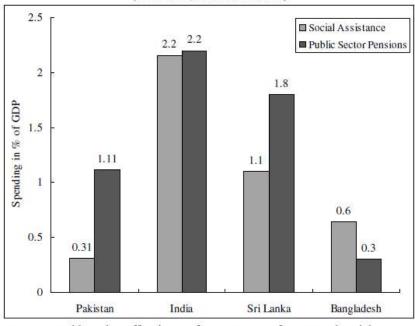


Figure 3.1: Spending on social protection in South Asia (% of GDP, 2004/05 or latest)

Sources: World Bank Staff estimates from country safety net and social protection reports and a regional pension study. As Social assistance is for 2004/05 and includes spending on those programs that each country report has considered part of the safety net/social assistance (such as targeted programs, workfare, food subsidies) which can give rise to some variation in what is covered by these estimates. Public sector pensions are for the latest year available and refer to spending on civil service and military pensions. Estimates are not fully comparable across countries, for example due to differences in the way that military and private pensions are included. The figure for Pakistan shown here includes spending on military pensions for comparative purposes, whereas the discussion in the remainder of this report excludes military pensions.

3.5 In addition, social protection spending, as a share of total pro-poor spending, has declined significantly over time, primarily as a consequence of the reduction in the budget of three of the main safety net programs. This decline took place at a time of improved fiscal stance that was witness to increases in spending in other social sectors. Consolidated education expenditures increased from 1.5 percent of GDP in 2001/02 to 1.78 percent in 2004/05, and total pro-poor, or PRSP expenditures, increased from 3.8 percent of GDP in 2001/02 to around 5 percent in 2005/06 according to the government. As a consequence, the share of social protection expenditures in PSRP expenditures fell from 7.2 to 3.3 percent between 2001/02-2005/06.

3.6 Pakistan's social protection system comprises a myriad of programs, ranging from cash transfer programs, to programs that supply textbooks to schools in poor areas, to pensions. Although generally conceived to alleviate poverty and fight vulnerability, these programs have different objectives, provide different

types of benefits and target different groups of the population. The programs also vary widely in terms of their funding. The largest safety net programs are the Zakat, Bait-ul-Mal (both cash transfer programs), and the wheat subsidy. In 2003/04 these programs accounted for 0.10, 0.05, and 0.14 percent of GDP, respectively. Social security includes both public and private pensions. As mentioned above, civil service pensions account for 0.50 percent of GDP, while private pensions account for 0.10 percent (Table 3.1). Not included in this account are the subsidies on power, water, gas, and fertilizer (see Box 3.1).

	Expendi- tures	Share of GDP D	Share of total SP budget	Source of funding	Number of beneficiaries
	(Rs. billion)	(%)	(%)		
SAFETY NETS					
Income support and basic services					
Zakat (guzara and other)	5.9	0.10	11.3	Private	1.6 mn ^A
				(Zakat levy)	(guzara: 0.8 mn)
Bait-ul-Mal C	2.5	0.05	4.9	Federal budget	1.25 mn ^A
Social welfare services	0.5	0.009	1.0	Federal budget	N.A.
Exit Policies					
Human capital accumulationTawana	0.7	0.012	1.3	Federal budget	530,000 ^A
Coping with Aggregate Risks					
Wheat subsidy	8	0.14	15.4	Federal and provincial budgets	N.A.
TOTAL safety nets	17.6	0.31	33.9		
SOCIAL SECURITY					
Public sector					
Civil service pension schemes (excl. military pensions) ^E	28.0	0.50	53.8	Federal and provincial budgets	0.8 mn retirees / 1.96 mn active workers
Private sector					
Employees Old Age Benefits (EOBI)	1.7	0.030	3.3	Private sector employers	225,000 retirees / 2.3 mm members / appr. 1.5 mm contributors ^B
Workers Welfare Fund (WWF)	2.6	0.046	5.0	Private sector employers	N.A.
Employees' Social Security Institutions (ESSI)	2.1	0.037	4.0	Private sector employers	850,000 ^B
TOTAL social security	34.4	0.61	66.1		

Sources: Issues and Policies Consultants (2004); World Bank (2006a); and information from program managers.

TOTAL

0.92

3.7 The combination of low and declining expenditure levels and a large number

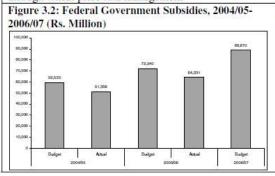
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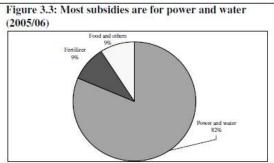
A. Number of beneficiaries of recurrent cash and non-cash benefits. B. Number of workers covered by insurance scheme. C. Budget of Bait-ul-Mal has since been increased to Rs. 4.5 billion (0.08% of GDP) and the number of beneficiaries of FSP, its largest program, to 1.45 mn. D. Based on revised estimate of GDP (at current market prices) for 2003/04 of Rs. 5,641 mn. E. Including military pensions would raise spending to Rs. 60 billion (1.07% of GDP), and beneficiaries to 1.9 mn retirees and 2.9 mn active workers. Total SP spending including military would then be around 1.4% of GDP.

of programs implies that resources are spread too thin, particularly in safety net programs. As a consequence, coverage is suboptimal, the benefits offered by these programs are often insufficient and their frequency is irregular. We discuss these issues in more detail below.

Box 3.1: Fiscal expenditures on price subsidies are substantial, but do not provide social protection

The federal government is planning to spend almost Rs. 90 billion on price subsidies in 2006/07, an increase of 75 percent since 2004/05 in nominal terms (Figure 3.2). These subsidies—71 percent higher than total social protection spending and five times larger than total social assistance spending—cover the losses of utilities in the electricity, gas, and water sectors, lower the costs of fertilizers to farmers, and attempt to lower and stabilize the cost of basic food items. The bulk of the subsidy budget (82%) is spent covering the losses of WAPDA and KESC (Figure 3.3). This expenditure is as an attempt to provide energy and water to consumers (often urban and middle class) below cost. Most of these subsidies do not form part of a social protection 'system' as they do not target the poor, or mitigate against risk. Wheat subsidies are the exception, as they are aimed at consumer food security through wheat price risk management





Example 4. Shape of sector

Source: Albania A Public Expenditure and Institutional Review 2006, Vol. 2, Report No. 36453–AL.

8.1 Averaging 7.1 percent of GDP during 2000-05, Albania's spending on social protection is broadly appropriate for a South Eastern and Central European transition country and one with its particular demographic profile. At 1.2 percent of GDP, social assistance outlays are in line with the EU8 countries, and pension outlays averaging 4.6 percent of GDP are comparable with other countries where the elderly account for less than 10 percent of the population. Overall social protection accounts for 26 percent of total general government spending (Table 8.1).

Table 8.1. Pension Spending in Countries Where Share of Elderly is Less Than 10 Percent (2002)

	% of Pop>65	Pension spending (% of GDP)
Albania	8.3	4.6
Kazakhstan	8.5	4.9
Kyrgyz	6.1	6.4
Tajikistan	3.9	3.0
Turkey	5.4	7.1
Turkmenistan	4.7	2.3
Uzbekistan	4.7	0.1
Ecuador	5.3	1.4
Ghana	3.5	1.3
Mongolia	3.8	5.8
Morocco	4.5	2.5
Peru	4.9	2.6
Zimbabwe	3.4	2.3

Source: The World Bank

8.2 During 2000-05, the direction of social protection spending has been shifting away from social assistance to social insurance. The social protection system in Albania includes (i) a contribution-based social insurance (pensions) scheme; (ii) general revenue funded social assistance and labor market programs. Pension expenditures have been increasing in real terms while expenditures on social assistance declined in real terms and fell from 2.3 per cent of GDP in 2000 to 1.2 per cent in 2005. In particular, expenditures on Ndihme Ekonomike (NE), the only means tested program, fell from 0.8 percent in 2000 to 0.4 percent of GDP in 2005.

Table 8.2. Consolidated Expenditures on Social Protection (2000 and 2005)

	Program Cost (Billion lek)	Share of Total Social Protection Spending (%)		Share of GDP (%)	
	2005	2000	2005	2000	2005
Social insurance	45.2	63	76	4.4	5.4
Pensions	40.2		68		4.8
Compensations For Rural Pensions	0.5		1		0.1
Compensations For Urban Pensioners	2.7		5		0.3
Allowances Over Veterans' Pensions	0.8		1		0.1
Maternity	0.8		1		0.1
All Other Insurances	0.2		0		0.0
Social assistance	11.1	32	19	2.3	1.2
Ndihme Ekonomike (Income assistance)	3.3		6	0.8	0.4
Disability Benefits	6.1		10		0.6
Social Care Institutions	0.5		1		0.1
All Other Assistances	1.2		2		0.1
Labor market programs	1.2	5	2	0.4	0.1
Employment Promotion Programs	0.1		0		0.0
Unemployment Benefit	0.9		2		0.1
Vocational Training	0.2		0		0.0
Administrative Costs	1.5		3		0.2
Total Social Protection	59.0		100		6.9

8.3 However, both types of programs, assistance and insurance, have an important and increasing impact on poverty in Albania. On average during 2002-05, the share of poor households receiving at least one type of social protection increased from 64 percent to 72 percent (Table 8.3). The value of public transfers, although low, represents just under one-quarter of household income for the average household, and between 28-38 percent of household income for the poorest quintiles. In the absence of social protection programs, the poverty rate should have been 11 percentage points higher for the population, and 20 percent higher for the recipients (Table 8.4).

Table 8.3. Coverage and Distribution of Key Social Protection Programs, 2002 and 2005

	To	otal	P	Poor		poor
	2002	2005	2002	2005	2002	2005
A. Coverage (Percentage of ho	useholds receiv	ving benefit)			
Ndihme Ekonomike	11.0	12.7	24.6	32.5	7.8	9.5
Urban Old Age Pension	24.6	23.5	15.8	15.8	26.6	24.8
Rural Old Age Pension	19.0	18.8	25.1	23.4	17.6	18.0
Other Pensions	8.7	8.8	9.9	12.9	8.4	8.2
Unemployment Benefit	1.2	0.5	1	0.7	1.3	0.5
Maternity Benefit	8.0	0.4	0.8	0.4	0.7	0.4
Social Care	0.4	0.9	0.3	1.8	0.4	0.8
Other Public Transfers	3.0	2.5	1.6	2.1	3.3	2.6
All / Any Public Transfers	57.1	56.1	63.5	71.8	55.6	53.5
B. Distribution (Percentage of	funds disburs	ed)				
Ndihme Ekonomike	100	100	44.6	38.1	55.4	61.9
Urban Old Age Pension	100	100	10.9	8.6	89.1	91.4
Rural Old Age Pension	100	100	22.7	18.5	77.3	81.5
Other Pensions	100	100	13.7	23.2	86.3	76.9
Total Pensions	100	100	12.4	13.2	87.6	86.8
Unemployment Benefit	100	100	25.2	14.4	74.8	85.7
Maternity Benefit	100	100	17.6	20.0	82.5	80.0
Social Care	100	100	20.6	28.3	79.4	71.7
Other Public Transfers	100	100	10.59	11.6	89.4	88.4
All / Any Public Transfers	100	100	21.27	18.0	78.7	82.1

Source: LSMS 2002 and 2005.

Table 8.4. Poverty Levels With and Without Individual Social Protection Programs, 2005

	Population, Overall		Recipien	ts Only
	Without	With	Without	With
All Programs	30%	19%	44%	24%
Ndihme Ekonomike	20%	19%	50%	40%
Urban Old Age Pension	24%	19%	39%	14%
Rural Old Age Pension	22%	19%	39%	23%
Other Pensions	20%	19%	41%	27%
Unemployment Benefits	19%	19%	30%	25%
Maternity Benefits	19%	19%	33%	23%
Social Care	19%	19%	44%	22%

Source: LSMS 2005.

8.4 The pension system has the largest impact on poverty. Ndihme Ekonomike, Albania's main social assistance program, although more appropriately targeted on the extreme poor has a more marginal impact both in terms of coverage and adequacy of benefits. The most commonly received public transfers are urban pensions (24 percent of households), rural pensions (19 percent) and Ndihme Ekonomike (13 percent) (Table 8.3). Although pensions, as contributory systems with consumption-smoothing objectives are not expected to directly impact poverty, the relatively wide coverage of beneficiaries in Albania has important poverty implications.

8.5 Almost half of all poor households report receiving a public pension compared with about one third of poor households which report receiving Ndihme Ekonomike (NE). Although low by regional standards, urban pensions are still

equal to more than one third of household consumption among the poorest urban households while rural pensions equal about 20 percent of consumption among the poorest rural households. Ndihme Economike, on the other hand, accounts for a smaller share of total household consumption – 11 percent among the poorest rural households and 16 percent among the poorest urban households (Table 8.5). Average NE benefits are equal to less than 15 percent of the poverty line, which highlights the need for beneficiaries to find additional sources of support.

Table 8.5. Adequacy: The Importance of Public Transfers in Household Consumption, 2005 (Value of Transfer As A Percent of Household Consumption)

		Area		Urban	Urban Quintiles		Rural Quintiles	
	Total	Urban	Rural	Poorest	Wealthiest	Poorest	Wealthiest	
Ndihme Ekonomike	8.5	9.9	7.8	16.0	5.8	11.0	4.5	
Urban Old Age Pension	28.0	28.1	27.8	41.4	21.2	41.8	13.6	
Rural Old Age Pension	14.4	15.1	14.3	20.9	11.8	21.1	9.9	
Other Pensions	19.9	20.5	19.2	44.7	11.8	30.5	8.0	
Unemployment Benefit	15.5	14.2	25.7	14.2	7.5	54.7	0.0	
Maternity Benefit	11.3	14.9	7.0	28.7	8.9	6.3	2.9	
Social Care	16.1	19.2	14.2	28.5	11.4	31.0	0.0	
Other Public Transfers	18.8	20.5	15.9	29.0	25.5	21.7	24.0	
All/Any Public Transfers	23.5	27.3	20.3	37.8	21.1	28.0	12.9	

Source: LSMS, 2005.

8.6 Poor households are more likely to be in receipt of rural pensions while non-poor households are more likely to be in receipt of urban pensions. The differences in incidence and coverage of the urban and rural pension schemes underscore the fact, that although both play a safety net role, more of the rural pensioners would be poor if they did not receive pensions.

8.7 In fact, in the absence of the urban pension, the overall poverty headcount could be 5 percentage points higher and the poverty rates among recipients would be 25 percentage points higher (Table 8.4). Rural pensions have only marginal impact on the poverty levels, but considerable impact on beneficiary households where the estimated poverty rate in the absence of the rural pension could be 14 percentage points higher. Ndihme Ekonomike, Albania's only means tested program, results in only a one percentage point reduction in poverty rates for the total population although in the absence of the program poverty rates would be 10-percentage points higher among beneficiaries.

8.8 Given the current importance of social insurance in Albania's poverty profile and the general inadequacy of social assistance programs, any reform of the former must clearly be formulated in conjunction with reforms of social assistance. Over time, however, the implicit poverty coverage of poor households by the pension system is likely to be reduced as poverty levels continue to fall.

Already, between 2002 and 2005, the share of pension beneficiaries that are poor fell from 18.0 to 14.3 percent. In the meantime, Ndihme Ekonomike has seen some improvement in poverty targeting over the period but also a slight reduction in their adequacy of their, already notably low, benefits (section Ndikme Ekonomike).

160. For the purpose of this report, and given their relatively small share of expenditures and coverage, the labor market programs will not be analyzed.

Example 5. Gaps and overlaps

Source: Tesliuc (2003) "Social Risk Management", Annex 8.1. In Kyrgyz Republic Poverty Assessment. Washington, D.C.: World Bank.

Duplications and gaps in coverage

8.33 Despite the substantial financial effort, budgeted social protection benefits do not reach half of the poor, including 40 percent of the extreme poor (see table 8.8). The inadequate coverage of the system is due to a set of eligibility rules that exclude the working poor without children. About 11 percent of all households, including 8.6 percent of non-poor households, cash in on more than one social protection benefit.

aprications and gap	is in the covera	ge with social pi	rotection prograi	ms
Pover ty status	Extreme	Moderate	Non-poor	Total
lot covered	39.2	54.9	57.4	51.5
Pensions	26.2	28.8	22.8	25.6
cholarship	0.2	1.5	1.4	1.1
Unified monthly benefit	13.3	6.3	3.3	7.1
Privileges	1.3	2.4	6.5	3.8
More than one benefit	19.8	6.1	8.6	10.9
otal	100.0	100.0	100.0	100.0

Note: Poverty groups are identified by consumption in the absence of SP transfers.

Source: Estimations are based on the HBS 2001.

8.34 The uncovered extreme poor are more likely to be younger households, headed by married males with none or few children (especially 0–6-year old children). Furthermore, the uncovered extreme poor are relying on low wages or nonremunerative self-employment and are more literate (while those covered are elderly pensioners or on another form of state support, with lower education). By location, the uncovered poor are more likely to be found in urban areas, or in Jalal-Abad or Chui oblasts, and less likely to be found in Naryn and Osh oblasts. These regional disparities may be associated with difficulties in the implementation or financing of poverty reduction programs, such as the UMB and

social allowances.

8.35 Duplication of the social protection benefit at the household level reaches 11 percent of the population. A substantial share of program beneficiaries (defined as individuals and their family members receiving at least a transfer) receive support from more than one program. The extent of program duplications is larger among the extreme poor (20 percent of these households receive multiple benefits), moderate among the non-poor and lowest among the moderate poor. Such a level of program duplication may call for the rationalization of some these programs. With the current information we cannot point out what specific programs seem to overlap. In some instances supplementary benefits are piggy-backed on categorical or income-based eligibility for other primary transfer programs as a way to provide additional, specific assistance to families with a specific need. In such cases the issue is whether there is a coherent strategy underlying such benefit relationships and whether income tests are appropriately structured to deal with linked benefits. Collecting better survey and program data is a necessary first step for better monitoring and evaluation of these programs.

8.36 Households benefiting from more than one SP program tend to be headed by older, unmarried or female heads and have relatively more children (especially 0–6-year-olds). These households are less likely to earn wages, entrepreneurship or farm income and to rely more on the in-kind income from household plots. A larger share of households benefiting from multiple SP programs are found in urban areas, in Osh and Bishkek oblasts, and less so in Jalal-Abad, Talash or Chui oblasts. Beneficiaries of multiple social protection programs, mostly pensioners, are also found to have better access to utilities, have more durables and own more livestock but less land.

Example 6. Gaps and overlaps

Source: Mexico Social Protection Note written by Gillette Hall and Ana-Maria Arriagada.

Best practice policy options for addressing key risks

Addressing the main areas of social risk in Mexico depends on a broad context of policies including a macroeconomic framework that facilitates labor-intensive growth and sectoral policies that broaden access to basic services (health, education, financial services, etc.) to currently underserved and hence vulnerable groups. Within this context, best practice SP interventions by the government can complement this framework with appropriate social insurance and social assistance programs designed to reduce key social risks where insurance markets fail and where self-protection mechanisms are out of reach of the most vulnerable sectors of the population. This section identifies best practice

options for addressing seven key areas of risk currently prevailing in Mexico and, where possible, provides costs estimates for implementing these options. It identifies both existing programs in Mexico that demonstrate best practice characteristics yet fail to cover the at-risk population, thus candidates for expansion, and supplements these findings with further best practice options from international experience. Cost estimates draw on: 1996 ENIGH survey data for estimating the size of the at-risk population; data from SHCP on coverage of current programs, used where possible to adjust 1996 estimates of the size of the uncovered population downwards to account for increased coverage of the at-risk population due to SP initiatives undertaken by the government after 1996; current social protection program costs, per beneficiary (including administrative costs) in Mexico (various sources including SHCP and World Bank).

Expanding access to early child development programs

ECD services targeted to young children may be the most effective intervention for breaking the intergenerational transmission of vulnerability by enhancing learning ability, schooling and hence earnings potential. Widespread international evidence shows that providing targeted nutrition support and preschool education services to children 0–5-years-old consistently leads to improved child nutrition and health, higher school enrollment rates and better performance on aptitude tests. Further, these results are more apparent in children from poor families than those from the non-poor. By increasing early abilities, preschool programs increase both the prospective earnings potential from a given year of schooling and the prospective earnings benefits of additional schooling (Young 1996).

Survey data do not allow access to ECD services to be estimated in Mexico. However, the limited number of existing programs clearly indicates low access, especially in rural areas. Best practice models for ECD service provision emphasize several features. First, parental involvement (in program design, in service provision and providing parent training as part of ECD services) is an essential component of successful ECD interventions. Second, especially in countries where fiscal resources and local infrastructure are insufficient to support the universal provision of basic services, collaboration with local groups and NGOs (both national and international) as service providers has proven to be an effective approach to widening service provision, especially to poor and isolated communities. Third, most national governments share the cost of early child intervention programs with subnational governments and program beneficiaries (who either pay a user fee, pay caregivers' honoraria or do volunteer work at the care center). Finally, television and radio programs have been used in innovative ways to enhance ECD services by offering training programs for care providers

and supplementing the local curriculum with ingenious learning programs for children and extending these ECD support services to remote areas. ¹⁰ Mexico's PRODEI (Programa de Educación Inicial) includes several of these features, focusing on teaching parents techniques for social and motor development among young children. This program is a clear target for expansion in order to raise ECD coverage. The program currently covers 580,000 children at a cost of 540 pesos per child per year. The total size of the target population (poor children ages 0–4) is roughly 5.2 million; thus, estimating the number of currently uncovered at 4.6 million, the cost of expanding PRODEI to cover the existing gap is 2.5 billion pesos.

Problem	Diagnosis	Best Practice Policy Options
 Low preschool and ECD Program coverage 	Public services not widely available, private services cost-prohibitive for the poor.	Mexico's exemplary ECD education services for parents (PRODE and community-based pre-school services (CONAFE) illustrate best-practice techniques, but offer insufficient coverage and should be expanded.
2. Pocket of low primary school attendance in rural areas	In rural areas, 15 percent of 6—14- year-olds in the poorest income decile (largely indigenous) do not attend school.	Community-based rural schooling (CONAFE), combined with scholarships and training for indigenous students to become teachers, bilingual education, distance learning and mobile education units.
3. Low secondary school enrollment rates	Opportunity cost of schooling, poor quality and low access yield high youth employment in rural areas and "Inactivity" in urban areas.	Expand demand-side subsidies (for example PROGRESA scholarships) complemented by increased access and quality of secondary schooling; special education programs to bring dropouts back into education system, and high-school equivalency programs.
4. Low earnings among the poor, working-age population	Low education/skill levels yield higher unemployment and underemployment among the poor; but the majority of poor (over 60 percent) are employed full time at below-poverty wages. Current negative-income tax program excludes poorest (informal sector).	Self-targeted workfare program for the poor unemployed (Mexico's PET), complemented by targeted income-support (reformed negative income tax is an option) for poor working families, within macroeconomic and labor market framework promoting labor-intensive growth, along with financial services for the poor.
5. Low access to pension (income support) among the elderly poor	Pension system only recently open to informal sector; current access to pensions regressive with extremely low (0.2 percent) incidence among rural poor.	Expanded options for informal sector participation in public and/or private contributory pension plans, complemented by targeted noncontributory pension system for elderly poor.
6. Low housing quality among the poor	Restricted or access to savings and borrowing mechanisms for the poor, existing public subsidies largely targeted to middle class (public sector employees).	Targeted subsidies to finance small–scale home improvements complemented by expanded financial services (mortgages) and basic infrastructure networks serving poor areas.
7. Concentration of indigenous people among the chronically poor, and in isolated rural villages	Geographic and social isolation, low access to basic infrastructure, few public interventions specifically designed to foster local control or driven by indigenous cultural norms.	Targeted investment to reduce basic infrastructural deficiencie of these communities (i.e. water), combined with specific, community-driven and managed development programs (see Indigenous Peoples Chapter).

For preschool, the estimated coverage gap in 1996 was 500,000 poor children

(age 5). The CONAFE program (see below), now provides coverage to 125,000 rural children at an estimated cost of 3,510 pesos per child. Assuming a similar cost structure in urban as well as rural areas, CONAFE could be expanded to cover the remaining estimated gap (375,000 children) at an annual cost of 1.3 billion pesos.

Eliminating the pocket of low primary school enrollment in rural areas

While access to primary education is close to universal in Mexico, a small but significant pocket of relatively low attendance rates (85 percent) prevails among the poorest 10 percent of the rural population. The total number of poor children ages 6-14 in rural areas not attending primary school was estimated at 430,000 in 1996. The problem is concentrated among children in small, indigenous communities of 100 or fewer inhabitants, where 28 percent of primary-school-aged children do not attend school and where one-quarter of school-age children are monolingual indigenous language speakers. Mexico's CONAFE program exhibits best-practice characteristics of community-based rural schooling: it is demanddriven, fosters high parental and community involvement, applies active pedagogical models and allows for learning in students' own (indigenous) languages. The program currently covers 160,000 children, and has achieved systematically positive results as demonstrated by test-scores showing systematically higher achievements scores for students as compared to a control group in traditional schools. Estimating the remaining coverage gap at 270,000 children, closing this gap, at current costs of 3,735 pesos per student per year, would cost 1 billion pesos. Scholarship programs, with a particular focus on top indigenous students graduating from primary and secondary school in order to continue their education and become teachers, would also help close existing gaps in completion rates and over time would help raise the supply of rural schooling and quality of teachers (only 38 percent of primary schools in indigenous communities offer all grades 1 through 6). Distance learning, such as educational radio programs created by indigenous teachers and offered in both Spanish and local indigenous languages, might also help bridge the educational gap in isolated areas. Reliable cost estimates for both of these programs are not currently available.

Improving access to secondary schooling

Secondary school enrollment rates are low, on average, even in lower secondary school (68 percent in urban areas, 37 percent in rural areas), signaling a significant problem in transitioning students from primary to secondary schooling. The problem is markedly worse among the poor, with enrollment rates of 41 percent among the urban poor and 24 percent among the rural poor.

Raising secondary school access and quality, a sectoral responsibility, is the first

step. In terms of social assistance programs, raising the demand for secondary schooling through scholarships targeted to poor students is a viable option. Coverage of existing scholarship programs was extremely low in 1996, especially among the poor (less than 3 percent in both rural and urban areas; see Table 3). Progresa, introduced in 1997, offers income-transfers for families conditioned on school attendance: 257.5 pesos per month for lower secondary and 300 pesos per month for upper secondary school. Estimating coverage gaps at 1.9 million for lower secondary and 2.2 million for upper secondary, and using Progresa per-child cost estimates, covering the existing gap would cost 5.9 billion pesos for lower secondary and 7.9 billion pesos for upper secondary. 12

Reducing the prevailing high rates of inactivity will likely require complementary sectoral programs that enhance secondary school curricula and teacher quality. To address over-age students who have dropped out of school, intensive education programs to bring students back into the secondary school system can be employed. In addition, community college systems, such as those operating successfully in the United States, offering high-school equivalency programs in the evenings along with 1-to-2-year terminal degrees in technical fields such as nursing and computing, can provide a successful model.

Addressing the problem of low earnings among the working-age population

The problem of low earnings among the working-age population (aged 25–64) in Mexico is driven by a range of factors including unemployment, part-time work and low pay (full-time work at below-poverty wages). Of the three determinants of low earnings, unemployment is the least common, as seen in Table 2a; average unemployment rates are strikingly low (1.5 percent), while the rural poor have even lower unemployment rates than average (0.6 percent). Urban rates among the poor are slightly higher than the average (6.5 percent) but are still very low. Part-time employment explains a far greater proportion of low earnings among the poor, with 37 percent of the urban poor and 52 percent of the rural poor working less than full time. And, with the remainder of the employed poor in full-time employment, low wages (wages that are insufficient so as to keep a fully-employed person and his/her dependents out of poverty) is obviously a substantial driving force behind poverty in Mexico.

The medium to long-term solution for low earnings among the poor lies in a macroeconomic framework that promotes labor-intensive growth, so as to bring about wage increases among the working poor. A probable drag on the positive wage effects of such growth is the low human capital (in terms of level of formal education) of Mexico's workforce, particularly among the poor. Furthermore, in Mexico low human capital is not confined to older workers; in the poorest decile,

49 percent of those aged 25-40 have less-than-complete primary schooling in urban areas. In rural areas this figure rises to 70 percent. Thus the problem plagues not only Mexico's current workers, but will persist since these young and relatively uneducated workers remain in the workforce for the next 25-40 years. Training and supplemental education programs are the one identified option for addressing this issue. However, international evidence shows that the impact of training programs on long-run employment and wage prospects is mixed at best (Dar and Tzannatos 1999). Recent evaluations of Mexico's training programs indicate that while some of them, such as PROBECAT, are well targeted and hence function well in providing income transfers to the poor, they do less well at providing successfully for future employment at higher wage levels (De Ferranti and others 2000). Given ambivalent evaluation results, it is difficult to determine whether these programs should be considered for expansion without further assessment. However, for reference purposes, current costs of Mexico's training programs are approximately 2,300 pesos per person and they cover a relatively small number of people (600,000) relative to the size of the at-risk population. Development of financial markets accessible to poor regions and neighborhoods is also an essential component of the medium to long-term strategy for reducing the income vulnerability of the poorest. Financial markets can facilitate small business development and self-insurance mechanisms to help working families accumulate savings that can be used to smooth consumption during crises.

Short-term solutions include workfare programs for the unemployed, and targeted income transfers to poor families. Workfare programs, such as Mexico's PET, provide several advantages for crisis relief: (a) they are self-targeted (only those willing to work at low wages doing manual labor participate) and, hence, given sufficient funding can expand during crises, yet contract naturally as conditions improve; and (b) they generate valuable social infrastructure (though this element raises program costs substantially). Program costs are currently substantial, at 3,800 pesos per temporary job created per year. PET currently creates about 1 million jobs per year, having expanded from 660,000 in 1995. The estimated size of total unemployed poor population in 1996 was 460,000, which suggests that the program (if well targeted and if the absolute size of the poor unemployed population has not risen significantly) has expanded to cover the prevailing gap (whether this is in fact so can be determined once 1998 survey data are used to estimate a more current figure for the poor unemployed).

Transfer programs such as Mexico's Progresa can complement workfare by providing supplemental income for poor working families, as can a well-functioning negative income tax (one well targeted to the poorest income deciles).

Mexico's current negative income tax program, which reaches only the formal sector (thus excluding the bulk of families in the poorest deciles) and operates as an implicit subsidy to employers while absorbing a substantial amount of SP spending (11 billion pesos) is a prime target for reform. Estimating the number of working poor (ages 25–64 and employed full time at below-poverty wages) at 4.4 million, providing an income transfer valued at the median benefit under the current negative income tax program (142.5 pesos per month) would cost 7.5 billion pesos (less than the amount currently spent on the negative income tax program).

Increasing access to old-age pensions

There are two main objectives inherent in public efforts to reduce the vulnerability of the elderly poor: to care for the current stock of elderly poor who did not have access in the past to contributory social insurance and to reduce the future flow of current workers into that category. Options for achieving the first objective are fairly limited and include income and in-kind transfers targeted to the elderly poor. Best practice options for achieving the second, longer-term objective include a combination of instruments to facilitate the acquisition of old-age insurance among the poor, including broadening access to both public insurance (public pension plans) and self-insurance (private savings) mechanisms.

Mexico has already taken several positive steps in pension reform which lay the groundwork for extending pension access to the previously excluded. These steps include moving to a system of individual accounts with broader access to the informal sector and instituting a matching grant system (cuota social) in which the government supplements contributions made into the system to encourage workers to enroll and make regular contributions to the plan, and to subsidize benefit levels once retired. A further initiative (SUF) is designed to facilitate small business participation in the plan by providing small firms with an information package on enrolling employees in the plan and calculating contribution levels. However, as noted above, progress in actually expanding coverage of social insurance to the previously uninsured (particularly the informal sector) has been slow. An important next step is to examine why take-up of these new initiatives has been so low, followed by adjustment to reforms in order to facilitate wider participation.

Financial sector development is perhaps the most fundamental requirement for enhanced coverage in the rural sector (and to marginalized urban populations). Augmenting access to local banks would provide a facility for making contributions to the public pension system, for receiving benefits (either from the pension plan or from a targeted income-support program for the elderly poor)

and would enhance self-insurance options (savings). However, extending coverage will require a commitment by the government to dedicate resources to this endeavor; offering the existing quota social to the estimated 8.8 million workers currently working in the informal sector would imply an estimated cost of 6.9 billion pesos per year, for the old-age pension plan alone. Yet it would not provide an immediate solution to the current uncovered elderly poor, numbering 1 million in urban areas and over 1.25 million in rural areas. For these groups, as stated above, an income transfer program (noncontributory pension) is the only known option. Recently developed targeting mechanisms (such as for Progresa) might facilitate delivery of these transfers without undue administrative costs. Covering the existing gap of elderly poor, totaling 2.2 million, with a transfer of 100 pesos per month (approximately one third of the value of the current extreme poverty line), would cost 2.7 billion pesos per year.

Raising access to basic infrastructure services and housing quality

Housing quality is still low in Mexico, particularly among the rural poor, where 55 percent have no piped water, 96 percent have no piped sewerage and 29 percent have no electricity. A significant share of the urban poor also live without access to water (18 percent) and sewerage (50 percent). Expanding basic infrastructure services to service poor areas is the starting point addressing these gaps, complemented by financial sector instruments to facilitate mortgages and smallscale loans for home improvement. Housing subsidies well targeted to poor households can complement these lending facilities. While Mexico currently operates a well-funded housing credit program (FOVISSTE), it is not well-targeted to the poor and does not reach rural areas, and is thus a target for reform particularly in terms of facilitating access among the poor. Mexico's housing subsidy program (PASVP) is underfunded relative to housing needs among the poor and could be expanded. At current costs of 2,383 pesos per family covered, covering the estimated 4.8 million poor, at-risk households would cost approximately 11 billion pesos. Drawing on Chile's highly successful targeted subsidy for housing purchases, home improvements and initial connections to water, sewerage and electricity services for lessons learned and as input to designing the program's expansion is also an option to be considered for raising program effectiveness.

Water is perhaps the most basic infrastructural need currently unmet for one particular at-risk group: the isolated (largely indigenous) communities in rural areas. The uncovered population is estimated at roughly half of the population in these communities, such that there are approximately 1.3 million people currently without access to potable water. SHCP estimates costs ranging from 1,900 pesos per person to a maximum of 20,000 pesos per person to install water

service in isolated rural areas. Taking a mid-range estimate of water service installation at 10,000 per person, total costs to cover the remaining unserved population can be very roughly estimated at 13 billion pesos.

Addressing social risk among indigenous people

Looking at the facts, it is clear that extreme vulnerability in Mexico is largely synonymous with being indigenous. For each age and type of risk, the indigenous population exhibits heightened degrees of social risk. Thus, successfully reducing social risk in Mexico depends in large part on developing risk-reduction techniques that successfully meet the needs of the indigenous population. Each of the programs above thus needs to be carefully considered as to whether special modifications or, indeed alternative programs, are needed to appropriately reduce risk among the indigenous population. More detailed evidence and experience on developing such programs is available in the indigenous peoples chapter, but a general review of best practice evidence suggests that in some cases, it is possible to adapt existing best practice options under each risk category to suit indigenous communities, but in other cases entirely different models of programs and interventions are required (see indigenous peoples chapter). Community-based programs, run by indigenous community members and supported with federal, state and municipal funding, seem to exhibit higher rates of success. In addition, successful programs for indigenous peoples tend to cost more than those for the nonindigenous because of their relatively small scale, the higher cost of reaching isolated areas and the fact that they require substantially greater training components (not only for indigenous people, but for those non-indigenous government or program representatives who must learn to work within the indigenous context). In terms of what to avoid, it seems clear that any program that creates parallel government structures alongside preexisting indigenous governance mechanisms is likely to fail; the key is to work with those existing governance structures (which is difficult in practice because they are not incorporated into "mainstream" elements of government, such as state and municipal organizations). With these generalities as a point of departure, further work has to be done on developing precise options for addressing indigenous social risk in each of the key risk categories.

Problem	Size of population at-risk (coverage gap)	Social protection policy initiative	perperson	stimated co to cover gap nillion peso
1. Low ECD and pre- school coverage	ECD: 4.6 million poor children ages 0–4; Pre-school: 375,000 poor	Expand ECD services (PRONEI) to all poor children 0—4; Expand CONAFE preschool coverage to all	540	2,500
	children age 5	poor children age 5	3,510	1,300
 Pocket of low primary school attendance in rural areas 	270,000 rural poor children ages 6—12 not attending primary school	Expand CONAFE primary-school coverage to all poor	3,735	1,000
3. Low secondary school enrollment rates	1,900,000 poor youth ages 12–14 not attending lower secondary; 2,200,000 poor youth ages 15–18 not attending upper secondary	Offer secondary scholarships (PROGRESA?) to non-attending youth ages 12—14 (lower secondary), and to youth ages 15—18 (upper secondary).	3,090 3,600	5,900 7,900
4. Low earnings among the working poor	4,400,000 poor ages 25—64, employed full time	Expand/reform negative income tax (ISR negativo) to cover all fully-employed working poor ages 25–64	1,710	7,500
5. Low access to pension (income support) among elderly poor	2,250,000 elderly poor (over age 64) 8,800,000 current workers w/o	Provide minimum old-age pension to all current elderly poor Expand access to social security pension	1,200	2,600
	access to social security	system to all informal sector workers	780	6,900
6. Low housing quality among the poor	4,800,000 households	Offer subsidized housing credits to all poor households with low housing quality (PASVP)	2,383 per family	y 11,500
7. Remote villages with low access to basic infrastructure	1,300,000 people in remote villages without access to water	Install potable water service in all isolated communities currently without water	10,000 per perso (average)	n 13,000

Example 7. Appropriateness of spending level

Source: Ethiopia Public Expenditure Review 2004. Public Spending in the Social Sectors. The Emerging Challenge, Vol. 1, Report No. 29338-ET.

Note: The role of safety nets in very low income countries is debated by economists. This example is included not so much as endorsement of its particular recommendations, which some readers may disagree with, but because it clearly addresses the issue of what is affordable, considering various options and difficult choices.

What could Ethiopia spend on a safety net program?—potential public expenditure needs

6.29 The amount Ethiopia could potentially spend on a safety net for the poor is obviously extremely high, because the number of potential beneficiaries is very large, both in terms of those whose consumption is at unacceptably low levels,

even in normal years, and of the huge numbers susceptible to drought.

6.30 Clearly the solutions to this problem lie outside of the realm of safety nets: in improved productivity of labor—both in agriculture and elsewhere—in a more diversified production base, managing population pressure, and migration. But even with the best possible outcomes, there will remain unacceptably large numbers of people who will require direct transfers to avoid destitution and sometimes starvation. The graph below shows the projected number of people living below the food-poverty line (that is the level of income required to sustain basic minimum food consumption) in Ethiopia over the next 20 years at both a 3 percent and 4 percent growth rates.

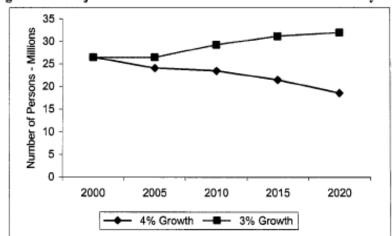


Figure 6.3: Projected Number of Persons Below the Food Poverty Line

Mission estimates based on population projections and income poverty-elasticity of growth

6.31 To provide adequate food to all of these people currently would require expenditure of about \$810 million p.a.; representing 12 percent of GDP, or about one-third of all public spending. This is clearly infeasible. Below we present projections of what it might cost to provide a range of more realistic levels of safetynet coverage.

6.32 We have defined the options in terms of the proportion of basic food requirements that might need to be provided by a safety net. Table 6.3 below shows the broad unit costs, using different program instruments, associated with providing "light" assistance (defined somewhat arbitrarily as 50 percent of the minimum food requirement of households for 4 months of the year—this corresponds roughly to the level of need faced in many years by many of the moderately poor in Ethiopia); and with more substantial, "heavy" support (providing 75 percent of minimum food needs for 8 months of the year—which corresponds roughly to the situation faced by the poorest in Ethiopia on a continuous basis, and by many additional households in bad drought years).

Table 6.3: Approximate Unit Costs of Large-Scale Transfer Programs (US\$ millions per million persons served – constant 2002 US\$ millions)

	Pure Food	Public Works			
	Distribution \a	Program \b			
'Light' Support	\$ 13.5 m.	\$16.8 m.			
[50 % of food requirement for 4 months of the year]					
'Heavy' Transfer	\$ 40.5 m	\$50.2 m.			
[75 % of food requirement for 8 months of the year]					

Notes: a/ Food distribution assumes a full requirement of 18 kg. per person per month (light support is thus 36 kg. per person annually, and 'heavy' is 108 kg.); assumes food cost of \$300/mt., and admin. costs of 25 percent;

b/ works-based programs assume same requirements, and transfer required to purchase the defined level of food/beneficiary; based on grain price of 2 Bitr /kg. and program costs of \$1 per \$1 transferred in wages. Note this is cost per beneficiary, not works participant – wage rate and days worked could be adjusted in any combination to reached the desired transfer, depending on assumed number of dependants per worker. 129

6.33 The total costs of different safety net strategies will then depend on the choices the government makes regarding: the numbers to be covered, the degree of support to be provided to them, and the choice of instrument. Below we present the costs of 3 basic scenarios (details and assumptions are shown in the accompanying box).

Scenario 1: An "aggressive" safety net strategy. This strategy attempts to provide at least some support to the bottom 20–25 percent of the population. It corresponds to a situation of persistent deep poverty (associated with 3 percent growth or less), and relatively bad luck with respect to exogenous shocks—foreseeing a major drought every 5 years; combined with Government taking a policy position that it is willing to use transfer instruments to alleviate widespread suffering. The program details are shown broadly involve providing a pure transfer to the bottom 10 percent (with the poorest 5 percent receiving a substantial amount, equivalent to 75 percent of the minimum food requirement for 8 months of the year); coupled with a sustained public works program that provides support for the second-poorest 10 percent of the population in a normal year, rising to 15 percent in bad years. Such a program might cost something in the order of US\$375 million per annum currently, rising to over \$500 million p.a. over the next decade.

Scenario 2: "Moderate" safety net strategy. This strategy involves providing limited support to the very poorest (the bottom 5 percent of the population) and a flexible Public Works Program to provide moderate levels of support (equivalent to about half of minimum household food requirements for 6 months of the year, on average to between 5–10 percent of the population in normal years, gearing up to provide more substantial support in bad years. Costs would rise from about \$230 million annually now, to around \$300 million annually by 2010.

Scenario 3: A minimalist scenario. This strategy involves a tightly restricted public safety net policy: essentially leaving poverty alleviation to growth and diversification and providing only very limited humanitarian assistance to the poorest. It assumes a declining number of absolute poor (associated with sustained growth of over 4 percent p.a.) and infrequent droughts. The program would provide free food (or cash) to the poorest 2–3 percent of the population, combined with a modest public works program, serving the next poorest 5 percent in most years and no more than 10 percent of the population on bad times. Such a program could be delivered for approximately \$135–150 million p.a.

Table 6.4: Estimated Costs of Safety Net Scenarios (Annual cost, in constant 2002 US\$ millions)

	2005	2010	2015	2020
'Aggressive' Strategy	419.8	465.9	514.4	564.6
Moderate Intervention	255.0	283.1	312.5	343.0
Minimalist	152.1	163.1	173.6	190.6

6.34 While the costs of the aggressive safety net strategy might seem excessive, it must be remembered that the potential beneficiaries that we are talking about in the case of Ethiopia are generally surviving on levels of consumption that would place them among the very poorest almost anywhere else in the world. So considering some form of transfer for them is not inconceivable. Nonetheless, given the competing claims on public expenditure, it clearly makes sense to consider a more conservative approach.

6.35 The first strategy is likely unaffordable; the \$375 million p.a. would represent 18 percent of total public expenditure and given competing needs, in terms of education, infrastructure and other essential investments, it would seem unlikely to be a rational use of public resources.

6.36 At the other end of the spectrum, the "minimalist" scenario would probably result in a level of welfare loss and human suffering that is unacceptable. Nonetheless it provides a bottom-line indication of likely needs if things go well in terms of raising consumption levels and diversifying away from dependence on rainfed foodgrains over the next two decades.

6.37 The middle scenario probably corresponds best to what is likely to be required and accords closely with the level of resources currently devoted to transfers. However given the high opportunity cost of public resources, combined with the ineffectiveness of the current arrangements, there is certainly room for improving the effectiveness and probably reducing the incremental cost of the

program.

- 6.38 Within this framework, Government and donors need to make a number of basic choices:
- (1) Forge a consensus on what the objectives of a safety net should be in Ethiopia (for example, whether to provide adequate minimum food consumption to most of those at risk, to only cover those at risk of death by starvation or just to provide a true safety net in times of drought).
- (2) To be selective of which groups (or sub-groups) within the population should be provided with support (for example, only those unable to look after themselves (such as the elderly, disabled and labor-short, female-headed households)? Or whether to continue to focus on those living in selected geographic areas?
- (3) Carefully manage the trade-off between spending on pure transfers and other poverty-reducing expenditures by using instruments that contribute to both objectives (such as employment of the poor on public works that contribute to longer-term income growth) wherever possible.
- (4) Maximize the welfare impact of each birr spent on safety net transfers (for example, time transfers—either during the year or the lifecycle— so that they have the greatest impact or use safety net spending to achieve multiple poverty-reducing objectives).

Box 9.1 Three Broad Cost Scenarios for Safety Net Spending	os for Safety	/ Net Spending										
					Free distribution of food	pootton						
		Poorest group		_	Next poorest group			Next poorest group	t group			
							Normal year	year	Worst	Worst case scenario		
				Additional			Additional		Additional			Estimated
	Population		People	population		People	population		population		People	
	affected	Food	affected	affected	Food	affected	affected	Food	affected	Food	affected	(million p.a.
	(perœnt)	provided	(millions)	(bercent)	provide d	(millions)	(percent)	provided	(beroent)	provided	(millions)	
"Aggressive" safety net strategy	5.0	75% for 8 months	4.0	5.0	50% for 4 months	40	10.0	50% for 6 months	15	Up to 75% for 8 months	8.0	5466 4466
"Moderate" safety net strategy	2.5	75% for 8 months	5.0	25	50% for 4 months	5.0	7.5	50% for 6 months	9	Up to 75% for 8 months	0.9	\$283
"Minimalist" safety net strategy	2.5	50% for 5 months	1,6				5.0	50% for 5 months	9	50% for 5 months	4.0	शिख

6.39 It is our view that given the extreme scarcity of public funds in Ethiopia, the level of spending on pure transfers should be kept to a minimum and most safety net spending directed towards works-based programs that can also finance investment in long-term assets. The fact that labor is underutilized during the nonagricultural season is an added reason for adopting an employment-based transfer scheme. Furthermore, Ethiopia is fortunate to still have a high level of investment in social capital in many areas. One manifestation of this is the fact that communities or extended families tend to look after many of the elderly, the infirm and the disabled. As a result there are few very poor outside of households with able-bodied members that may be targeted by public works programs.

6.40 Finally we note, however, the extreme levels of malnutrition compared with other countries and believe that the safety net strategy should address the needs of malnourished children under 30 months, given the extreme long-term damage that can be avoided by selective nutritional interventions at this stage.

Example 8. Appropriateness of spending level

Source: Grosh, del Ninno, Tesliuc, and Ouerghi (2008) *For Promotion and Protection. The Design and Implementation of Effective Safety Nets.* Washington, DC: World Bank, Chapter 9, pp. 401-403.

The first step in determining what is affordable is to estimate what a program might cost. Table 9.8 shows the illustrative costing exercise done in Pakistan as part of the development of the social protection strategy (Government of Pakistan 2007). It sought to put options on the table for a consultation process intended to garner support to expand the safety net system. The safety net part of the strategy suggested an increase in spending for targeted safety nets program from PRs 11.3 billion in 2004 (0.2 percent of GDP) to PRs 35.8 billion in 2010 (0.63 percent of GDP), resulting in an increase in coverage of the programs from 10 percent of the population in 2004 to 24 percent by 2010, or from 2.6 to 6.2 million households. The proposed increase would bring Pakistan more closely in line with average spending in the region. Taking into account the population's poverty and vulnerability profile, the strategy proposed the introduction of a new CCT program, for which part of the unconditional cash transfer spending would be reoriented, and new workfare programs that would help the poorest households earn higher and more stable incomes. Some of the likely benefits of the proposed reform would include higher and more stable incomes for poor and vulnerable households; enhanced food security (diversity, quality, and quantity of food consumed); significant increases in school enrollment, attendance, and completion; reduced levels of child labor; lower levels of rural to urban migration; a more vibrant rural economy; and moderately lower income inequality. In

assessing the financial sustainability of the proposed strategy, the authors carefully considered different alternatives for creating the fiscal space for needed safety net programs. Although the proposed increase in targeted program spending is substantial, it starts from a low base: combined spending for social insurance and assistance is less than 0.5 percent GDP in fiscal 2003/04 and only 3 percent of pro-poor expenditure as set out in the Poverty Reduction Strategy Paper. The overall increase in spending will account for only a small fraction of the agreed increase in pro-poor spending, from 4.25 in 2005 to 6.49 percent in 2010. Part of the cost of the strategy will be financed by eliminating unnecessary programs and waste and by reorienting some programs.

TABLE 9.8 Estimated Annual Costs and Expected Coverage of a Proposed Safety Net Reform Package, Pakistan, 2006–10

	Current situat	ion (FY2003/04)	Targets: minim	um requirement
Programs	Cost (billion PRs)	Beneficiaries (thousands of households)	Cost (billion PRs)	Beneficiaries (thousand of households)
Cash transfers	10.0	2,069	18.0	3,150
Zakat (almsgiving) Program (cash and other transfers)	5.9	800	5.9	800
Food Support Program	4.0	1,250	2.2	700
Child Support Program (CCT program)	n.a.	n.a.	8.8	1,300
Pilots, such as for child and bonded labor programs	0.1	10	1.1	350
Public works programs	n.a.	n.a.	15.0	2,110
School feeding programs	0.7	500	1.6	800
Social care services (people with disabilities, vulnerable children)	0.6	50	1.2	100
Total social assistance	11.3	2,610	35.8	6,160

SOURCE: Government of Pakistan 2007.

NOTE: n.a. = not applicable.

Example 9. Coverage: Social Assistance

Source: Honduras Public Expenditure Review 2007, Vol. 1, Report No. 39251-HO.

98. Relevance and Scope. Honduras' social protection programs seek to address the main risks affecting the poor and, therefore, are generally relevant. For all the key risks that have been identified there are several programs that seek to address them. On the other hand, the impact of the social assistance programs does not appear commensurate to the amount of resources spent, as the number of poor in a situation of risk remains high. Indeed, the allocation of resources is biased in favor of subsidies that are not well targeted on the poor. As shown in Table 18, 16 percent of social assistance spending is on subsidies on electricity and transport, most of which do not benefit the poor (see targeting below). Children aged 0-5 years, who represent the most vulnerable group, receive a

very modest share of total resources. Seniors and the indigenous and black population also appear to be at a disadvantage, considering the limited scope of social insurance programs (pension and medical insurance).

Table 18. Distribution of Social Assistance Resources, by Age Group, 2005 at

Age Group	Population At Risk ('000)	% of Total	Annual Cost US\$ 000 a/	% of Resources
0-5	701	18	31,640	12.8
6-17	1,069	27	64,622	26.1
18-64	1,560	39	8,033	3.2
65+	130	3	1,134	0.5
Indigenous and black population	490	12	7,935	3.2
Households (excl. subsidies)			94,211	38.0
Direct subsidies b/			40,053	16.2
Total			247,628	100.0

Note: ^{a/} Excludes social insurance. ^{b/} Electricity subsidies (300kwh and bono 80) and Transport Subsides (buses and student youcher).

Source: Table 8.36.

99. Coverage. The coverage of some programs that are important for the poor is limited, leaving vulnerable a large number of people. For instance, there are 200,000 poor children under age 5 that suffer from chronic malnutrition, but the maternal/infant programs managed through the Family Allowance Program (PRAF) and the National Institute for Children and Family (IHNFA) together reach less than 100,000 children. An apparent exception is the Healthy School Program that reaches over one million children with school lunches and medical attention. Nonetheless, 500,000 children that do not attend preprimary and the 200,000 children that do not attend primary school do not benefit from that program. The coverage of IHNFA programs are very limited, as the institution's limited resources are almost entirely absorbed by personnel costs. Similarly, vocational training courses offered by the National Vocational Training Institute (INFOP) have a limited impact, reaching less than 3 percent of the labor force. Housing programs only reach 5,000 of the 200,000 households reporting over-crowded conditions. Finally, most of the subsidies on basic services do not reach the poor households because 280,000 of them do not have safe water and 470,000 do not have electricity. 100. Honduras has low social insurance coverage. The social security system covers about 18 percent of the population, and less than 6 percent of Honduras's seniors have a pension. Health insurance coverage is similarly low, and 13 percent of the population (900,000) does not have adequate access to health services.

Example 10. Coverage: ADePT SP tables

Source: Leite and Tesliuc (2009) "Quick-But-Not-Dirty Policy Analysis Using ADePT." Presentation for Hands-on BBL with LAC SP Team, March 5, Washington, DC: World Bank.

	Ç	uintiles of p	er capita Fu	ıll income: p	re UMB tra	nsfer, net	Do	verty Status	
			of eac	h SP transf	er		10	verty Status	
	Total	Q1	Q2	Q3	Q4	Q5	XP	MP	NP
All social protection	47.7	73.8	55.0	48.2	30.4	31.2	64.1	44.6	31.5
All social insurance	37.0	57.1	38.5	38.9	23.9	26.7	49.4	34.2	25.5
Montlhy pensions	37.0	57.1	38.5	38.9	23.9	26.7	49.4	34.2	25.5
All labor market programs	0.1	0.1	0.0	0.1	0.0	0.0	0.0	0.1	0.0
Monthly unemployment benefits	0.1	0.1	0.0	0.1	0.0	0.0	0.0	0.1	0.0
All social assistance	18.7	39.0	21.8	14.9	11.4	6.6	32.1	20.1	8.9
Monthly UMB	16.8	37.1	18.3	13.2	10.0	5.5	30.1	17.4	7.6
Monthly MSB	4.1	3.7	3.2	9.1	2.1	2.8	3.3	7.5	2.4

Notes:

Program coverage is the portion of population in each group that receives the transfer.

Specifically, coverage is: (Number of individuals in the group who live in a household where at least one member receives the transfer)/(Number of individuals in the Program coverage is calculated setting as expansion factor the household expansion factor multiplied by the household size.

Figure 2. Coverage of different SP programs: Using post-transfer per capita income

-		Quintile	s of per capi	ta Full inco	me, post tra	nsfer	Po	verty Status	
	Total	Q1	Q2	Q3	Q4	Q5	XP	MP	NP
All social protection	47.7	51.0	48.4	45.4	47.0	46.8	51.3	44.3	47.7
All social insurance	37.0	31.4	31.4	38.4	41.0	42.9	31.9	33.3	42.9
Montlhy pensions	37.0	31.4	31.4	38.4	41.0	42.9	31.9	33.3	42.9
All labor market programs	0.1	0.1	0.0	0.1	0.0	0.0	0.0	0.1	0.0
Monthly unemployment benefits	0.1	0.1	0.0	0.1	0.0	0.0	0.0	0.1	0.0
All social assistance	18.7	31.5	25.6	17.5	12.3	6.8	31.2	20.4	9.5
Monthly UMB	16.8	29.8	24.3	13.6	10.8	5.5	29.2	18.2	7.8
Monthly MSB	4.1	2.6	4.1	8.8	2.3	2.9	3.2	6.9	2.9

Notes:

Program coverage is the portion of population in each group that receives the transfer.

Specifically, coverage is: (Number of individuals in the group who live in a household where at least one member receives the transfer)/(Number of individuals in the Program coverage is calculated setting as expansion factor the household expansion factor multiplied by the household size.

Example 11. Coverage and effectiveness

Source: Costa Rica Public Expenditure Review 2008. Enhancing the Efficiency of Expenditures, Report No. 40774-CR.

2.67 Especially since many of the social protection programs claim to support poor or vulnerable groups, an evaluation of the extent to which the benefits flow to these groups is essential. In addition, it is useful to see the extent to which benefits from social insurance programs such as the contributive pensions programs are distributed among the population. The target groups of interest selected for this analysis include poverty groups, gender, the young, the elderly, and the rural population. Given the great diversity of programs and the lack of reliable information for many of them—especially the very small ones—the analysis on the distribution of benefits was limited to the largest programs in terms of expenditures. The results are presented below. 2.68 The poor population (23 percent) receives only about 5 percent of the benefits of contributive pensions (Table 2.21). The extreme poor receive just one percent as opposed to their 6 percent population share. By their nature, contributive pension benefits—a social insurance scheme—would be skewed towards those who made contributions.

Table 2.21: Coverage of Selected Social Protection Programs. 2006

(percentage of total)

		Poverty	age of ion		< 18	> 64	
	Extreme Poor	Poor	Non- Poor	Women	year- olds	year- olds	Rural
Share in Population	6.0	22.4	77.2	50.7	33.6	6.5	41.0
Contributive Pensions							
No. of Beneficiaries	1.7	14.1	85.9	49.2	1.3	62.1	27.0
RIVM	1.9	16.4	83.6	45.2	1.6	66.4	29.4
RPN	0.6	4.7	95.3	65.5	-	45.1	17.5
Value of Benefits (\$)	0.6	5.6	94.4	48.7	0.4	50.0	18.5
RIVM	0.8	8.4	91.6	40.5	0.7	57.7	22.1
RPN	0.1	1.0	99.0	62.4	-	37.0	12.3
Social Promotion and							
Assistance							
Childcare Centers	15.1	44.9	55.1	52.6	91.1	0.0	65.6
IMAS	14.2	39.4	60.6	73.6	12.2	14.5	51.4
Non-cash Programs	5.6	25.8	74.2	67.4	13.6	7.3	45.8
Cash programs	21.2	50.5	49.5	78.5	11.0	20.3	56.0
Scholarship Programs	8.2	33.5	66.5	56.0	65.8	0.0	50.4
FONABE	12.2	40.0	60.0	54.0	86.4	0.0	60.3
Others	3.2	25.6	74.4	58.5	40.0	0.0	38.1
School Lunch	10.5	36.7	63.3	47.8	98.2	0.0	54.8
School Subsidy	14.9	49.7	50.3	50.1	98.9	0.0	62.3
School Transport	10.3	36.2	63.8	53.0	91.0	0.0	92.2
Housing Subsidy	5.9	22.2	77.8	50.8	36.2	4.7	46.2
Non-contrib. Pensions	23.5	55.2	44.8	58.6	2.0	69.7	58.7

Source: World Bank Staff calculations based on the 2006 EHPM household survey, INEC.

2.69 Since most of the poor did not make contributions and, in any case, made smaller contributions than the non-poor, it is no surprise to find that the poor make up only 14 percent of beneficiaries and 5 percent of the value of benefits. If the pension scheme were self-financing one could argue that this is a fair outcome. However, even the RIVM is partially subsidized by the government, while in the RPN pension system, individual contributions accounted for only 14 percent of payments in 2006 (Table 2.19). Even after taking into account that the government, as employer, should be contributing to the system, the implicit government subsidy amounted to 73 percent of payments in 2006, making RPN pensions a highly regressive government intervention. Restricting new entrants to the RPN pensions is an important first step. What is needed now are politically acceptable ways to gradually reduce benefits in order to reduce the gross inequity of the RPN pension system. At a minimum calls to increase benefits, such as the recent reinstatement of certain benefits for teachers, should be strongly resisted.

2.70 In contrast, almost all the major social promotion and assistance programs are progressive, given that the share of benefits of the poor and extreme poor are higher than their share in the population.57 For the poor the non-contributive pensions are the most progressive of the major programs, followed by the IMAS cash program (50.5 percent) the school subsidy (49.7 percent), and

childcare centers (44.9 percent). One major social assistance program, the housing subsidy, is neutral in its redistributive effect.

2.71 The above results on the coverage of the poor are consistent with the results of the distributive impact analysis carried out for selected social protection programs (Table 2.22). All the six programs analyzed showed that the population of the poorest two deciles received a disproportionate share of benefits. As before, the non-contributive pension program, jointly with the cash transfer program, was the most redistributive, with 59 percent of benefits accruing to the poorest two deciles. Childcare centers and school lunch programs followed with 48 percent and 38 percent of benefits respectively accruing which were almost all found to be strongly negative. Encouragingly, the quasi-Gini improved between 1988 and 2004 for all programs, going from slightly regressive to strongly progressive in the case of the housing and water interventions. For the six programs as a whole, the quasi-Gini increased from -0.175 to -0.409.

Table 2.22: Distributive Impact of Selected Social Protection Programs, 2004

				Non-	Cash Transfers to	Housing	
	School	Childcare	Work	Contributive	Vulnerable	&	
	Lunch	Centers	Regulation	Pension	Groups	Water	Total
For 2004 ^a	100%	100%	100%	100%	100%	100%	100%
Decile 01	19%	31%	8%	46%	43%	18%	32%
Decile 02	19%	17%	13%	13%	11%	15%	14%
Decile 03	14%	17%	13%	10%	13%	12%	12%
Decile 04	12%	7%	12%	9%	7%	13%	10%
Decile 05	10%	10%	14%	14%	4%	10%	9%
Decile 06	7%	4%	12%	2%	4%	11%	6%
Decile 07	5%	8%	12%	2%	12%	10%	8%
Decile 08	6%	5%	10%	4%	0%	7%	4%
Decile 09	4%	0%	4%	1%	0%	3%	2%
Decile 10	4%	0%	2%	0%	6%	0%	2%
Quasi-Gini							
1988	-0.250	-0.433	-0.112	-0.455	-0.213	0.090	-0.175
2004	-0.314	-0.469	-0.123	-0.569	-0.471	-0.279	-0.409

a. Household decile classification, with the first decile being the poorest.

Source: World Bank Staff estimates based on INEC data using the methodology of Trejos and Saenz (2006) and Trejos (2007).

2.72 The effectiveness of social programs is often measured by estimating the coverage of the program within the target population as well as the leakage or the amount of resources that did not go to the target populations. SPA programs in Costa Rica do not generate the necessary information to estimate these parameters. Fortunately, the EHPM has incorporated questions about some SPA programs in selected years. Using the EHPM for 1999 and 2006, efficiency parameters were estimated for the four biggest SPA programs: Childcare Centers (CEN-CINAI), School Lunch, Non-Contributive Pensions and the Family Housing Subsidy. The results are illustrated in Table 2.23.

Excluded target pop

Leakages

61.1

51.7

49.6

Table 2.23: Coverage, Exclusions and Leakages for Selected Social Protection Programs, 1999 and 2006

(percent) Non-Childcare Family Housing School Lunch Contributive Centers Subsidy Pensions Program ==> Unemployed, Families 5 to 7 year-< 7 year-olds older than 60 & without own olds students Target Population => no pension house or shacks 1999 1999 2006 2006 1999 2006 1999 2006 84.4 Potential coverage 18.4 15.3 84.9 103.1 84.2 70.8 80.5 14.2 10.3 54.3 66.1 40.5 39.5 38.9 42.4 Effective coverage 89.7 45.7 59.5 60.5 57.6

34.7

33.9

34.3

22.8

22.2

- Total population beneficiaries/target population.
- Target population beneficiaries/target population.
- Non-target population beneficiaries/total beneficiaries.

85.8

17.5

Source: World Bank staff calculations based on the 1999 and 2006 EHPM household surveys.

21.8

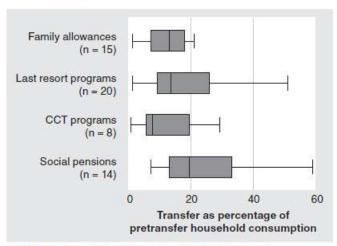
2.73 Assuming that the programs aimed to target all the poorest 40 percent of the population, the school lunch program proved to have the highest coverage, from 54.3 percent in 1999 to 66.1 percent in 2007. Childcare centers have the lowest effective coverage, falling from 14.2 percent in 1999 to 10.3 percent in 2006. However, even if childcare expenditures had been perfectly targeted they would not have been able to cover more than 15.3 percent of the population in 2006. In contrast, perfect targeting during 2006 would have allowed the government to reach all of the school lunch target population, 70.8 percent of the non-contributive pension population, and 84.4 percent of the family housing subsidy population.

2.74 In terms of the share of benefits going to the non-poor, leakages in the housing subsidy and school lunch programs are the highest, at 49.6 and 33.9 percent respectively. While it may be logistically difficult to separate school lunch beneficiaries and doing so could be associated with a social stigma, this is not true for the housing subsidy, leading one to question if the goal of this program is to provide housing for the middle class, rather than just the poor. The next chapter delves into greater detail in these and other issues for two social protection programs: school lunches and childcare centers.

Example 12. Adequacy of benefit level

Source: Grosh, del Ninno, Tesliuc, and Ouerghi (2008) For Protection and Promotion. The Design and Implementation of Effective Safety Nets, Washington, DC: World Bank.

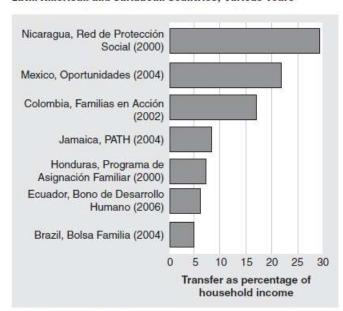
FIGURE 5.2 Generosity of Selected Safety Net Programs, Europe and Central Asia and Latin America and the Caribbean, Selected Years, 2001–4



SOURCES: Tesliuc and others forthcoming; World Bank forthcoming.

NOTE: n = number of programs. The median value is the line inside the shaded rectangle, the 25th percentile is the lower value of the shaded rectangle, and the 75th percentile is the upper value of the shaded rectangle. Programs whose generosity is 1.5 times more than, or less than, the median were excluded.

FIGURE 5.3 Generosity of Selected CCT Programs in Selected Latin American and Caribbean Countries, Various Years



SOURCE: Based on World Bank forthcoming.

NOTE: The unit used for Brazil is the transfer as a percentage of pretransfer household income.

TABLE 5.1 Generosity of Selected Cash Transfer Programs in Selected East European and Central Asian Countries, Selected Years 2001–4

	Social pe progra		Family all progra		Last re progra		Other pro	grams
Country and year	Poorest quintile	Total	Poorest quintile	Total	Poorest quintile	Total	Poorest quintile	Total
	Tr	ansfer a	s a percenta	ige of pre	transfer ho	usehold c	onsumption	
Albania, 2002	9	16	n.a.	n.a.	15	11	14	16
Armenia, 2003	n.a.	n.a.	26	18	26	18	24	18
Azerbaijan, 2003	15	14	3	2	3	2	8	6
Belarus, 2002	45	26	20	13	21	14	15	9
Bosnia & Herzegovina, 2001	89	40	n.a.	n.a.	27	16	58	30
Bulgaria, 2003	13	8	17	10	24	13	13	9
Estonia, 2004	n.a.	n.a.	25	12	45	34	28	13
Georgia, 2002	40	23	n.a.	n.a.	122	44	43	24
Hungary, 2002	12	12	40	21	24	19	41	22
Kazakhstan, 2003	n.a.	n.a.	n.a.	n.a.	15	11	27	19
Kyrgyz Republic, 2003	n.a.	n.a.	n.a.	n.a.	12	7	2	3
Lithuania, 2003	43	33	22	13	25	21	28	17
Macedonia, FYR, 2003	n.a.	n.a.	53	51	53	51	111	77
Moldova, 2003	18	13	13	9	13	9	18	15
Poland, 2004	65	59	18	13	36	31	31	28
Romania, 2003	21	16	13	7	35	31	18	11
Russian Fed., 2002	32	23	6	3	5	3	16	14
Serbia & Montenegro, 2003	53	41	13	18	12	9	29	32
Tajikistan, 2003	3	7	1	1	2	1	5	7
Uzbekistan, 2003	n.a.	n.a.	28	16	22	13	19	11
Median	27	20	18	13	23	14	22	16

SOURCE: Based on Tesliuc and others forthcoming.

NOTE: n.a. = not applicable. Generosity is defined as the ratio of a transfer to household consumption. Consumption is current consumption (less expenditures on durables, housing, and health.

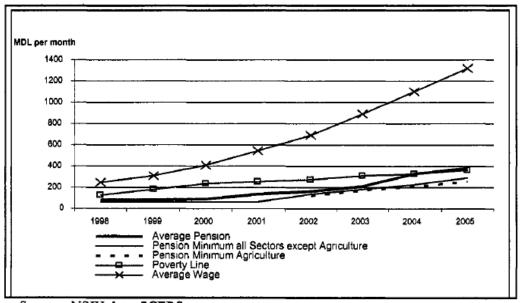
Example 13. Adequacy of benefit level

Source: Republic of Moldova Improving Public Expenditure Efficiency for Growth and Poverty Reduction 2007, Report No. 37933-MD.

7.4 In the 1990's, the social insurance system was in crisis. In 1998 and 1999, most of the pension benefits remained unpaid and, only 40% of the elderly entitled to pension received some benefits. In such conditions, pensions clearly could not be increased. In 2000, the average pension represented no more than 22% of the average wage and 38% of the poverty line. The recent pension increases thus correspond to a logical recuperation of meaningful pension income levels. With an average pension just above the poverty line, the levels obtained at the end of 2005 still do not appear particularly high.

7.5 Figure 7.1 compares the average pension and the minimum pensions to the average wage and the poverty line. There are several types of minimum pensions in Moldova, only the 2 principal ones are represented in Figure 7.1. One is paid to the old-age retirees from the agricultural sector and the other is paid to the old-age retirees from the non-agricultural sector. The other minimum pension is paid to the disabled and the survivors. They are lower than these two levels because the insured have contributed for shorter periods, or because the survivors are only entitled to a portion of the deceased insured pension (50% in the case of widows). In the general system (excluding privileged pensions) disabled pensions are on average 15% lower than old-age pensions, and survivor pensions are 39% lower.

Figure 7.1: Pension Benefits Levels in comparison to the Average Wage and the Poverty Line



Sources: NSIH data, SCERS poverty report.

7.6 Social assistance programs, by contrast, aim to alleviate current poverty. They are direct or indirect transfers mostly funded by the State budget. In Moldova, this aid consists of monthly benefits, social services and subsidies (primarily in energy and housing) to specific vulnerable groups. Ideally, the recipients of these transfers should be only poor households, and a reform to improve the targeting is under study.

7.7 The average pension in 2005 was more or less equal to the poverty line, but about 17.2% of the current pensions were still below such level, at the beginning of 2006. The increase of the pension will certainly improve many pensioners welfare situation but may not lift all the pensioners out of poverty. Poor

pensioners tend to live in extended rural families and eliminating poverty among them would require higher transfers to push all their families' members out of poverty. Such action is clearly relevant to social assistance programs. Some attention could be given, however, to the minimum pension paid to the disabled and the survivors. Simulations show that most of the pensions could be in 2009 above the poverty line, but still 4.4% could remain under. About 78% of the recipients of these very little pensions are working-age permanent disabled persons. As this population is usually among the groups with high risk of poverty, revising the minimum benefits paid to the disabled and survivors seems advisable.

7.8 Since 2001, pension benefits have been increased through two types of interventions. Most of the increases have been done through general pension increases. In 2002 and 2004, however, the increases were obtained through the revaluation of the pensions rights associated to the years worked before 1998. This choice probably reflects concerns about the low level of pension income at retirement.

7.9 Reassessing pension rights in order to increase pension, similar to exercises conducted in 2002 and 2004, is not efficient or transparent. It leads to cumbersome recalculations of pension benefits, and pension increases that vary across recipients. Given these inconveniences, policymakers' choice has probably been motivated by the following additional consideration, namely the change in pension formula. Thus, besides increasing the level of current pensions, the recalculation of the pre-1998 pension rights leads also to the increase of the levels of pension at retirement, so the measure also raises future retirees' pensions.

7.10 Despite these measures, pensions at retirement are still rather low in comparison to the current wages. Current retirees (about 30,000 persons retire per year) are also likely still dissatisfied with the level of pension income at retirement. First, the disparity of pension income among the new pensioners is large (see Figure 7.2). Second, replacement rates (the ratio between pension and the retiree's income at the end of his/her working period) are very low for some pensioners' categories.

7.11 The income drop is particularly high for the retirees of the manufacturing sector. Estimates show that, in 2006, pension income at retirement could replace just 22% of their last income. Estimates also indicate that this replacement rate could fall further to as low as 19.3% in 2008. The reason of the large income drop at retirement is that, in the calculation of the pension rights earned after

1998, workers' wages are not adjusted in the computation of the average wage. Table 7.1 illustrates this point. It compares, depending on different rates of wage growth, the average wage and the pension obtained by new retirees. The results indicate that in a context of modest wage growth of 2 percent per year, for example, the average wage on which the pension is calculated represents 69.8% of the last wage. Pension replaces 37.7% of the last income and given that pensions are partially indexed to the nominal wage growth, the average replacement rate during the overall retirement period is equal to 40%. This replacement rate is comparable to international standards. Replacement rates significantly decrease, however, in a context of strong wage growth because the wages earned at the beginning of the working career pulls down the overall average. With a nominal wage of 8 percent per year, the replacement rate at retirement drops to 17.4%.

Table 7.1: Average Wage and Replacement Rates

Nominal wage growth	Average computed wage	Replacement rate at retirement	Average replacement rate over the retirement period
2.0	69.8	37.7	40.0
4.0	51.5	27.8	31.4
6.0	39.9	21.5	25.9
8.0	32.2	17.4	22.3
10.0	26.9	14.5	19.8
15.0	19.1	10.3	16.6

Note: Average wage and replacement rate at retirement computed for a contributory period of 40 years, average replacement rate computed over a retirement period of 25 years, assuming real wage growth equal to half of the nominal wage growth.

Sources: NSIH data

7.12 Because wages have increased rapidly since 1998 (by about 25% per year), the average wage computed for pension since 1998 has fallen sharply in relation to the current wage. It was of around 69% in 2002, it could be at 48% in 2008. Without changes in the computation of the average wage in the pension formula, replacement rates at retirement will keep falling as a result.

7.13 If economic growth is sustained, and wages keep rising, it is doubtful that such an outcome receives political and social support. Replacement rates can be rather low, but the gap between the system implicit financial return and the average return of other private savings opportunities cannot be too large. Policy makers should, therefore, analyze what upgrading strategy would be the best for Moldova. To be fiscally sound, the envisaged changes must affect only the new generations of pensioners, so the upgrade of the system increases pension

expenditures, but gradually. The size of the upgrade depends, moreover, on the system's capacity to collect revenues. This issue and the overall fiscal impact of upgrading the system are analyzed in the next sections.

Example 14. Adequacy of benefit level

Source: World Bank (2009) IBRD Program Document for a Proposed Loan to Romania for a First Development Policy Loan, Draft, May 11, Washington, DC: World Bank.

Poverty Line

Poverty Gap

Poverty Gap

Remaining Poverty Gap

2004

2005

Poverty Gap covered by SA transfers

Poverty Gap

Poverty Gap covered by social assistance cash transfers

Figure 6. Effectiveness of Non-Contributory Social Benefits

Example 15. Adequacy of benefit level

For a more complex example, in which ex-ante simulations are done to examine the effects of alternate benefit levels, see Bourguignon, Ferreira and Leite (2003) "Conditional Cash Transfers, Schooling and Child Labor: Micro-Simulating Bolsa Escola," available at http://ideas.repec.org/p/del/abcdef/2003-07.html

Example 16. Incidence of spending

Source: Tesliuc (2003) "Social Risk Management", Annex 8.1. In Kyrgyz Republic Poverty Assessment. Washington, D.C.: World Bank.

Modeling the behavioral response of households to public transfers

In this annex we present a model for estimating the propensity to consume out of social protection transfers. The reduced-form equation is similar to a typical consumption regression, except that per capita consumption is expressed in Soms (and not in the natural logarithm), and on the right hand side we add a term representing "per capita social protection transfers." The coefficient of this term shows by how many Soms per capita consumption will increase when the per capita social protection transfer will increase by 1 Som.

To test the sensitivity of our estimator to various specifications of the regression, we run four models, with and without other household characteristics as controls and with and without rayon fixed effects. We obtain an estimated marginal propensity to consume out of transfers, within the range of 0.38–0.60, with a naïve estimate of 0.5, and a mean estimator of around 0.5. A marginal propensity to consume out of the social protection transfer of 0.5 means that with every 100 Soms in per capita social protection transfers, household per capita consumption will increase by 50 Soms. Similarly, a 100 Soms reduction in per capita social protection transfers will reduce per capita consumption by 50 Soms. This empirical finding is compatible with the economic model of household behavior: that households will change their behavior if public transfers were discontinued by taking on more work or tapping private transfers, etc. The magnitude of the effect is similar to findings in other countries.

The statistical estimation of a zero-transfer counterfactual world may be subject to potential biases, in case it serves as proxy for omitted or unobservable household characteristics. However, the larger share of transfers are pensions and privileges (93 percent of total social protection transfers recorded in the survey), transfers that are exogenously determined from current non-transfer income and, arguably, per capita consumption. The endogeneity is a serious concern in the case of the UMB. By lumping all transfers together, the model uses a similar propensity to consume for UMB as for pensions and privileges. Potential improvements to the model, such as estimating different marginal propensities for different types of transfers or socioeconomic groups were not considered at this stage.

		-					~				~				4	
Regression Model	8	OLS, rayon fixed effects	ed effects		3	OLS, rayon fixed effects	fixed effect	ts.		Ī	01.5			0	SIO	
	Coeff	Sdt. Err.	-	<u>7</u>	Coeff	Sdt.Em.	-	ž	Coeff	Sdt Em.	-	ž	Coeff	Std. Err.	-	ž
Dependent variable		Per capita consumption	reumption			Per capita consumption	insumption			Per capita (Percapita consumption			Per capita consumption	notromen	
Hauseholdsize	-744	ĸ	-13.48	000									-757	К	-1386	000
Dependencyratio	-720	8	4.16	000									404	19	-6.02	000
Female head	4	189	-2.17	0.03									88	197	-0.28	0.78
Education fithehousehold head																
High education (ornitted)																
Paraprofessional	-1453	737	-6.26	000									-1348	244	-552	000
Completesecondary	-2409	-235	-1023	000									-2476	246	-10.08	000
homplete secondary	-2516	411	-6.12	000									-3060	429	-480	000
Primary	-2347	461	-5.09	000									-2013	485	-4.15	000
Belowpirmary	908-	119	-132	0.19									410	634	-0.65	052
Main in come source																
Wage																
Business	-236	304	-0.74	0.46									-974	300	-3.25	000
Farm	1/9-	350	-192	9000									-732	295	-2.48	100
Plot	-965	387	-2.47	100									-1246	354	-352	000
Pension	-1200	586	470	000									-2280	787	-794	000
Stipend	-5522	7887	-192	90'0									-6884	3077	-224	0.03
a	-1570	3360	-0,67	150									-2042	2513	-081	0.42
Other	979	624	-101	031									-640	630	-102	031
Urban	-997	368	-271	100									-1013	95	-5.18	000
Per capita social protection transfers	0.38	900	829	000	0.50	0.04	13.15	000	0.45	900	929	000	09.0	0.04	14.66	000
Constant	14417	377	38.29	000	26.78	9154	83.87	000	14935	352	42.46	000	7569	702	7439	000
Nr. Obs	7857				7857				7857				7857			
Adi R-squred	0.2674				22200								20000			

We tark as "mean" marginal properaty to consume out of social protection in come 50 percent. To estimate the counterfactual consumption (in the absence of social protection transfers), we deduct from the current consumption 50% of the transfers.

While this estimate is not precise, the results presented in the paper are robust with regard to the choice of a different marginal propensity to consume. The following tables present the main results reported in the chapter under 0 percent; 50 percent and 100 percent marginal propensity to consume out of social protection transfers. As presented in tables A8.1-2–A8.1-4, the assessment of the inequality- or poverty-reducing potential of the UMB, social allowances, subsidies or privileges is found be robust to the choice of this parameter. The results tend to differ in the case of pensions, which are found substantially more progressive under the hypothesis of 100 percent marginal propensity to consume, and regressive under the assumption that they are crowding out other transfers or forgone incomes.

	iac wai conse	amption (pe	rcent)			
Quintiles	Poorest	2	3	4	Richest	Total
Based on		Cun	rent (post trar	nsfer) consum _i	ption	
Pension	10	13	16	24	36	100
Scholarship	14	6	14	29	38	100
Other social insurance	10	8	20	11	52	100
Unified monthly benefit	51	23	12	9	6	100
Privileges	5	3	8	20	64	100
Total social protection	11	13	15	23	37	100
Based on		Consumption-	50 percent	t of social prot	ection transfers	
Pension	18	18	19	21	23	100
Scholarship	16	2	14	34	34	100
Other social insurance	17	1	22	12	49	100
Unified monthly benefit	54	20	13	7	6	100
Privileges	9	6	17	11	57	100
Total social protection	19	17	19	20	25	100
						contin

Table A8.1-2 continu	cu .					
Quintiles	Poorest	2	3	4	Richest	Total
Based on		Consumptio	n—100 percer	it of social prot	tection transfers	
Pension	40	17	12	16	16	100
Scholarship	16	4	11	35	33	100
Other social insurance	16	9	17	15	43	100
Unified monthly benefit	53	22	10	9	6	100
Privileges	28	4	44	8	16	100
Total social protection	39	16	14	15	16	100

continued

Table A8.1-3: Marginal benefit incidence analysis: changes in the incidence of the benefit under alternative counterfactual consumption (percent)

benefit under alterna					ilduelice	or the
Quintiles based on curren	t (post transfe	r) consumption				
			Cons	umption qui	intile	
	Total	Poorest	2	3	4	richest
Average distribution of benefic	ciaries, by quinti	le (share of benefici	iaries in a giv	en quintile in to	ital beneficiai	ies)
Pension	100	19	20	20	20	20
Scholarship	100	10	8	27	14	40
Other social insurance	100	11	5	22	15	47
Unified monthly benefits	100	47	21	12	13	6
Privileges	100	22	14	13	21	31
Marginal distribution of benef	ficiaries, by quint	tile (share of benefic	ciaries in a gi	ven quintile for	a given incre	ase/decrease
Pension	100	18	20	20	21	21
Scholarship	100	12	13	28	15	32
Other social insurance	100	13	5	21	13	48
Unified monthly benefits	100	38	22	13	17	11
Privileges	100	27	20	11	19	24
Quintiles based on consun	nption less 50	percent of social	protection	transfers		
			Cons	umption qui	intile	
	Total	Poorest	2	3	4	richest
Average distribution of benefic		le (share of benefici			ital beneficiai	
Pension	100	25	20	19	18	17
Scholarship	100	13	2	25	12	37
Other social insurance	100	14	2	23	16	46
Unified monthly benefits	100	46	22	14	11	6
Privileges	100	27	14	12	21	24
Marginal distribution of benef		tile (share of benefit	ciaries in a gi	ven quintile for	a given inae	ase/decrease
Pension	100	23	20	20	19	18
Scholarship	100	15	4	33	21	26
Other social insurance	100	16	2	22	14	47
Unified monthly benefits	100	37	22	15	14	11
Privileges	100	32	15	13	17	23
Quintiles based on consun	nption less 10	percent of social	protection	transfers		
			Cons	umption qui	intile	
	Total	Poorest	2	3	4	richest
Average distribution of benefic	ciaries, by quinti	le (share of benefici	iaries in a giv	en quintile in to	ital beneficiai	ries)
Pension	100	32	22	16	16	14
Scholarship	100	13	4	23	24	37
Other social insurance	100	10	11	19	17	44
Unified monthly benefits	100	44	26	11	13	6
Privileges	100	34	12	10	18	26

Table A8.1-3 continued	1					
Quintiles based on consum	ption less 10	percent of social	protection	transfers		
			Cons	umption qui	intile	
	Total	Poorest	2	3	4	richest
Marginal distribution of benefi	ciaries, by quint	ile (share of benefi	ciaries in a gi	ven quintile for	a given inae	ase/decrease
Pension	100	30	21	17	17	15
Scholarship	100	17	6	31	22	24
Other social insurance	100	12	11	18	15	45
Unified monthly benefits	100	36	25	12	16	11
Privileges	100	36	15	10	16	22

impact under altern	-				poverty re	auction
	Coverage	of the poor	Targeti	ng the poor	Adequac	y of benefit
	Total	Extreme	Total	Extreme	Total	Extreme
	poor	poor	poor	poor	poor	poor
Poor and extreme poor defin	ned based o	n current consumpti	ion—100 per	rcent of social prote	ction transfers.	
Pension	40	49	69	48	12	20
Scholarship	2	1	31	16	0	0
Other social insurance	1	1	40	17	0	0
United monthly benefits	19	30	85	61	1	2
Privileges	9	11	64	9	1	0
Total social protection	55	66	70	48	14	22
Poor and extreme poor defin	ed based o	n current (reported)	consumption			
Pension	35	35	36	14	7	8
Scholarship	2	1	31	16	0	0
Other social insurance	1	1	29	17	0	0
United monthly benefits	19	29	82	57	1	2
Privileges	8	10	12	6	0	0
Total social protection	51	56	36	15	8	10

Example 17. Incidence of financing vis-à-vis spending

Source: Public Expenditures for Poverty Alleviation in Northeast Brazil 2001, Report No. 22425-BR.

4.6 Fully accounting for the interregional transfer is more complicated than this calculation. The net effects need to be seen in relation to the source of funding and prior contributions (if considered by the public as a funded scheme). Clearly, the first generation to receive unfunded benefits clearly receives an advantage. Assessing this fully requires an intergenerational accounting scheme with very demanding data requirements. To the extent that the program is generally a pay-as-you-go scheme, however, the net impact on regions can be assessed through contemporaneous tax payments. According to this assumption, a very progressive income tax as a tax base turns the results around and shows a net flow to the northeast. However, under a wide variety of more realistic

assumptions concerning tax incidence, the results of the direct transfer calculation stand.

Example 18. Administrative costs

Source: Grosh, del Ninno, Tesliuc, and Ouerghi (2008) For Protection & Promotion. The Design and Implementation of Effective Safety Nets. Washington, DC: World Bank, http://go.worldbank.org/K0Z8SB4VJ0.

TABLE 4.2 Administrative Costs of Targeting for Selected Means-Tested and Proxy Means-Tested Programs, Various Years

	Targeting costs total		
Country, program, and year	Administrative costs	Program costs	US\$/ beneficiary
Albania: Ndihme Ekonomika, 2004	88	6.3	7
Armenia: Family Poverty Benefits Program, 2005	26	0.6	3
Bulgaria: Guaranteed Minimum Income Program, 2004	64	6.3	7
Kyrgyz Republic: Unified Monthly Benefit Program, 2005	24	2.3	1
Lithuania: Social Benefit Program, 2004	41	2.7	8
Romania: Guaranteed Minimum Income Program, 2005	71	5,5	25
Colombia: Familias en Acción, 2004	34	3.6	_
Mexico: PROGRESA, 1997–2000	40	2.4	_

SOURCES: Colombia: Lindert, Skoufias, and Shapiro 2006; Mexico: Caldés, Coady, and Maluccio 2004; other countries: authors' calculations.

NOTE: — = not available. Targeting costs include those related to outreach to beneficiaries, determination of eligibility, home visits, verification of information, and maintenance of databases.

Example 19. Coverage, adequacy and targeting efficiency

Source: Latvia Public Sharing the High Growth Dividend. A Living Standards Assessment 2007, Report No. 38437-LV.

- 4.4 The relative performance of the various social programs of the Latvian government noted above in reaching the poorest one-fifth of the population (henceforth poorest quintile) is compared using three related criteria: (i) coverage (i.e. share of this group receiving benefits), (ii) adequacy (i.e. share of their total consumption accounted for by this transfer), and (iii) targeting efficiency (i.e. share of total program spending accruing to this sub-group).
- 4.5 Coverage: Pensions and state social benefits reach a fairly large share of the poorest quintile (52 and 66 percent respectively), while local government benefits and the unemployment program have relatively lower coverage rates (17 and 6 percent respectively) (Figure 4.1). The survey data show that 96 percent of the poorest quintile benefited from one of these programs. In large part this reflects the high coverage rates of pensions and state social benefits, not just among the poorest quintile but also the overall population.

100 91 96 □ Overall ■ Poorest quintile Coverage Rates (Percent) 80 66 60 52 53 40 17 20 11 6 0 Pensions State social Local govt. Unemployment All Programs bene fits benefits benefits

Figure 4.1: Program Coverage Rates

Source: World Bank estimates based on HBS 2004.

4.6 Adequacy. Total transfers are an important income source for those receiving them, especially among the poorest quintile: in 2004, these transfers represented the equivalent of 26 percent and 55 percent of per-capita consumption of all and poorest quintile beneficiaries respectively (Figure 4.2). Among the poorest quintile, pensions are by far the most important transfer (66 percent), but other transfers are important too—state social benefits, local government benefits, and unemployment benefits account for 14 percent, 6 percent, and 32 percent of the per-capita consumption of their respective beneficiaries.

100 □ Overall ■ Poorest quintile 80 Share of Total (Percent) 66 60 55 42 40 32 26 14 20 0 Pensions State social Localgovt. Socialsecurity All Programs benefits benefits benefits

Figure 4.2: Benefits as Share of Consumption

Source: World Bank estimates based on HBS 2004.

4.7 Targeting Efficiency: State social benefits and local government benefits are the best targeted transfers in Latvia (Figure 4.3), with about 30 percent and 28 percent respectively of total transfers under these programs reaching the poorest quintile. By contrast, pensions and state security benefits are relatively less well-targeted, with only 16 and 12 percent respectively of total expenditures accruing to this group.28 The relatively poor targeting performance of most of the transfer programs can be ascertained from the fact that purely random assignment of expenditures under these program would result in 20 percent of spending accruing to the poorest one-fifth of the population—state social benefits and local government benefits do only slightly better than, while pensions and social security benefits do worse than, random assignment of benefits. While clearly not all benefits are intended to reach the poor exclusively (e.g. pensions, which also serve an important social insurance function), these findings nonetheless suggest there is scope for improving access to these benefits by the poor.

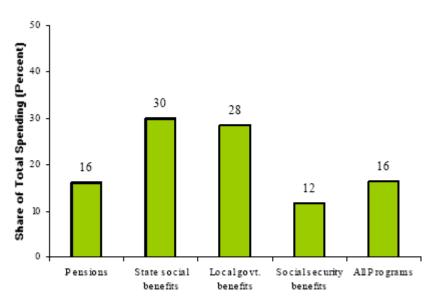


Figure 4.3: Targeting Efficiency

Source: World Bank estimates based on HBS 2004. Graph shows share of spending accruing to poorest quintile.

Example 20. Targeting accuracy and potential savings

Source: Honduras Public Expenditure Review 2007, Report No. 39251-HO.

103. *Targeting.* The degree of accuracy in targeting social assistance programs is highly variable. Table 19 lists the principal social assistance programs in Honduras, ranked in descending order of progressiveness, as measured by the participation of the poorest consumption quintile in a given program. It identifies the PRAF maternal/infant program as the most progressive, while scholarships and housing programs are among the least progressive.

Table 19. The Progressiveness of the Principal Assistance Programs

Programs	Participation of the poorest quintile (Q1) in program (%)
PRAF Maternal Infantile	61.4
PROHECO	54.3
PRALEBAH	48.6
EDUCATODOS	44.9
PRAF Education Voucher	41.6
PRAF school bag	29.8
School lunches	29.0
FHIS	23.3
Scholarships	15.2
Housing programs	15.1
Water subsidies	2.3
Electricity 300 kwh subsidy	3.3
Student transportation	0.0
Mass Transportation	0.0

Source: ENCOVI 2004.

104. The preceding table also indicates that the various subsidies being granted in Honduras are among the worst targeted interventions in the social assistance arsenal. The main subsidies are summarized below, together with the fiscal savings that could be achieved by re-targeting them better or eliminating them.

- Electricity direct subsidies (up to 300 kwh). This subsidy costs the
 Government Lps.275 million a year. Those that consume less than 100
 kww/month receive only 22 percent of the subsidy and those that
 consume over 100 kwh/month receive the remaining 78 percent. If the
 Government decides to focus the direct subsidy only on those that
 consume less than 100 kwh, it could save about Lps.215 million a year.
- Electricity subsidies (Bono 80) This subsidy is clearly regressive. It benefits
 only those that are clients of ENEE and benefits most those that consume
 more. If the Government decides to focus this subsidy only on those that
 consume less than 100 kwh, as was the original intent of this subsidy, it
 could save Lps.350 million a year.
- Exonerations of taxes on fuel oil and diesel used for electricity generation represent a large subsidy. They cost the Treasury Lps.1,795 million in 2006, of which about 95 percent is exoneration on the private sector and the rest on ENEE. If the Government decides to reduce this exoneration gradually, say in equal installment during a five year period, it could collect Lps.359 million during the first year. (Eliminating this subsidy will, of course, put upward pressure on electricity generation costs and on the need for ENEE to raise electricity tariffs and operating efficiency. It is more efficient, however, to assist poor households affected by such tariff

increases with other, better targeted subsidies, such as a revised Bono 80.)

- Fuel subsidies. As of December 2006, the subsidies due to the price differential of fuel have declined substantially. What remains is a small subsidy on LPG. Since the price of gasoline has declined below the frozen price by more than the tax break, the Government could consider reinstating the tax and recovering Lps.79 million in taxes.
- Telecom subsidy. HONDUTEL's transfers to the Government have declined because it maintains a tariff structure that cross subsidizes local calls with international calls, while facing increased competition from new operators. As HONDUTEL enters the mobile market and competition in the sector intensifies, it should be allowed to set its prices and use its resources to invest and increase its competitiveness. On the other hand, HONDUTEL also should be required to pay taxes, fees for the use of spectrum, and the return on equity to the Government. At this juncture, however, it is not possible to estimate how much HONDUTEL should be transferring to the Government under such conditions.
- Partial Cost Adjustment of Electricity and Water Tariffs. Similar to HONDUTEL, there are losses incurred by ENEE and SANAA for failing to set tariffs at levels that cover the full cost of operation and capital depreciation. For 2006, those losses have been estimated at Lps.2,119 million for the ENEE and Lps.72 million for SANAA. One reason that the costs of these enterprises are so high, however, is that they are inefficient. It is not clear that their customers alone should bear the full cost of those inefficiencies, so a tariff adjustment that eliminates losses entirely may neither be feasible nor advisable on economic grounds. As before, a more detailed study is required to identify the main sources of inefficiency, which could serve as the basis for estimating the subsidization losses due to inappropriate tariffs. These subsidization losses can range from 0 to the total observed losses observed in both enterprises.

Table 20. Potential Savings From Re-Targeting or Eliminating Subsidies

Sector/ Program	Financed by	Cost in 2006 (Lps. million)	Possible Policy Changes	Potential Savings (Lps. million) a/
Electricity 300 khw	SEFIN	275	Concentrate subsidy on consumption below 100 kwh/month	215
Electricity Bono 80	SEFIN/ENEE	550	Give Bono 80 to only those that consume less than 100 kwh/month	350
Fuel Subsidies	Ministry of Finance	641	Reinstate tax on gasoline	79
Exoneration of taxes on fuel oil and diesel use to produce electricity	SEFIN	1,795	Eliminate gradually over a 5 year period	359 a/
Sub-Total (as % of 2006 GDP)		3,261 (1.9%)		1,003 (0.6%)
Telephony cross subsidies	SEFIN/ HONDUTEL	343	Set prices to cover taxes, fees, and return on equity	0 - 343
Tariffs below Cost, ENEE	ENEE/SEFIN	2,119	Set prices to cover taxes, fees, and return on equity	0 – 2,119
Tariffs below Cost, SANAA	SANAA /SEFIN	72	Set prices to cover taxes, fees, and return on equity	0 - 72
Sub-Total		2,534		0 - 2,534
Grand Total (as % 2006 GDP)		5,795 (3.3%)		1,003 - 3,537 (0.6% - 2.0%)

Note: a/ Fiscal savings per annum.

Example 21. Diversion of funds

Source: Bangladesh Public Expenditure Review 2003, Report No. 24370-BD.

The development impact of safety net programs is severely limited by unacceptably high administrative leakage

197. Recent evidence indicates that the effectiveness of the various social safety net programs is significantly reduced by implementation problems. Most disturbing are estimates of aggregate household transfers from the VGD, VGF and FEE programs obtained from the 2000 HIES. The administrative leakages in these three programs appear large, with 20–70 percent of the aggregate program allocation not accounted for in the survey estimates: 35 percent of the food grains allocated to the VGF, 41 percent of the VGD and an overwhelming 75 percent of allocations to the FFE appear not to reach any household, whether an intended or unintended beneficiary (see able 7.4 and the background paper "Food Assistance Programs in Bangladesh"). What is particularly worrisome is that similar calculations for the FFE program using the 1995–96 Household Expenditure Survey (HES) reveal substantially lower discrepancy, indicating that problems of leakage have worsened over the last five years. Any conclusions about the effectiveness and targeting efficiency of these programs based on the incidence analysis presented earlier must be balanced against these findings.

Table 7.4 Bangladesh-survey e program allocation	stimates of accounted for grain as a percentage of aggregate
Program	Five-percent confidence intervals
VGD	34 percent—59 percent
VGF	30 percent—65 percent
FFE	10 percent—25 percent
Source: 2000 Household Incor	me and Expenditure Survey (HIES).

Example 22. Costs of delivering benefits

Source: Grosh, del Ninno, Tesliuc, and Ouerghi (2008) For Protection & Promotion. The Design and Implementation of Effective Safety Nets.

Washington, DC: World Bank, available at http://go.worldbank.org/K0Z8SB4VJ0.

TABLE 5.3 Costs of Delivering Benefits, Selected Countries and Programs

	Average	Costs p	er transaction	
Country, program, and year	monthly transfer (US\$)	US\$	As % of transfer amount	Frequency of payment
Albania, Ndihme Ekonomika, 2004	26.0	0.13	0.5	Monthly
Bangladesh, Primary Education Stipend Program, FY2002/03	1.80	0.15	8.3	Quarterly
Brazil, Bolsa Familia, 2007	42.0	1.10	2.6	Monthly
Bulgaria, Guaranteed Minimum Income Program, 2004	25.00	0.07	0.3	Monthly
Colombia, Familias en Acción, 2004	50.0	0.60-10	1.2-2.0	Every other month
Ecuador, Bono de Desarrollo Humano, 2004	15.0	0.45	3.0	Monthly
Jamaica, PATH, 2004	45.0	0.30-0.60	0.7-1.3	Every other month

SOURCES: Authors' calculations based on Ahmed 2005; del Ninno and Ayala 2006; Handa and Davis 2006; Kolpeja forthcoming; Schady and Araujo 2006; Shopov forthcoming; personal communication with Joana Mostafa, consultant to World Bank Brazil office, April 22, 2008.

Example 23. Unit cost analysis

Source: Ethiopia Public Expenditure Review 2004. Public Spending in the Social Sectors. The Emerging Challenge, Vol. 1, Report No. 29338-ET.

Cost-effectiveness of current program spending

The table below shows the approximate cost per Birr of transfer under a sample of existing programs. Comparisons between them are, of course, difficult because the programs—especially the work-based ones—have very different overhead cost structures and serve very different purposes. Furthermore, the costs and benefits are not consistently measured due to the data problems mentioned above.

Table 0.2 Some estimat	es of transfer o	osts—selected	l programs	
Program	Total expenditure	Number of Beneficiaries	Approximate Transfer per Beneficiary (in value to beneficiary)	Approximate cost per Birr transfered
Food-for-Work®	\$19.9 m.	n/a	\$5.11	1.88
EGS ^b	n/a	_	\$11.22	n/a
Gratuitous Relief ^c	n/a	n/a	\$8.82	1.50
School Feeding ^d	\$4.1 m.	258,000	n/a	2.50
Cash-for-Work ^e	\$2.5 m.	20,341	\$9.55	1.30

Notes:

- FFW Expenditure based on WFP country program table (\$59.6 over 3 years). Number of beneficiaries to be confirmed; benefit/costs based on distribution of 134,824 mt. Over 3 years. [Food transfers valued at 2 birr/kg. exchange rate of 8.6/USS.
- Based on WFP evaluation showing average transfer of 47,7 kg of food per beneficiary under EGS, and of 37.5 kg, under free food distribution; valued at 2 birr per kg.
- Avg. benefit based on WFP evaluation that reports avg. receipt of 37.5 kg/person, valued at 2 birr/kg., at 8.5 birr/ USS; cost-benefit based on reported costs of delivered food of \$350 per mt, and benefit valued at 2 birr/kg. (= approx. \$235 per mt).
- From WFP program table for 2003–06; \$ 12.4 million over 3 years, to distribute commodities valued at \$4.9 m. (\$1.6 m. annually) international procurement price; Tassew report implies 46 kg. per beneficiary; actual value of package to be confirmed.
- Based on SCF (UK) report on pilot for period Feb-May 2001; cost of Stg. 158,325 for 20,341 beneficiaries, of which stg. 121,425 distributed as wages; valued at US\$1.6/Stg.

6.24 Nonetheless, a number of observations are in order. One is that the costs of food-based programs (which constitute the vast majority in Ethiopia) are particularly high due in part to tied procurement of grain and the high costs of domestic transport and distribution. The table below shows the average cost of delivered food under safety net programs in Ethiopia (excluding program implementation and administration costs):

International price \$130 /mt.
International shipping: \$50

Transport Djibouti-Regional center
Local distribution & transport: \$40

Total cost: \$285

- 6.25 When administrative costs are added even free distribution can cost over \$350 per ton, equivalent to about 3 birr per kg. of food. This compares with average local market prices of about 1.5–2 birr per kg. for most foodgrains.
- 6.26 The costs of delivering a dollar's worth of benefits would be substantially lower if cash were distributed (see box on the SCF(UK) pilot cash-for-work scheme). However, the problem is that food is just not available at any reasonable price in many of the affected areas, especially during drought years. At the same time, however, the continued preponderance of food distribution

programs—of whatever kind—undermines the development of inter-regional trade and price signals that are ultimately needed to ensure better-functioning markets. Clearly this is a process that needs to be phased in, but as progress is made in developing functioning markets, the fastest-possible shift to cash-based transfers is warranted.

6.27 The cost-effectiveness estimates for works-based programs are somewhat misleading, because we know that the current EGS program is badly-underfunded. Complementary inputs, such as supervision, planning and design, materials and equipment are only financed at a very low level (or not at all). In some cases a donor or NGO provides some inputs—typically to about 20 percent of program costs—but based on experience worldwide, we estimate that such complementary inputs typically cost one dollar for each dollar transferred as wages—so they should amount to about 50 percent of program costs.

6.28 Furthermore, although table 6.2 shows cost per unit transferred, it does not really tell us anything about the effectiveness of these transfers. For a number of reasons cited earlier, spending is often ineffective: because food comes too late or because the amount of food distributed is so diluted (due to insufficiency of overall allocations or the fact that it is disbursed among many more beneficiaries than was intended) that each household receives too little to materially affect its welfare. In the case of works programs, the stop-start nature of programs prevents them having a sustained impact on incomes of the poor; and the absence of counterpart funds and integration with local capital plans means they don't result in creation of lasting, productive assets.

Example 24. Unit cost analysis

Source: Guatemala Poverty Assessment Program. Social Protection, Private Transfers and Poverty 2002.

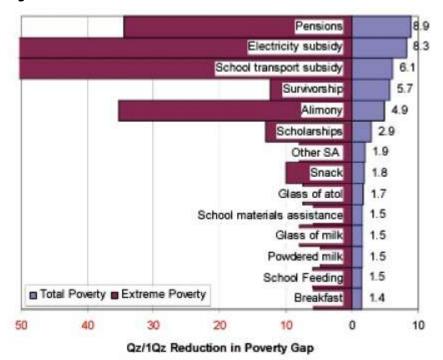
Cost-benefit analysis

This section looks at the cost-benefit ratio for the main social programs that aim to reduce poverty. Using the methodology described in Annex 1, we present, in table 11, estimates of the cost required to reduce the poverty gap by Qz1 for a list of social protection programs. The same simplifying assumption is maintained—that the level of consumption in the absence of a welfare program equals current consumption minus the welfare benefit. The estimation has three simple steps. First, we computed estimates of the current and counterfactual poverty gap. Second, we estimated the contribution of the program to reducing the poverty gap. Third, we estimated the cost-benefit ratio by dividing the reduction in the poverty gap due to the program by total spending on that program. Due to limitations in the ENCOVI data, program spending includes only

the cost of the benefits provided through the program as reported or assessed by the beneficiary. This means that neither administrative costs nor potential incentive effects are taken into account. The resulting ratio gives the numbers of Qz spent per Qz1 reduction in the poverty gap, and the lower the number (preferably close to one), the better the outcome. To test how sensitive the results are to the choice of the poverty line, we estimated cost-benefit ratios for both total and extreme poverty lines.

Figure 18 ranks the social risk management programs by their cost-benefit ratios, using the reduction in (total or extreme) poverty as social welfare criterion. Broadly speaking, social insurance is the most inefficient arrangement in reducing (total) poverty. It costs between Qz5-Qz9 for any Qz1 reduction in the poverty gap. Social assistance programs are the most efficient. For most social assistance programs, it takes between Qz1.4-Qz2 to reduce the poverty gap by Qz1. However, some social assistance programs, which already have a reputation for contributing little to reducing poverty, are among the worst performers, such as the school transport subsidy (Qz6.1) and the scholarship system (Qz2.9). Figure 18 also illustrates the cost benefit ratios of the social risk management programs using extreme poverty as social welfare criterion. First, note that all ratios increase monotonically as expected. The story remains, in broad terms, the same. For most social assistance programs, it takes Qz2-Qz8 to reduce the extreme poverty gap by Qz1. The only re-ranking occurs in the cases of alimony and school transport and energy subsidies, which are more inefficient in fighting extreme poverty than total poverty. These programs are better at reaching the moderately poor than the extremely poor.

Figure 18



Example 25. Match of risk and target groups

Source: Republic of Tunisia Employment Strategy 2003, Vol. 1, Report No. 25456–TUN.

Correspondence with the Profile of the Unemployed

4.27 As noted earlier the primary target of active labor market policies (ALMPs) is the unemployed, with a special emphasis on young people. Based on the characteristics of unemployed workers in Tunisia, the following observations can be made (see table 47):

- Unemployment rates do not differ much between men and women but because the participation rate of men is so much higher, they account for three-quarters of all unemployed;
- Both the 15–19 and 20–29 age groups have much higher unemployment rates than the national average (generally the case in all countries). More pointedly, 70 percent of the unemployed in Tunisia are under 30 years old;
- Human capital matters. Almost 60 percent of unemployed workers have no more than primary schooling. However, unemployment remains a problem for large numbers of workers with secondary education; the unemployment rate for this group is above the national average (at 17 percent) and the group accounts for just over one-third of total unemployment;
- Unemployment is particularly a problem for blue-collar workers—over 60
 percent of total unemployment is accounted for by trade, craft, and artisan,

machine operator and unskilled labor occupations;

 Unemployment rates are relatively similar in rural and urban areas. However, two-thirds of all unemployed workers are in cities and other urban communities.

		Percent distribution of
	nemployment rate	unemployment in category
ender		
Male	15.1	75.7
Female	15.9	24.3
ducation		
None	9.6	10.1
Primary incomplete	9.5	1.0
Primary complete	17.5	46.6
Secondary	17.0	35.8
Postsecondary	10.7	6.5
ge		
15–19	34.1	17.4
20-29	25.3	50.7
30-39	10.4	18.6
40-49	6.2	7.9
50 or Over	5.8	5.4
ocation		
Large city	14.4	28.6
Other urban or community	16.2	37.2
Rural	15.1	34.2
ccupation		
Manager	3.5	1.1
Professional, technical specialist	17.0	6.5
Int. professional	6.5	3.4
Clerical	15.4	6.4
Sales and service	13.9	14.0
Primary sector occupations	4.5	5.2
Trade, craft, artisan	18.7	24.7
Machine operator	10.6	8.0
Unskilled labor	16.4	30.7
ll workers	15.3	

- 4.28 How well do Tunisia's ALMP activities correspond to this profile of the unemployed?
 - First of all, the emphasis on youth seems merited, given this group's very high unemployment. The two major classes of interventions in terms of scale are pre-service training (almost by definition serving youth) and the various self-employment financing schemes oriented toward young workers

(especially 20–29 years old). There are also the much smaller stages programs serving different segments of the new entrant labor force. The largest of these, by far, is SIVP1 (85 percent of planned expenditures on SIVP1/2 and CEF during the Tenth Plan), which is targeted at postsecondary graduates. On the basis of unemployment by education for youth, however, it does not seem most appropriate that postsecondary graduates should be the beneficiaries of the bulk of the resources for stages. According to the 2001 Employment Survey, the breakdown of unemployed workers in the 15–19 and 20–29 age categories shows that this group accounts for only a very small percentage of the cohort of unemployment (roughly one in 10). The pool of unemployed is dominated by those with primary schooling or less for the 15–19 age group and secondary or less for the 20–29 group (see table 48).

Unemployment ra groups	ites and distributio	n by educatioi	n, 2001, 15–19 an	ıd 20–29 year ag	
	Unemploy	ment rate	Percent distribution of unemploy		
	15–19 years	20–29 years	15–19 years	20–29 years	
Less than primary	21.9	18.2	4.7	4.5	
Primary complete	33.8	23.1	68.6	41.4	
Secondary	38.6	28.8	26.7	45.3	
Postsecondary	11.2	26.1	0.0	8.7	
Total	34.1	25.3	100.0	100.0	

- Second, given the high unemployment (overall and for younger workers) among the poorly educated, there may not be enough ALMP resources directed to this group. Only the public work sites (Chantiers publics) have a strong orientation toward workers with no more than primary education. All other programs (i.e., "stages" and micro-finance) and resources are largely directed to the better-educated. Moreover, the evidence on ATE indicates that the employment offices play a much greater role in the job search of educated workers compared to the poorly educated.
- Third, most interventions have higher participation among men than women.
 This is very strongly the case for public works employment and most microfinance programs. This emphasis corresponds to the distribution of unemployment. However, the very low participation rates for women may reflect limited job opportunities and, thus, could be disguised unemployment.
- Finally, the overall ALMP effort is oriented toward the cities and other urban areas, despite the fact that rural unemployment rates are higher and rural

unemployment accounts for over one-third of total unemployment. Few rural workers report using ATE offices for job search. Only a minority (less than one-third) of beneficiaries of micro-credit programs are in rural areas. However, about one-half of chantier public employment is in rural areas.

26. One important issue not covered in this review concerns the correspondence by region (e.g., governorate) between the distribution of unemployment and ALMP activities.

Example 26. Institutional issues

Source: Mongolia Public Expenditure and Financial Management Review 2002. Bridging the Public Expenditure Management Gap, Report No. 24439-MOG.

Policy coordination and management

8.87 The objective of the MOSWL is "providing appropriate, decisive, professional support and advice for the ministry and the action program of the government" toward the goal of "creating sufficient living conditions for citizens where they can work effectively and strengthening social welfare service for them." The ministry of social welfare and labor is responsible for setting policy and supervising policy implementation in the areas of employment, labor protection, social insurance and social assistance and has overarching responsibility for poverty reduction.

8.88 The functions of the MOSWL are spread out among a number of independent subordinate agencies. The most important are The State Social Insurance General Office (SSIGO), The Labor Inspection Agency, The Central Employment Regional Office (CERO), Social Assistance Office (SAO), The National Committee for Children and the National Center for Rehabilitation and Training.

8.89 The roles and responsibilities in MOSWL are divided between the central and local government agencies. The central level (the ministry and subordinate agencies) is directly responsible for the provision of all social insurance benefits, residential social care and employment services. The provincial level on the other hand is responsible for the provision of client needs assessments, social assistance benefits, day programs and some social care facilities (primarily UB city's).

8.90 No standardized system exists for administering social protection expenditures across beneficiaries or *aimags*. The ministry administers the budget for its staff and other administrative expenditures.

8.91 Most of the supervision for effective implementation of policy by subordinate agencies is carried out by MOFE. The ministry exercises limited

overseeing functions over the budget of the subordinate agencies. MOFE determines the provincial budgets and the respective budget processes determine the expenditure at that level. During the process of determining provincial budgets, MOSWL issues spending guidelines (norms), which can help to shape the negotiation over the total provincial budget. However, these norms are not binding. Aid projects are mostly outside the budget process.

8.92 The multiplicity of agencies providing social security or assistance benefits is augmented by the existence of three quasi-independent funds: the Social Insurance Fund (SEF), the Employment Fund (EF) and the Social Assistance Fund (SAF). While legislative entitlements and ministry decisions, endorsed by the cabinet, play the largest role in shaping the budgets of the SIP and EF the independent Councils also have a policy and overseeing role. For example, the Social Insurance Council may direct the SSIGO to prepare regulations on key implementation issues in the pension reform, or request draft legislation. The Council is also supposed to monitor the budget implementation.

8.93 Fragmentation and multiplicity of funding agents have weakened the otherwise well designed functional structure of the MOSWL intended to support an integrated social welfare policy. In practice, therefore, MOSWL does not seem to be yielding the expected results of poverty reduction. It should be noted however that it is a newly formed ministry, still finding its way. Due to the fragmentation caused by multiplicity, policy formulation and evaluation are organized primarily according to expenditure type (SI, SA, employment programs and others), with inadequate attention to the effects of the whole system.

8.94 Performance of the overall civil service is compromised. The fragmentation of functions and budget agencies in MOSWL, like in education, health and especially MOFE has created substantial capacity problems. A fine layer of skilled staff is spread very thinly among a vast number of agencies. No benefits from scale or skill concentration are realized.

Example 27. Analysis of financing and sustainability

Source: Colombia: Social Safety Net Assessment 2002, Report No. 22255-CO.

Social sector spending in Colombia: a focus on social services and decentralization

4.6 Colombia has historically relied on economic growth and an expansion of social services as substitutes for implementing a social safety net, particularly during the 1990s. Solid economic growth allowed for a dramatic expansion in social sector spending through the late 1990s. Following a period of almost complete

stagnation through the 1970s and 1980s, public expenditure (primarily on health, education and pensions) in Colombia began to grow dramatically from 1990 onwards. Between 1990 and 1997, overall public expenditure rose by 60 percent increasing its share of GDP from 27 percent to 43 percent. (Velez and Foster 2001). Total social spending (defined as health, education, pensions and other social spending) increased sharply from 1993–1996, led by increases in health and education, and steady growth in pensions. Spending for social assistance remained at low levels throughout the 1990s and did not increase with onset of the crisis.

- 4.7 The 1990s were also characterized by dramatic growth in expenditure decentralization. Between 1990 and 1997, regional governments increased their control of public expenditures by 80 percent, accounting for 14 percent of GDP (versus 30 percent for central government expenditures). Overall, increasing funding to regional governments accounted for 30 percent of the overall growth in public expenditure during the period. Most of the additional resources destined to regional governments were assigned to health and education programs, and to a lesser extent basic sanitation. Thus the growth in public social expenditures and the growth in regional government spending are two aspects of the same trend, both of which were underpinned by Colombia's solid economic growth.
- 4.8 The main impetus for the growth in social expenditure and the shift toward decentralization came from the social sector policy reforms introduced in the 1991 Constitution, Law 60 and Law 100.
 - The 1991 Constitution mandated substantial increases in social spending, particularly in the areas of human capital and promoted decentralization both by increasing fiscal transfers from central to local government—as well as enhancing alternative sources of financing for local government expenditures.
 - Law 60, introduced in 1993, sought to promote autonomy in decisionmaking at the regional level. The expectation was that this would improve the efficiency and equity of public expenditure.
 - Law 100, introduced in 1993, increased the pension liabilities of the state
 towards public sector employees, both by raising pension contributions to
 13.5 percent of salary and by raising the employers contribution to 75
 percent of the total. Furthermore, the state was required to assume the
 pension liabilities of a number of state owned enterprises that went into
 liquidation at around this time.

- 4.9 However, social assistance was not included in the dramatic social sector reforms of the 1990s that resulted in increased spending and decentralization for health and education. As a consequence, social assistance programs remain underfunded, centralized and lack a strategic focus.
- 4.10 First, social assistance programs did not benefit from the expansion of social sector spending described above. Whereas funding for health and education doubled from approximately 4 percent to 8 percent of GDP over the period 1990–2000, central government expenditures on "other social expenditures," including spending on the main social assistance programs and SENA, were essentially constant at approximately 2 percent of GDP.
- 4.11 Compared to other countries, public social spending in Colombia in 1996 as a percentage of GDP was slightly below the average of the selected Latin American countries. Spending on social security and welfare (4.9 percent) was below the Latin American selected country average of 7.1 percent, whereas spending on education, health and housing was closer to regional averages.
- 4.12 Second, since the decentralization reforms that guided social sector policy did not include social assistance, the main social assistance programs remain highly centralized. The fiscal transfers to local governments include no funding for social assistance. Local governments have almost no discretion over how social assistance and SENA training institute funds are allocated. There is, however, deconcentration of central authority through the presence of a national network of field offices for many programs, including the ICBF family welfare agency and the SENA training institute.
- 4.13 Finally, the strategic focus and policy directives established for most social sector programs as part of the reforms were not applied to social assistance. The safety net remains composed of an array of social assistance programs that constitute an "institutional archipelago" that is fragmented, unfocused and largely outside of the reach of those in the informal sector.
- 4.14 The onset of the economic recession in 1998 curtailed Colombia's ability to continue its expansion of social sector spending, thereby undermining its de-facto safety net. As outlined below, the social assistance programs that could have been mobilized to provide a counter-cyclical safety net during the crisis were hampered by structural constraints, including a historic lack of financing (particularly during times of crises), institutional inflexibility, unfocused mandates, and poor targeting. As a response to the crisis, a new set of safety net programs were introduced as the Red de Apoyo Social (RAS) to provide short-term emergency assistance until 2004, but without engaging in a broader

strategic reform of the safety net. A pending issue on Colombia's policy agenda is the need to evaluate the new RAS programs' performance and decide on their future role. This should be done as part of a overall safety net reform resulting in the establishment of an agile, efficient and effective social risk management system with specific functions in crisis and non-crisis periods.

Characteristics of Colombia's social assistance programs

4.15 Colombia, like many other countries at its income level, lacks a well-defined safety net that reaches the most poor and adequately covers key vulnerable groups. Although the three new RAS social safety net programs detailed in the previous chapter have correctly identified and are beginning to address some critical gaps in the safety net, the main social assistance programs also merit a review. This section outlines the main features of the network of social assistance programs, focusing on areas of needed reform:

Underfinancing and pro-cyclicality

- 4.16 Social assistance spending in Colombia is at a very low level compared to other countries in the region and to the needs of key vulnerable populations, as outlined in chapter 2. In 2000, Colombia's spending on the four main social assistance programs—ICBF family welfare, INURBE housing, the RSS social fund and water and sewerage subsidies—was less than 0.7 percent of GDP, the lowest rate of social assistance spending of the countries reviewed. From 2001–2004 the implementation of the RAS programs will raise spending on social assistance by an additional 0.3 percent of GDP, bringing total social assistance spending to 1 percent of GDP, more in line with regional allocations. Nonetheless, without reforms or continued international borrowing, the sustainability of this additional spending beyond 2004 cannot be assured.
- 4.17 Financing of social safety net programs has been historically pro-cyclical—the opposite of what is desirable in an effective safety net. A retrospective public social expenditure review reveals that for each peso of reduced GDP, social assistance spending fell by 9 pesos, making social assistance the most procyclical component of social sector spending (CRECE 2001).
- 4.18 This pro-cyclicality was underscored in the recent recession of the late 1990s which resulted in reduced spending on social assistance programs, with programs earmarked from payroll taxes such as the Colombian Institute for Family Welfare (ICBF) and the National Training Service (SENA) suffering less dramatic budget cuts than those financed through general revenues including the Social Solidarity Network (RSS) programs for the indigent elderly and internally displaced people whose programmed budgets were halved during the recession.

4.19 Earmarking in payroll taxes seems to have insulated programs from counter-cyclical budget cuts. The aggregated data in table 4.4 show the impact of the recent economic recession on four of Colombia's main social programs. Total budgeted expenditures for all four institutions were lower in 2000 than in 1999, and execution of the budget (through November) was sharply reduced in 2000 for the three institutions excluding ICBF. Those expenditures derived from earmarking a portion of payroll taxes (SENA and ICBF) seem to have been insulated from the dramatic reduction in budgeted expenditures compared to programs whose source of funding is derived from general revenues. The budgets from general revenues allocated to RSS (which administers, among other programs, Revivir, the social assistance program targeted to the indigent elderly and the programs for the Internally Displaced People) and INLTRBE (which administers urban housing programs) were reduced by 50 percent as a share of GDP from 1999 to 2000.

4.20 Social protection programs in Colombia are primarily financed by earmarked payroll taxes. The tax burden increased substantially from 1990 to 1996, and is very high, creating incentives for the informal sector and decreasing the competitiveness of Colombian formal sector firms. The formal sector is overprotected, with high severance payments, vacations, 13th month salary and other benefits, resulting in incentives for a large informal sector and high unemployment. When considering the reform of the social safety net in Colombia, this high tax burden should be kept in mind, particularly since the poor bear a disproportional burden of unemployment and informality. Kugler and Kugler (2001) have estimated that a 10 percent decrease in payroll taxes lowers unemployment by about 4 percent and several other analysts have pointed to the pernicious effects of these and other labor regulations on labor market outcomes. A strong case could be made to engage in labor market reform by lowering the tax burden though the elimination of taxes on social programs that are not targeted to the poor and securing alternative sources of revenue to finance a progressive, strengthened social safety net. However, this would need to be done carefully, as recent data reveal that earmarking served to protect social assistance spending from dramatic budget cuts. This situation underscores the importance of a comprehensive, strategic social safety net reform, as argued in the next chapter.

Example 28. Employment insurance simulations

Source: Bosnia and Herzegovina Addressing Fiscal Challenges and Enhancing Growth Prospects. A Public Expenditure and Institutional Review 2006, Report No. 36156-BiH.

Employment Services: Outlook

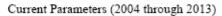
6.41 The FBH and RS employment insurance systems face different outlooks. The

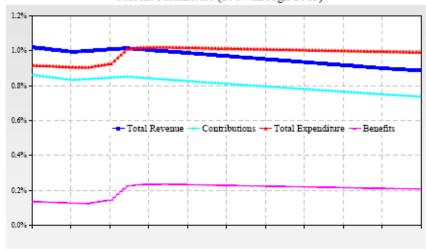
evidence provided above suggests that the employment contribution rate in the FBH is overly high and the FBH system is substantially overfunded. The fiscal situation of the RSEI is much tighter, by contrast, and is likely to remain that way over the medium term.

6.42 A scale-back of currently inflated expenditures on active labor programs in the FBH would allow for a reduction in the unemployment insurance contribution rate even with an increased inflow of unemployment benefit claimants. The system could accommodate a jump in the share of unemployment benefit recipients relative to the overall total unemployed from 1.7 percent to 3.5 percent and a cut in the contribution rate from 2.5 percent of gross salary to 1.5 percent. This would be possible provided expenditures on active labor market programs are cut from the current 0.6 percent of GDP to 0.2 percent (Figure 6.5). Savings could also be realized from a reduction of the recently extended maximum benefit duration from 24 months back to 12 months.

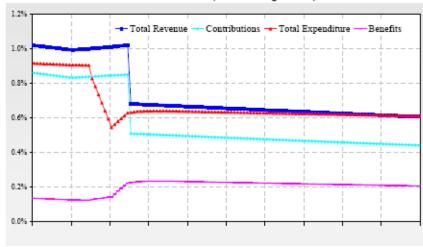
6.43 The RS employment services face a different challenge. The system is tightly financed and any shocks would need to be cushioned either through increased transfers from the entity government or through a reduction of benefits. Assuming an increase of unemployment benefit claimants from 2.2 percent of the registered unemployed to 3.5 percent from 2006 onwards and no change in benefits, the RSEI would need an additional transfer from the entity government of less than 0.1 percent of entity GDP a year (Figure 6.6). Medium-term policy options in the RS unemployment insurance system will depend on whether the number of the recipients of unemployment benefits will increase and whether this increase will be temporary or permanent. Accelerated corporate restructuring makes it more likely that any increase will be temporary. Therefore, it appears prudent to rely on budgetary transfers to cover financing gaps and not consider increasing contribution rates.

Figure 6.5. FBH EI: Revenue and Expenditure Projections 1/





Reform Scenario (2004 through 2013)



Source: World Bank staff estimates.

1/ Top figure: projections under current parameters. Bottom figure: projections assuming a doubling of unemployment benefit claimants in 2006, a cut in the contribution rate from 2.5 percent to 1.5 percent from July 2006, and spending on active labor market programs cut to 0.2 percent of GDP from January 2006.

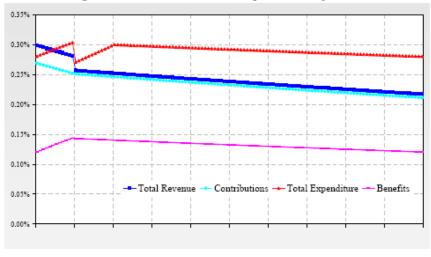


Figure 6.6. RSEI: Revenue and Expenditure Projections 1/

Source: World Bank staff estimates.

1/ The figure shows the projected revenue shortfall, assuming an increase of the unemployment benefit claimants to 3.5 percent of registered unemployed in 2006, an unchanged contribution rate of 1 percent of net salary, and non-unemployment benefit spending of 0.07 percent of GDP.

Example 29. Pension sustainability

Source: Creating Fiscal Space for Poverty Reduction. A Fiscal Management and Public Expenditure Review 2004, Vol. 2, Report No. 28911-EC.

E. Medium and Long Term Perspectives

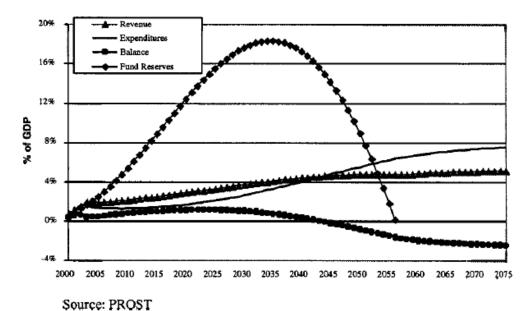
5.39 In the context of a technical training project, the World Bank prepared a simulation of the medium and long-term perspectives of the pension system in Ecuador, using Pension Reform Options Stimulation Toolkit (PROST), a pension simulation software developed by Bank staff and applied in more than 80 countries around the world. These simulations, as in any other case, are not predictions but only the expected outcome given a set of assumptions about the future. Given the history of the volatility of rules and parameters in recent years (for example, the real value of benefits declined by 70 percent from 1995 to 2000 and then grew by 500 percent), it is clear that the results of the simulations must be considered possible scenarios and not predicted outcomes.

5.40 Assuming that the coverage level does not change, the system dependency ratio will continue to grow, partly due to the overall population aging process, but also because of the maturation process within the system. After a small decline in the next few years (due to increases in retirement age), the ratio should reach 30 percent by 2028, 50 percent by 2042, and over 90 percent by 2075. Of course, such a dependency ratio is unsustainable, as contribution rates to balance the system would have to be over 50 percent. Consequently, the system parameters will have to be adjusted in the future.

5.41 Pension expenditures in IESS should slightly decline in the next few years and then start rising, as the effect of increases in retirement age is offset by the larger number of workers reaching the minimum required age. As revenue will exceed expenditures for several decades, fund reserves should reach approximately 18 percent of GDP by 2035, assuming a real return of 2 percent. However, the sustained increase in the number of beneficiaries will start to affect the finances, as total expenditures should reach 3 percent of GDP by 2033 and over 5 percent by 2050. Since revenue from contributions, government transfers, and other sources (including returns from investing reserves), will increase at a much lower rate, cash flow will become negative by 2044, and reserves will be completely exhausted by 2057.

5.42 Figure 5.6 shows that the pension system run by IESS can be financed under the current conditions for approximately fifty years, as long as government transfers continue to grow with expenditures. However, this assumption implies that the subsidy to the pension system will reach 3 percent of GDP, a rather expensive policy considering that it will still only reach one quarter of the population. Policy makers should question whether the current model should be maintained, given its regressive effect. If the government contribution is eliminated beginning in 2005, the cash flow would become negative by 2025, and reserves would accumulate up to a maximum of 3.6 percent of GDP by 2020, and be completely spent by 2031.

Figure 5.6. Expected financial flows for IESS' pension system, 2000-2075



5.43 In either case (with or without government transfers), the implementation of

some reforms to make the system sustainable is unavoidable, although the time frame in which they must be adopted changes. Corrections to age of retirement, contribution rates and/or expected replacement rates will be necessary, and the government must begin analyzing options to develop and implement them progressively. Otherwise, the risk of creating an additional source of fiscal stress with no significant welfare outcome is high, with the obvious negative consequences for the country's development prospects (See Figure 5.7).

5.44 Changes in the assumptions used to prepare these simulations may yield different results, especially with regard to: a) the rate of participation in the system (increasing coverage would result in better finances in the short and medium term, and larger deficits in the long term); and b) the returns obtained by investing accumulated assets which, if larger than assumed, would result in a delay of the date when reserves become exhausted.

12% —— Revenue —— Expenditures —— Balance —— Rund Res enses —— Rund Res enses —— 8% —— 2000 2005 2010 2015 2020 2025 2030 2035 2040 2045 2050 2055 2060 2055 2070 2075

Figure 5.7. Expected Financial Flows for IESS' Pension System, Assuming no Government Transfers Since 2005-2000-2075

Source: Bank staff using, PROST

Example 30. Impact

Source: Albania A Public Expenditure and Institutional Review 2006, Vol. 2, Report No. 36453–AL.

8.2 During 2000-05, the direction of social protection spending has been shifting away from social assistance to social insurance. The social protection system in Albania includes (i) a contribution-based social insurance (pensions) scheme; (ii) general revenue-funded social assistance and labor market programs. Pension expenditures have been increasing in real terms while expenditures on social assistance declined in real terms and fell from 2.3 per cent

of GDP in 2000 to 1.2 per cent in 2005. In particular, expenditures on Ndihme Ekonomike (NE), the only means tested program, fell from 0.8 percent in 2000 to 0.4 percent of GDP in 2005.

8.3 However, both types of programs, assistance and insurance, have an important and increasing impact on poverty in Albania. On average during 2002-05, the share of poor households receiving at least one type of social protection increased from 64 percent to 72 percent (Table 8.3). The value of public transfers, although low, represents just under one-quarter of household income for the average household, and between 28-38 percent of household income for the poorest quintiles. In the absence of social protection programs, the poverty rate should have been 11 percentage points higher for the population, and 20 percent higher for the recipients (Table 8.4).

Table 8.3. Coverage and Distribution of Key Social Protection Programs, 2002 and 2005

Total		Poor		Non-poor				
2002	2005	2002	2005	2002	2005			
A. Coverage (Percentage of households receiving benefit)								
11.0	12.7	24.6	32.5	7.8	9.5			
24.6	23.5	15.8	15.8	26.6	24.8			
19.0	18.8	25.1	23.4	17.6	18.0			
8.7	8.8	9.9	12.9	8.4	8.2			
1.2	0.5	1	0.7	1.3	0.5			
0.8	0.4	0.8	0.4	0.7	0.4			
0.4	0.9	0.3	1.8	0.4	0.8			
3.0	2.5	1.6	2.1	3.3	2.6			
57.1	56.1	63.5	71.8	55.6	53.5			
B. Distribution (Percentage of funds disbursed)								
100	100	44.6	38.1	55.4	61.9			
100	100	10.9	8.6	89.1	91.4			
100	100	22.7	18.5	77.3	81.5			
100	100	13.7	23.2	86.3	76.9			
100	100	12.4	13.2	87.6	86.8			
100	100	25.2	14.4	74.8	85.7			
100	100	17.6	20.0	82.5	80.0			
100	100	20.6	28.3	79.4	71.7			
100	100	10.59	11.6	89.4	88.4			
100	100	21.27	18.0	78.7	82.1			
	2002 seholds receive 11.0 24.6 19.0 8.7 1.2 0.8 0.4 3.0 57.1 funds disburse 100 100 100 100 100 100 100 1	Total 2002 2005	Total P 2002 2002 rseholds receiving benefit) 11.0 12.7 24.6 24.6 23.5 15.8 19.0 18.8 25.1 8.7 8.8 9.9 1.2 0.5 1 0.8 0.4 0.8 0.4 0.9 0.3 3.0 2.5 1.6 57.1 56.1 63.5 funds disbursed) 100 100 44.6 100 100 10.9 100 100 13.7 100 100 12.4 100 100 25.2 100 100 17.6 100 100 20.6 100 100 10.59	Total Poor 2002 2005 2002 2005 iseholds receiving benefit) 11.0 12.7 24.6 32.5 24.6 23.5 15.8 15.8 19.0 18.8 25.1 23.4 8.7 8.8 9.9 12.9 1.2 0.5 1 0.7 0.8 0.4 0.8 0.4 0.4 0.9 0.3 1.8 3.0 2.5 1.6 2.1 57.1 56.1 63.5 71.8 funds disbursed) 100 10.9 8.6 100 100 10.9 8.6 100 100 12.7 18.5 100 100 12.4 13.2 100 100 12.4 13.2 100 100 25.2 14.4 100 100 20.6 28.3 100 100 10.59 11.6	2002 2002 2005 2002 useholds receiving benefit) 11.0 12.7 24.6 32.5 7.8 24.6 23.5 15.8 15.8 26.6 19.0 18.8 25.1 23.4 17.6 8.7 8.8 9.9 12.9 8.4 1.2 0.5 1 0.7 1.3 0.8 0.4 0.8 0.4 0.7 0.4 0.9 0.3 1.8 0.4 3.0 2.5 1.6 2.1 3.3 57.1 56.1 63.5 71.8 55.6 funds disbursed) 100 100 44.6 38.1 55.4 100 100 10.9 8.6 89.1 100 100 13.7 23.2 86.3 100 100 12.4 13.2 87.6 100 100 25.2 14.4			

Source: LSMS 2002 and 2005.

Table 8.4. Poverty Levels With and Without Individual Social Protection Programs, 2005

	Population	n, Overall	Recipients Only		
	Without	With	Without	With	
All Programs	30%	19%	44%	24%	
Ndihme Ekonomike	20%	19%	50%	40%	
Urban Old Age Pension	24%	19%	39%	14%	
Rural Old Age Pension	22%	19%	39%	23%	
Other Pensions	20%	19%	41%	27%	
Unemployment Benefits	19%	19%	30%	25%	
Maternity Benefits	19%	19%	33%	23%	
Social Care	19%	19%	44%	22%	

Source: LSMS 2005.

8.4 The pension system has the largest impact on poverty. Ndihme Ekonomike, Albania's main social assistance program, although more appropriately targeted on the extreme poor has a more marginal impact both in terms of coverage and adequacy of benefits. The most commonly received public transfers are urban pensions (24 percent of households), rural pensions (19 percent) and Ndihme Ekonomike (13 percent) (Table 8.3). Although pensions, as contributory systems with consumption smoothing objectives are not expected to directly impact poverty, the relatively wide coverage of beneficiaries in Albania has important poverty implications.

8.5 Almost half of all poor households report receiving a public pension compared with about one third of poor households which report receiving Ndihme Ekonomike (NE). Although low by regional standards, urban pensions are still equal to more than one third of household consumption among the poorest urban households while rural pensions equal about 20 percent of consumption among the poorest rural households. Ndihme Economike, on the other hand, accounts for a smaller share of total household consumption — 11 percent among the poorest rural households and 16 percent among the poorest urban households (Table 8.5). Average NE benefits are equal to less than 15 percent of the poverty line, which highlights the need for beneficiaries to find additional sources of support.

Table 8.5. Adequacy: The Importance of Public Transfers in Household Consumption, 2005 (Value of Transfer As A Percent of Household Consumption)

		Area		Urban	Quintiles	Rural Quintiles	
	Total	Urban	Rural	Poorest	Wealthiest	Poorest	Wealthiest
Ndihme Ekonomike	8.5	9.9	7.8	16.0	5.8	11.0	4.5
Urban Old Age Pension	28.0	28.1	27.8	41.4	21.2	41.8	13.6
Rural Old Age Pension	14.4	15.1	14.3	20.9	11.8	21.1	9.9
Other Pensions	19.9	20.5	19.2	44.7	11.8	30.5	8.0
Unemployment Benefit	15.5	14.2	25.7	14.2	7.5	54.7	0.0
Maternity Benefit	11.3	14.9	7.0	28.7	8.9	6.3	2.9
Social Care	16.1	19.2	14.2	28.5	11.4	31.0	0.0
Other Public Transfers	18.8	20.5	15.9	29.0	25.5	21.7	24.0
All/Any Public Transfers	23.5	27.3	20.3	37.8	21.1	28.0	12.9

Source: LSMS, 2005.

8.6 Poor households are more likely to be in receipt of rural pensions while non-poor households are more likely to be in receipt of urban pensions. The differences in incidence and coverage of the urban and rural pension schemes underscore the fact, that although both play a safety net role, more of the rural pensioners would be poor if they did not receive pensions.

8.7 In fact, in the absence of the urban pension, the overall poverty headcount could be 5 percentage points higher and the poverty rates among recipients would be 25 percentage points higher (Table 8.4). Rural pensions have only marginal impact on the poverty levels, but considerable impact on beneficiary households where the estimated poverty rate in the absence of the rural pension could be 14 percentage points higher. Ndihme Ekonomike, Albania's only means tested program, results in only a onepercentage point reduction in poverty rates for the total population although in the absence of the program poverty rates would be 10-percentage points higher among beneficiaries.

8.8 Given the current importance of social insurance in Albania's poverty profile and the general inadequacy of social assistance programs, any reform of the former must clearly be formulated in conjunction with reforms of social assistance. Over time, however, the implicit poverty coverage of poor households by the pension system is likely to be reduced as poverty levels continue to fall. Already, between 2002 and 2005, the share of pension beneficiaries that are poor fell from 18.0 to 14.3 percent. In the meantime, Ndihme Ekonomike has seen some improvement in poverty targeting over the period but also a slight reduction in their adequacy of their, already notably low, benefits (section Ndikme Ekonomike).

Example 31. Impact

Source: Tesliuc, Pop and Florescu (2003) "Protecting the Poor and Vulnerable in Romania", Background Paper for Romania poverty assessment.

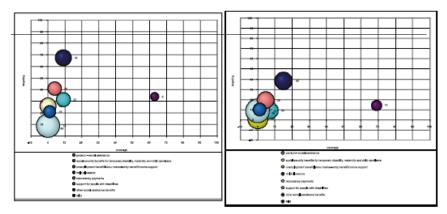
Overall effectiveness of social protection programs in reducing poverty

The indicators of coverage, absolute target incidence and relative target incidence (importance/adequacy), all reveal important information about the effectiveness of social protection programs. This section seeks to combine those multiple indicators for a more comprehensive review of these programs, in particular with respect to their effectiveness in reducing poverty.

Figure 1 plots in a single graph the three related concepts of coverage, absolute target incidence and adequacy for various social protection programs based on a simulated model that classifies the poor based on a counterfactual of consumption (in the absence the transfers, see section II). The x-axis presents the coverage of the poor. The share of total benefits received by the poor is plotted on the y-axis (absolute target incidence). Adequacy (relative incidence) is captured by the size of the "bubbles" in the graphs (and mentioned on the graph, next to the "bubble"). A "perfectly-targeted program" would be located on the upper right-hand side of these graphs, with a large bubble (equal to the size of the poverty gap before the transfer).

The effectiveness of programs and policies varies significantly (figure 1). Three types of programs are observed. First, the MIG has the best targeting performance, although low coverage and benefit adequacy. Second, the child allowances are less well targeted but have the largest coverage of the poor and extreme poor. Finally, the rest of the programs have high leakage, low coverage of the poor. Some programs within this group may be good candidates for rationalization, with the resulting savings to be added to the MIG.

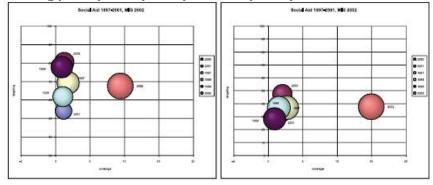
Figure 1. Effectiveness of social protection programs in reducing poverty Total poverty Extreme poverty



Source: World Bank staff estimations based on ABF 2002.

Figure 2 illustrates the improvement in coverage that occurs with the implementation of the MIG in 2002. Compared to the previous Social Aid Program, the MIG has better benefit adequacy and substantially higher coverage. However, the program does not serve a large fraction of the poorest 20 percent of the population (89 percent of them).

Figure 2. Change in the effectiveness of the Social Aid/MIG Program in reducing poverty Total poverty Extreme poverty



Source: World Bank staff estimations based on ABF 2002.

The government has a good tool to reduce extreme poverty in Romania: the MIG Program. Marginal benefit incidence analysis had shown that an expansion of the program can be implemented without a loss in its targeting performance. Increased funding, to the target level allocated for 2002 of 0.4 percent of GDP or even more, will cover an increasing proportion of the extreme poor.

Some of the extreme poor, however, are likely to be missed by the program, as illustrated in table A1 and A2. In 2002, the program was successful in covering larger households, those where the couple was living together or unmarried (pooling resources, while one of the adults claimed the benefits only for him and all

dependents), the Rroma (compared to an average coverage of the poorest decile of 17 percent, the coverage of extremely poor Rromas was 36 percent), those headed by adults with little or no formal schooling, by farmers, by the unemployed and by housewives. In general, MIG recipients are households familiar with the social assistance system; most of them (87 percent of total recipients) receive a number of other social assistance benefits, especially child allowances.

The extreme poor households who failed to be covered by MIG benefits are most often urban households, households affected by industrial restructuring which do not take up the program due to stigma costs and households with two or more able-bodied individuals. These households are equally poor and need to be covered by the program. Changing the MIG program administration rules to bring them into the safety net and help them to climb out of poverty is the main challenge faced by the current administration. The next section suggests a number of changes in program implementation to facilitate such an outcome.

Example 32. Recommendations

Source: Bulgaria Public Expenditure Issues and Directions for Reform 2003. A Public Expenditure and Institutional Review, Report No. 23979-BUL.

Implementation: challenges and issues

8.27 As the previous section highlighted, the reform constitutes a major leap forward in building a more secure and stable pension system. Although the basic legal and institutional foundations of the new system are already operational, these foundations present some weaknesses that could hinder the successful development of the new system unless they are properly addressed. The structural framework of the new system will also have to evolve along with developments in Bulgaria's broader financial markets and its eventual accession into the European Union. The main outstanding issues and key implementation challenges are presented below in short (one to two years), medium (five additional years) and long-term frameworks. Simulations of the financial performance of the new pension system over the long-term under various assumptions are included in a forthcoming report on social protection and poverty reduction in Bulgaria.

Short-term issues

8.28 Enhancing compliance and coverage. Preliminary simulations conducted by the NSSI suggest that the system will reach a comfortable financial position by the end of decade, even after accounting for transition costs. The simulations assume important improvements in compliance. Special efforts to enhance compliance initiated in 2001 (such as joint audits with the General Tax Directorate) should continue and the plan to unify collection of social security contributions and taxes

should be reinvigorated, as its completion date has been slipping further into the future. Expansion of the system's coverage merits special attention, as some economic groups have been poorly covered by the system since the early transition days, especially workers in the agricultural sector. Similarly, efforts to enhance revenue and expenditure control on the resources accumulated in or disbursed from the social insurance funds should continue. The amendments to the Mandatory Social Insurance Code introduced in early 2002 increased the coverage of the system: employees working short-term (up to 5 working days per month), previously only insured against disability or work injury, are now insured for old age and self-employed, craftsmen, owners, farmers, paying contributions themselves, may be insured also against general sickness risks.

8.29 Monitoring and restraining the rise in disability trends. The recent changes in legislation entitle beneficiaries with disabilities of more than 70 percent to additional pension disability, calculated at 25 percent of the social pension for disability. This has generated a surge in social claims. The number of newly added social pensions increased to 190,000 in 2001 compared to 82,400 a year earlier. The increase in the expenditure on social pensions is estimated at 0.11 percent of GDP prior to the introduction of this new benefit. The probability of becoming disabled is positively correlated with aging and deteriorating health. It is inevitable that the increase in the statutory retirement age will produce a rise in the overall number of disabled, but the surge observed during 2001 points to a potentially deeper problem. It is recommended that the NSSI closely monitor disability trends and cautiously study disability regulations and administrative procedures if the abnormal rise in the number of disabled continues over the next year.

8.30 Clear rules for indexing pensions. The new legislative framework set forth clear criteria for determining benefits but failed to define a transparent rule for indexing benefits, retaining a fair amount of policy discretion in this area. Discretion can help control short-term volatility in the system, but it can equally foster inappropriate management of pension expenditures. Beneficiaries will also prefer a more predictable pension indexation provision in order to enjoy a smoother income and consumption pattern rather than confronting ad hoc changes. The comfortable financial position achieved by the public pillar by the end of the decade suggests that benefits could be indexed to inflation, plus a modest percentage of real wage growth.

8.31 *Prompt and transparent transfer of contributions to private pension funds.* A new IT system is already operational at the NSSI to support the collection of social security contributions for the PAYG, as well as the universal and occupational pension funds. The universal pillar, effectively launched on January 1, 2002, will

not face the severe disruptions encountered in other European economies at the outset of the multi-pillar reform, like in Poand. Nonetheless, 10 percent of contributions from occupational pension plans have not yet been reconciled. These contributions are administered by the BNB and receive a 2 percent nominal interest rate, yielding a negative interest rate and imposing a severe penalty on workers. In addition, an amendment was introduced in late 2001 expanding the period for transferring contributions from 10 to 30 days. It is critical that the NSSI issues transparent procedures for transferring contributions and that this period reverts from 30 to 10 days by the end of 2002. A long transfer period imposes unnecessary inefficiencies and costs on worker savings, equal to the foregone investment returns. The transfer period should be shortened even further in the medium term. Contributions that are not transferred within the stipulated period should obtain a market interest rate, at a minimum the market interest rate on short-term treasury bills.

8.32 Strengthening supervision of private pension plans. A strong supervisory institution will be central to the sound development of private pension plans. SISA has less than two years of experience and is still learning about its functions. Moreover, progress in the institutional strengthening of SISA in 2001 was very limited. Thus, the institutional strengthening process should receive greater attention and government support. SISA should also intensify and formalize its collaboration with other supervisory agencies to develop joint regulations in areas that cut across different segments of the financial market and to benefit from the longer experience of those agencies. The establishment of the Consultative Committee on Financial Supervision, a separate body of senior officials from all financial services supervisory agencies, is a step forward in that direction.

8.33 Over the next two years, SISA will have to closely monitor the performance and financial sustainability of pension insurance companies and their capacity to start recovering the high investments made up-front to establish IT systems and gain market share. The financial and operational capacity of pension insurance companies seems to vary widely, with some of the smaller companies presenting a weaker profile. SISA should prepare itself to closely monitor a market restructuring process (though mergers, acquisitions and possibly even liquidations) that should subsequently result in a stronger sector.

8.34 *Upgrading regulations of private pension plans.* Regulations concerning accounting and valuation procedures should receive close attention, as they constitute the basis to assess the financial performance of pension plans. New accounting principles in accordance with international practices will become effective in 2003. New valuation procedures were issued in late 2001, but these

guidelines continue to permit a fair amount of discretion to the pension insurance companies and could benefit from additional revisions. A regulation should be issued on investments outside Bulgaria (up to 10 percent of a pension fund's assets) and permit some initial and gradual foreign diversification of pension portfolios, a matter that will become even more pressing in the medium term as pension assets build up.

8.35 Defining the contribution rate for universal pension funds. The universal pension pillar was started in 2002 with a 2 percent contribution rate. The Mandatory Social Insurance Code, however, does not prescribe the contribution rate for the public nor the private pillar—an important vacuum within the legislation. The contribution rate will be defined on a yearly basis when Parliament approves the budget for the public pension fund. At present, workers do not have the capacity to assess what could be their potential retirement income and the share that will emanate from the public and the private pillars. Such a gap and lack of strategic direction for the public and private pillars dents the credibility of the public on the overall reform and renders the pension system more vulnerable to discretionary changes and to potential reversals. Uncertainties on the funded pillar will also hamper efforts by pension insurance companies to formulate adequate business plans in order to analyze their future viability.

8.36 It is critical for the government to outline the roles of the two mandatory pillars, and the contribution rates to finance these benefits. The program should clearly define the path for increasing the contribution rate to the second pillar and be embodied within the legislative framework to prevent reversals. This plan should be accompanied by a new public education campaign, with renewed emphasis on the universal pillar, so workers can acquire a better understanding of the reform and make more educated decisions concerning private pension funds. As an option, the plan could link the increase in the contribution rate diverted to the funded pillar with the financial performance of the public fund. This link would need to be simple and transparent to assure the credibility of key stakeholders and prevent undue interference with the strategic direction of the pension reform. Such a plan would entail a prior definition of a viable pension indexation rule and the overall contribution rate to the mandatory system; such important provisions would need to be prescribed in the Mandatory Social Insurance Code.

Medium-term issues

8.37 Strengthening the legal framework. In the medium term, the legislative framework of private pension plans should be strengthened, including the governance structure of private pension plans, the authority and independence of the supervisory agency, provisions on the retirement phase and the liberalization

of the investment regime. Amendments to the Voluntary Pension Insurance Act should clarify that voluntary pension plans can offer both phased-withdrawals and annuities and define proper reserves accordingly. Pension funds are de facto offering annuities despite contradictions in the legislation.

8.38 The Mandatory Social Insurance Code, too, displays inconsistencies requiring workers to convert their savings in the universal funds into annuities, seemingly variable annuities. The law prescribes that pension insurance companies should create reserves and bear the life expectancy risk; at the same time, the law allows the heirs to receive the savings remaining in a pensioner's account upon his or her death, an inconsistency that will render the system unviable during the retirement phase. Although the retirement phase in the mandatory pillar will not be initiated for another two decades, it will be preferable to correct this serious flaw along with the introduction of other amendments to the law. Such a deficiency in the legislation could raise doubts on the long-term sustainability of the reform and discourage potential new investors from entering the pension insurance market over coming years.

8.39 Moving towards a more flexible investment regime. The infant development of Bulgaria's capital markets and cautious public debt financial policies restrict local investments available to pension funds. In the medium term, as pension assets rise relative to the size of the local capital markets, it will be necessary to increase the level of foreign diversification prescribed in the law from 10 percent to at least 25 to 30 percent. Other financial intermediaries already enjoy more liberal foreign investment policies only limited by prudential criteria on foreign exchange risk. The minimum 50 percent requirement on debt guaranteed by the state or bank deposits should be eliminated. Overall, it is preferable to define a more open investment regime in the legislation but authorize the supervisor to prescribe stricter criteria in the regulation. Such flexibility permits easier changes in the portfolio investment, in accordance with evolving market conditions.

8.40 The government has formed a working group which is carrying out active consultation with stakeholders to develop and propose legislative solutions to address several of the short- and long-term issues discussed in the previous two sub-sections, including clarifying the functions of the SISA, improving the investment regime and management of pension schemes.

Long-term issues

8.41 *Integrating private pensions funds with other financial markets and the EU.* In the long-term, the private pension system should be better integrated with the rest of Bulgaria's financial markets and Bulgaria's accession into the European

Union. This will imply the elimination of restrictions to foreign diversification; permit pension insurance company to offer a more diverse set of funds; and allow life insurance companies to provide annuities within the mandatory scheme removing the market segmentation presently envisioned in the legislation.

8.42 *Increasing the retirement age of women.* The public pillar will also have to adapt to EU regulations eliminating any provisions that discriminate among genders and equalizing the minimum retirement age between men and women. The increase in the retirement age of women from 60 to 63 years should be motivated not only by EU regulations but also to adjust to improvements in life expectancy and by the long-term financial sustainability of the system. Preliminary NSSI actuarial projections on the financial performance of the public pillar incorporate extremely conservative estimates on life expectancy of retirees, compared to other middle income countries. Improved life expectancy over the long term will worsen the system's dependency ratio and the overall financial position of the pension system calling for a higher retirement age, even 63 years remains low compared to the standards of OECD countries.

Example 33. Recommendations

Source: Republic of Moldova Improving Public Expenditure Efficiency for Growth and Poverty Reduction 2007, Report No. 37933-MD.

D. POLICY RECOMMENDATIONS

8.28 We look first at what the government intends to do, we then see whether it can be done and on the basis of this assessment, we propose alternative or complementary solutions. The focus is on the financial efficiency and poverty alleviation capacity of the system

8.29 The Government of Moldova (GOM) has repeatedly stated the necessity to reform the social assistance system in various social reports over the years. Many of the shortcomings that we have highlighted in this chapter have been already identified by ministerial staff and reported on different occasions in formal and informal meetings and reports. The Government has clearly understood that social benefits are not achieving the main objective they are designed for: support the poor and the vulnerable.

8.30 In order to reform the social assistance system, the GOM went through a number of key steps. In December 2003, an inter-ministerial commission charged with implementing the new social protection strategy was established and in December 2004 the Government approved the Economic Growth and Poverty Reduction Strategy Paper (EGPRSP) which outlined a number of objectives and the long-term strategy for social assistance reforms. The 2004 Social report

published in 2005 explained more in detail the main features of the reform and this plan was further developed and finally approved with Government resolution No. 15 1-1 5311221 "On Streamlining the Social Assistance System", dated November 1, 2005. Box 4 shows the main guidelines of the government reform strategy.

8.31 The adoption of the new system should require the implementation of four main steps: A first step where the appropriate filters and scoring mechanism are selected and put into law; a second step with the implementation of a pilot project aimed at testing the efficiency of the filters in selected areas; a third step for introducing the new system at the national level; and a fourth step when these filters will be assessed and revised on a regular basis. Step one and two are already in their implementation phase while step three is expected to be implemented in 2007.

8.32 On the surface, the government reform strategy is sound and would be able to address many of the shortcomings of the social assistance system that we have identified in this chapter. However, some of the elements that will cover the gap between intentions and actions have yet to be defined in some important areas.

Box 6: The Government Reform Strategy

A. Long term pillars (EGPRSP)

- 1. Monitoring individual programs in order to improve eligibility criteria and rationalise types, forms and duration of benefits;
- Provision of social benefits to the poor which will require the development and approval of poverty criteria and a household welfare evaluation mechanism;
- Creation of a separate social assistance budget;
- Development of a unified database management system for social assistance beneficiaries;
- 5. Revision of the legal framework;
- Improvements in the institutional coordination mechanisms.

B. Medium term actions (EGPRSP)

- 1. Monitoring of the social assistance programs carried out in the framework of the EGPRSP implementation;
- Gradual introduction of a means tested system;
- 3. Legislation, poverty assessment and household welfare assessment mechanisms designed with external assistance;
- Separation of the social assistance budget from the state social insurance budget;
- Institution of a single database for social assistance.

C. Specific recommendations (Govt. resolution No. 151-153/1221)

- Household welfare should be assessed with a mixed system made of means-tested mechanisms accompanied by proxy-means filters.
- 2. Well-being should be assessed based on income and non income criteria looking at living standards in their complexity
- . Urban and rural areas should be assessed using different criteria.
- 4. The Subsistence Minimum established by law annually should be used as a benchmark for establishing benefits' size
- 5. Household income should be made of all sources whether in cash or in kind including social services provisions.
- Benefits earned for special state merits should be separated from benefits earned on the basis of low income. This should be achieved by reducing the number of benefits and categories of beneficiaries and by reducing the possibility of earning multiple benefits.
- Household income assessment should be initially made annually and later, if possible, every six months.
 Two pillars of the new system are the income assessment and the improvement of the accessibility to social assistance. This
- Two pillars of the new system are the income assessment and the improvement of the accessibility to social assistance. This
 means that the role of local authorities in the implementation of the new system is essential. The new figure of social assistant
 introduced by law in 2003 should be strengthened.
 The role and functions of the social assistant should be clarified and a new questionnaire for social assistance should be
- 9. The role and functions of the social assistant should be clarified and a new questionnaire for social assistance should be developed. The database for social assistance beneficiaries should be unified and for this purpose it is necessary to implement two steps: 1) Separation of responsibilities between social assistance and family protection departments, who will be charged with the material assessment of the families, and the NSIH who will be charged with keeping a separate and unified database of social assistance beneficiaries; 2) The social assistance and family protection units will take full responsibility for the provision, payment and tracking of social service provision.
- The changes proposed will require changes in the finance mechanisms and allocations of resources. These changes should be implemented in the framework of the Medium Term Expenditure Framework (MTEF).
- 11. The new system will be tested with a pilot project.

A. Revision of the legal framework and transition to a means tested system

8.33 There is not much in the government reform agenda on the legislative changes that need to be introduced to reform the system. Yet, this is essential and preliminary to most of the reforms suggested. Some actions such as defining the methods for means-testing can be implemented with government resolutions but some others such as changes in the benefits structure will require new legislation. Moreover, the introduction of new legislation will require a clear vision of how the social assistance benefits system should look like after the reforms.

8.34 The reform strategy is also silent on the categories and benefits that need to be suppressed in order to move from a categorical to a means tested system. As it stands, it would seem that means tested filters will accompany each category of benefit but that all categories and all benefits will remain even if the strategy calls for a unification of benefits. It is also clear from the various exchanges we had on this topic with government officials that, so far, there has been little discussion on which benefits and categories should be discontinued and when. This is a problem also because the question of multiple benefits beneficiaries cannot be addressed without the streamlining of existing benefits.

8.35 The lack of clarity about legal changes and about the shift from a categorical to a means tested system may hide a more substantial political obstacle. It is understandable that announcing the elimination of categorical benefits is not a politically sound move and that people will need a great deal of information about the shift from one system to another to accept such changes. And even then many people who are not poor and are currently benefiting from social transfers will resist such changes. For this reason, it is not guaranteed that parliament will endorse the reforms. The current government has been elected and supported by former communists and most of the changes made in the social assistance sphere in the course of the first mandate have been in the direction of stepping back towards a Soviet-type system of categorical benefits focused on war veterans and the disabled. This is what clearly emerged from this study. It is hard to see how parliament will be easily convinced about the necessity to shift from a categorical to a means tested benefits. In other words, while ministerial staff and even some ministries may be convinced of the necessity of the reforms, these same reforms may be dumped by parliament when submitted as laws. Rather than sidelining the problem, the solution would be to draft a calendar for change which clearly indicates which benefits and categories should be discontinued and when and bring this agenda in the public domain as soon as possible.

B. Administrative division between social insurance and social assistance

8.36 The reform strategy includes the separation of the social insurance and social assistance budgets and the separation of the two database systems. As already described, at present the NSM manages social insurance and social assistance jointly. This reform is long overdue and would make social assistance consistent with its scope. However, while the NSM is an established and experienced body there is no equivalent for social assistance precisely because social assistance is largely managed by the NSM. The institutional capacity needs to be established and developed.

8.37 Creating a new social assistance agency is costly and the Government itself has suggested keeping the administration of social assistance under the responsibility of the NSM. In this case, the NSJH becomes a social protection rather than a social insurance institution and needs to operate a clear distinction between social insurance and social assistance in-house by creating separate departments with separate budgets and data management systems. This is perhaps the most feasible and least costly solution at present. It would also facilitate the needed division between the insured and non-insured for children and disabled benefits. Keeping the insured and the non insured under the same agency certainly simplifies the monitoring and coordination of these benefits.

8.38 It is also suggested that benefits earned for special state merits should be separated from means tested benefits. We argued that this was a problem and the government agrees but there are no suggestions on alternative management solutions. If war veterans' benefits are separated from social assistance they can either stand on their own and be administered separately or they have to go under social insurance. Given that there is no ground to justify the presence of war veterans' benefits under social insurance, the most sensible option is to keep the management of these benefits separate from both social assistance and social insurance. The same argument applies to benefits designed for extraordinary calamities which will have to stand on their own under a separate 'humanitarian' chapter. Such changes are mostly simple nominal reallocations and do not really require additional finance or extra administrative costs provided that the NSM continues to administer all benefits. If this is the case, then the scope of the agency should be redefined as social protection rather than social insurance agency and the budget and administrative subdivisions should be clarified. Any alternative which will require the establishment of new administrative bodies is likely to be more expensive.

C. Develop a means-tested system of welfare evaluation

8.39 This is one area where the government agenda is more specific. The November 2005 resolution explains in detail and compares various technical options for evaluating welfare and it is suggested to use a combination of means and proxy-means testing together with the required documentation. There is a government regulation (No. 1084, 4* October 2004) which explains how to assess household and individual income. This will need to be updated but some of the main guidelines are in place. There is also an on going pilot project which is testing with means tests filters applied on utilities compensations. The results of this test are expected to guide the government with further reforms. This is perhaps the area of social assistance reforms where the government is more advanced with. If implemented, the proposed reform is expected to improve significantly equity and vertical efficiency.

D. Enhancement of the role of local administrations

8.40 Shifting from a categorical to a means tested system requires the strengthening of local capacity in the functions of income assessment and delivery of benefits. This strengthening is in the reform agenda and includes the increase of responsibility of the new figure of social assistant introduced in 2003 and the separation of the social assistance and family protection units at the local level. The family protection units are expected to carry out the household welfare assessment while the social assistance units are expected to administer the benefits. These reforms are certainly needed and will require an initial investment in training and in the administrative reorganization at the local level. What is still missing is the detailed schedule and costing of these activities.

E. Improve monitoring and evaluation of social assistance benefits

8.41 In order to be able to properly monitor social assistance benefits some additional actions need to be outlined after the determination of the new set of benefits that should substitute the current structure. First, the NSM, Statistical Bureau and MHSP should agree on a single terminology of benefits which is also compliant with existing legislation and the state budget. Second, the HBSs questionnaire needs to be adjusted so that questions are able to identify each possible category of beneficiary and each possible type of benefits. Third, a joint monitoring and evaluation unit between the statistical bureau, the MHSP and the NSM should be established and trained to use the HBSs and macro data for such evaluation. As a result of these measures a monitoring and evaluation report should be published on a regular basis.

F. Other issues

8.42 The sequence of reforms is also important and the legislative changes that will be necessary to reduce the number of benefits and to shift toward an income based system should be prior to the administrative changes which require a lengthy phase of adjustments of the organizations involved. Again, the political obstacles described should not be undervalued in the process of reforms and the existing political knots (if any) should be untied before the administrative reforms are undertaken.

8.43 The government also faces a complex financial dilemma. On the one hand, even if the government will manage to keep social benefits expenditure at the same level of 2004 as a percentage of government expenditure (and achieve in this way a real growth of expenditure of over 64%) and even if the government is extremely good in improving targeting and distribution, the social benefit budget will still be small. It was shown how a simple redistribution of social benefits from the top to the bottom quintile will not affect the poverty headcount. We should not expect social benefits, under any possible scenario, to be a major force for poverty reduction in the medium term unless the government budget increases expenditure very significantly. On the other hand, expenditure should not be increased until the government manages to improve targeting and distribution. Increasing expenditure with the existing distributive system will increase relative poverty, not decrease it.

8.44 These considerations suggest that solutions are complex and long-term. Redistribution cannot occur with drastic measures but needs to be a fine tuning exercise. Simply canceling benefits to the rich is not feasible in the short-term and it is irrelevant to give micro amounts to the poor. We suggest instead a two-tier long-term approach:

• The focus should be first and foremost on the very poor and the amounts should be adequate to close the gap with the extreme poverty line. This is because this group is the most disadvantaged by definition and because we showed that the poverty rates of this group are relatively more sensitive to changes in social assistance benefits. Activities aimed at improving the distribution of benefits should be focused on increasing the transfers to the very poor by adjusting first the benefits with the worst performance. Utilities compensations and material assistance should be the benefits to reform first followed by social allowances and child benefits in this order. The objective here is to lift the very poor out of deep poverty. The cost of this activity has been estimated in Table 8.1 and this cost could be covered in part via redistribution and in part via

the estimated growth in real expenditure.

The next focus group should the poor who are not extreme poor. For this group, the focus should be on the transition toward the formal social insurance system. In a sentence, active labor market policies instead of social assistance. This is costly but could be financed partly out of the real increase in social assistance expenditure keeping this expenditure constant as a percentage of Government expenditure and partly out of the budget for ALMPs. These policies should be specially tailored for the poor with means-tests and linked to social assistance benefits for example by offering to social assistance beneficiaries the alternative of a public work. Public works, social funds, work for food schemes and micro-credits for start-up businesses would be some of the possible schemes to utilize. This policy should achieve a double objective: stop the current outflow of people from social insurance and free financial resources to be reallocated to the very poor. An estimate of costs and benefits of this proposal should be made once the specificities of the ALMPs have been defined.

8.45 In the meantime, there are other short and medium term actions that may prove to be effective from a financial perspective. One is a thorough evaluation of the disability assessment procedures. The disabled are the largest category of beneficiaries and the single category with the largest number of benefits. Being diagnosed with a disability gives automatic access to a range of benefits and the diagnosis is often an arbitrary decision based on medical evidence. It is no mystery that disability commissions worldwide are prone to corruption, collusion or mismanagement. This does not have to be the case in Moldova but reviewing procedures and test existing disabled on a random basis is a useful tool to make sure that the system is healthy and there is no waste of resources.

8.46 A second grey area is material assistance. This is the largest benefit in terms of beneficiaries and the third in terms of expenditure. It is mostly extrabudgetary and for this reason reforms of this benefit will not lead to automatic state budget savings. However, revenues are growing, they are property of the state and it is expected that these funds should be well spent. At present, the central management of the benefit which is the social support fund of the population is very weak and very little transparent while there is a wealth of data at the local level which have never been mined. In this case, a thorough analysis will have to start with the data collection and with an assessment of national financial procedures and local administrative practices. This exercise may lead to findings that can help to improve the financial administration of the fund. Also,

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given the experience accumulated by the local staff in visiting households and compiling the income based questionnaire, this benefit is the ideal candidate for experimenting with a full means tested system.

Example 34. Recommendations

Source: Republic of Moldova Improving Public Expenditure Efficiency for Growth and Poverty Reduction 2007, Report No. 37933-MD.

Condensed version of recommendations in Example 33:

8.47 In sum, the government reform agenda provides a good platform for reforms but should be complemented with a number of short and medium-term actions to achieve the proposed long term objectives as follows:

Short-term actions

- Define the future structure of social assistance benefits (number of benefits, categories, etc);
- Define a more specific calendar for the discontinuation of existing categorical benefits and the transition to a means-tested system;
- Draft the legal changes required and open this draft to public debate;
- · Evaluation of the disability assessment procedures;
- Review of the Republican Social Support Fund and Local Funds.

Medium-term actions

- Submit legislative reforms to parliament;
- Reorganise the NSIH into a Social Protection agency with administrative and budget subdivisions for social insurance and social assistance according to the new social assistance structure;
- · Implement the reforms of individual benefits;
- Develop a system of monitoring and evaluation of social assistance benefits with changes in the HBSs and the establishment of a monitoring and evaluation group;
- Design active labor market programs for the poor linked to social assistance benefits and prepare a cost benefit analysis of such proposal.

Long-term objectives

- Progressive redistribution of the existing benefits in favor of the very poor;
- Progressive transition of social assistance beneficiaries to social insurance schemes.

Example 35. Recommendations

Source: Republic of Tunisia Employment Strategy 2003, Vol. 1, Report No.

25456-TUN.

Key issues and findings	Outcomes	Suggested policy measures	Action plan for implementation		
Active labor market programs (ALMPs)					
Tunisia's active labor market policy has evolved over the past decades and are the most exhaustive in the region. Number of programs has prolifer- ated over time, their objectives, information and implementation mechanisms are not always clear (e.g., 2121). There is no evidence on the impact of the programs.	Many initiatives to support mainly first-time job seekers, similar in purpose and target group, information are lacking on explicit targeting. No systemic basis for allocating reffs to effective programs.	Developing a streamlined menu of ALM interventions which could simplify coordination, render monitoring and accountability more transparent, and make it easier for clients to understand their options. Defining clearly targeting objectives in the programs. On a regular basis, adjusting and improving efficiencies of the programs according to the needs.	Reviewing in detail ALMPs com- position. Regular monitoring of the pro- grams and reforms. Implementing sound impact evaluation studies of the ALMPs (including pre-employment and in-service training programs) for efficiently allocating public resources and adjusting and reforming programs.		
Existing programs (e.g., micro- credits) target mainly the youth unemployed.	There is no appropriate social protection system that provide temporary support for those who may lose their job.	Introducing social protection schemes targeted to workers already in the labor market and those at risk of income loss.	Regular maintoring of the pro- grams and reforms. Emphasizing on employment services to facilitate job search, retraining to adjust workers skill to changes in the economy and considering options for passive income support system.		

Key issues and findings	Outcomes	Suggested policy measures	Action plan for implementation
Active labor market program:	s (ALMPs)		
Training system is still supply	Gaps between skills offered by	Continuing vocational training	Faster implementation of the
driven, links to market needs are	first time job seekers and skills in	reforms.	reforms.
weak and implementation of the reform agenda has been slow.	demand by the market. Negative impact on competitive-	Promoting development of high quality in-service training (par-	Eliminating obstacles that impo
Low in-service training (specially	ness and upgrading of workers	ticularly in SMEs).	(through review of financing or
in SMEs).	skills.		tions for in-service training and reform of vocational training ta

References and Resources

Good PERs

- Albania PER 2006.
- Armenia PER 2003.
- Guatemala PER 2005.
- Honduras PER 2007.
- Ethiopia PER 2003.
- Moldova PER 2007.

References

Besley, Timothy, R. Burgess and I. Rasul. 2003. *Benchmarking Government Provision of Social Safety Nets.* Social Protection Discussion Paper 0315. . Washington, D.C.: World Bank.

Bourguignon, Francois, Francisco Ferreira and Phillippe Leite. 2003. "Conditional Cash Transfers, Schooling and Child Labor: Micro-Simulating Bolsa Escola." *World Bank Economic Review* 17(2): 229–54.

Coady, David, M. Grosh and J. Hoddinott. 2004. *Targeting of Transfers in Developing Countries: Review of Experience and Lessons.* Washington, D.C.: World Bank.

Coudouel, Aline, Kene Ezemenari, Margaret Grosh and Lynne Sherburne-Benz. 2001. "Social Protection." In the World Bank, *Poverty Reduction Sourcebook,* Washington, D.C.: World Bank.

De Ferranti, D., G. Perry, I. Gill and L. Servén. 2000. *Securing Our Future in a Global Economy.* Washington, D.C.: World Bank Latin American and Caribbean Studies.

Deaton, Angus and Salman Zaidi. 2002. "Guidelines for Constructing Consumption Aggregates for Welfare Analysis." Living Standards Measurement Study, Working Paper 135, Washington, D.C.: World Bank.

del Ninno, Carlo, Kalanidhi Subbarao, and Annamaria Milazzo. 2009. "How to Make Public Works Work: A Review of the Experiences." Social Protection Discussion Paper 0905. Washington, D.C.: World Bank.

Demery, Lionel. 2003 draft. "Analyzing the Incidence of Public Spending." In F. Bourguignon and L. Pereira da Silva, eds., *Evaluating the Poverty and Distributional Impact of Economic Policies (Techniques and Tools)*. Washington, D.C.: World Bank.

Disney, Richard, Gustavo Demarco, Robert Palacios, Montserrat Pallarès-Miralles and Edward Whitehouse. 2002. "Building a Secure, Sustainable and Modern Retirement-Income System in Senegal." Processed, Africa Region, Washington, D.C.: World Bank.

Fiszbein, Ariel and Norbert Schady with Francisco H.G. Ferreira, Margaret Grosh, Niall Keleher, Pedro Olinto, and Emmanuel Skoufias. 2009. *Conditional Cash Transfers. Reducing Present and Future Poverty*, Washington, D.C.: World Bank.

Grosh, Margaret, Carlo del Ninno, Emil Tesliuc, and Azedine Ouerghi. 2008. For Protection and Promotion. The Design and Implementation of Effective Safety

Nets. Washington, D.C.: World Bank. Available at http://go.worldbank.org/K0Z8SB4VJ0.

Grosh, Margaret. 1994. *Administering Targeted Social Programs in Latin America: From Platitudes to Practice.* Washington, D.C.: World Bank.

Heitzmann, Karin, R. Canagarajah and P. Siegel. 2002. *Guidelines for Assessing the Sources of Risk and Vulnerability.* World Bank Social Protection Discussion Paper 0218. Washington, D.C.: World Bank.

Hinz, Richard and Montserrat Pallarès-Miralles. 2009. "International Patterns of Pension Provision II. Facts and Figures of the 2000s", Draft April 25, Washington, D.C.: World Bank.

Holzmann, Robert and Steen Jorgensen. 1999. "Social Protection as Social Risk Management: Conceptual Underpinnings for the Social Protection Sector Strategy Paper." Social Protection Discussion Paper 9904, Washington, D.C.: World Bank.

Leite, Philippe and Emil Tesliuc. 2009. "Quick-But-Not-Dirty Policy Analysis Using ADePT." Presentation for Hands-on BBL with LAC SP Team, March 5, Washington, DC: World Bank.

Marques, José Silvério. 2002. "Central America: Cross-Country Evaluation of Social Safety Net Assessments (SSNAs)." World Bank Issues Paper, Washington, D.C.: World Bank.

Palacios, Robert and Montserrat Pallares-Miralles. 2000. *International Patterns of Pension Provision*. World Bank Social Protection Discussion Paper 0009. Washington, D.C.: World Bank.

Snyder, James, and Irene Yackovlev. 2000. "Political and Economic Determinants of Government Spending on Social Protection Programs." In MIT Department of Political Science and Economics regional study *Securing Our Future in a Global Economy*. Office of the Chief Economist, Latin America and Caribbean Region, Washington, D.C.: World Bank.

Hoogeveen, Johannes, Emil Tesliuc, Renos Vakis, and Stefan Dercon. 2004. "A Guide to the Analysis of Risk, Vulnerability and Vulnerable Groups," available at http://go.worldbank.org/D13HO09YV0.

Tesliuc, Emil. 2003. "Social Risk Management", in *Kyrgyz Republic Poverty Assessment*. Washington, D.C.: World Bank.

Tesliuc, Emil, Lucian Pop, and Richard Florescu. 2003. "Romania—Protecting the Poor and Vulnerable." Europe and Central Asia Region, (processed) Washington, D.C.: World Bank.

Kozel, Valerie, Pierre Fallavier, and Reena Badiani. 2008. "Risk and Vulnerability Analysis in World Bank Analytic Work: FY2000—FY2007." SP Discussion Paper 0812. Washington, D.C.: World Bank.

Tesliuc, Emil and Christian van Stolk. Forthcoming. "Reducing Error, Fraud and Corruption (EFC) in Social Protection Programs." Social Protection Discussion Paper. Washington, DC: World Bank.

Van de Walle, Dominique. 2003 ."Behavioral Incidence Analysis of Public Spending and Social Programs." In F. Bourguignon and L. Pereira da Silva, eds., *Evaluating the Poverty and Distributional Impact of Economic Policies*, Washington, D.C.: World Bank.

Van de Walle, Dominique. 2002. "The Static and Dynamic Incidence of Vietnam's Public Safety Net." World Bank Policy Research Working Paper 2791. Washington, D.C.: World Bank.

Van de Walle, Dominique, M. Ravallion and M. Gautam. 1994. "How Well Does

the Social Safety Net Work? The Incidence of Cash Benefits in Hungary, 1987–89." World Bank Living Standards Measurement Study Working Paper 102. Washington, D.C.: World Bank.

World Bank. 2009. *IBRD Program Document for a Proposed Loan to Romania for a First Development Policy Loan*, Draft, May 11, Washington, D.C.: World Bank.

World Bank. 2008a. *Nicaragua Public Expenditure Review*, Report No. 39807-NI, Washington, D.C.: World Bank.

World Bank 2008b. *Costa Rica Public Expenditure Review. Enhancing the Efficiency of Expenditures*, Report No. 40774-CR, Washington, D.C.: World Bank.

World Bank. 2007a. *Pakistan. Social Protection in Pakistan. Managing Household Risks and Vulnerability*, Report No. 35472-PK. Washington, D.C.: World Bank.

World Bank. 2007b. *Latvia Public Sharing the High Growth Dividend. A Living Standards Assessment*, Report No. 38437-LV. Washington, DC: World Bank.

World Bank. 2007c. *Republic of Moldova Improving Public Expenditure Efficiency for Growth and Poverty Reduction*, Report No. 37933-MD, Washington, DC: World Bank.

World Bank. 2007d. *Honduras Public Expenditure Review*. Background Chapters and Annexes, Vol. 2, Report No. 39251-HO, Washington, DC: World Bank.

World Bank. 2006. *Albania. A Public Expenditure and Institutional Review*, Vol. 2, Report No. 36453–AL, Washington, D.C.: World Bank.

World Bank. 2004. *Ecuador Creating Fiscal Space for Poverty Reduction. A Fiscal Management and Public Expenditure Review*, Vol. 2, Report No. 28911-EC. Washington, D.C.: World Bank.

World Bank. 2003a. *Armenia: Public Expenditure Review.* World Bank Poverty Reduction and Economic Management Unit, Europe and Central Asia Region, Report 24434-AM. Washington, D.C.: World Bank.

World Bank. 2003b. *Bangladesh: Public Expenditure Review.* World Bank Poverty Reduction and Economic Management Unit, South Asia Region, Report 24370-BD. Washington, D.C.: World Bank.

World Bank. 2003c. *Draft Initiating Memorandum for a Proposed Social Protection Sector Adjustment Loan and Project Concept Document for a Proposed Social Protection Technical Assistance Loan to the Republic of Chile.* Washington, D.C.: World Bank.

World Bank. 2003d. *Ethiopia: Public Spending in the Social Sectors—The Emerging Challenge.* World Bank Public Expenditure Review AFTP2, Africa Region. Washington, D.C.: World Bank.

World Bank. 2003e. *Dominican Republic: Public Expenditure Review—Reforming Institutions for a More Efficient Public Expenditure Management.* World Bank Poverty Reduction and Economic Management Unit, Latin American and Caribbean Region, Report 23852-DO. Washington, D.C.: World Bank.

World Bank. 2003f. *Guatemala: Poverty in Guatemala.* World Bank Poverty Reduction and Economic Management Unit, Human Development Sector Management Unit, Latin America and Caribbean Region, Report 24221- GU. Washington, D.C.: World Bank.

World Bank. 2003g. *Republic of Tunisia Employment Strategy, Volume I, Main Report.* Middle East and North Africa, Human Development Sector (MNSHD), Washington, D.C.: World Bank.

World Bank. 2002a. *Bulgaria: Public Expenditure Issues and Directions for Reform.* World Bank Poverty Reduction and Economic Management Unit, Europe and Central Asia Region Report 23979-BUL. Washington, D.C.: World Bank.

World Bank. 2002b. *Colombia: Social Safety Net Assessment.* World Bank Human Development Department, Country Management Unit for Colombia, Mexico and Venezuela, Latin America and Caribbean Regional Office Report 22255-CO. Washington, D.C.: World Bank.

World Bank. 2002c. *Costa Rica: Social Spending and the Poor, Vol. 1–2.* World Bank Human Development Sector Management Unit, Central America Country Management Unit, Latin America and Caribbean Region, Report 24300-CR. Washington, D.C.: World Bank.

World Bank. 2002d. Mongolia Public Expenditure and Financial Management Review. Bridging the Public Expenditure Management Gap, Report No. 24439-MOG. Washington, D.C.: World Bank.

World Bank. 2001a. *Brazil: Critical Issues in Social Security.* World Bank Country Study. Washington, D.C.: World Bank.

World Bank. 2001b. *Public Expenditures for Poverty Alleviation in Northeast Brazil: Promoting Growth and Improving Services.* World Bank Latin America and the Caribeean Region, Report 22425-BR, Washington, D.C.: World Bank.

World Bank. 2000a. *Argentina: Managing Social Risks.* World Bank Human Development Department, Social Protection Group, Latin America and Caribbean Regional Office. Washington, D.C.: World Bank.

World Bank. 2000b. *Turkey Country Economic Memorandum, Structural Reforms for Sustainable Growth.* Report 20657 -TU Volume 1 (of 2): Main Report, Poverty Reduction and Economic Management Unit, Europe and Central Asia Region. Washington, D.C.: World Bank.